

Table 4
Soil Sampling Analytical Results
Total Petroleum Hydrocarbons (TPH) and Polychlorinated Biphenyls (PCBs)
Marketplace Brownsfields Site
Riverside, California

EPA Method				8015M (mg/kg)			8082 (µg/kg)						
Soil Boring Location	Sample Date	Area	Lab ID	TPH-g	TPH-d	TPH-o	PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				NE	NE	NE	21,000	540	540	740	740	740	740
Method Detection Limit				0.2	2	20	50	100	50	50	50	50	50
Practical Detection Limit				0.5	5	40	-	-	-	-	-	-	-
Minimum				1.3	2	22.9	0	0	0	0	84	109	165
Maximum				11.9	1,430	1,410	0	0	0	0	369,000	125,000	73,800
Average				6.6	197	401	NA	NA	NA	NA	28,162	5,890	39,244
Median				6.6	91.3	283	NA	NA	NA	NA	1,650	903	42,900
TTLC (mg/mg)				NE	NE	NE	50	50	50	50	50	50	50
STLC (mg/l)				NE	NE	NE	5	5	5	5	5	5	5
10 x STLC (mg/l)				NE	NE	NE	50	50	50	50	50	50	50
TCLP (mg/l)				NE	NE	NE	NE	NE	NE	NE	NE	NE	NE
Residential CHHSL (mg/kg)				NE	NE	NE	0.089	0.089	0.089	0.089	0.089	0.089	0.089
Residential CHHSL (ug/kg)				NE	NE	NE	0.000089	0.000089	0.000089	0.000089	0.000089	0.000089	0.000089
Industrial CHHSL (mg/kg)				NE	NE	NE	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Industrial CHHSL (ug/kg)				NE	NE	NE	0.0003	0.0003	0.0003	0.0003	0.0003	0.0003	0.0003
Residential RSL (mg/kg)				NE	NE	NE	3.9	0.14	0.14	0.22	0.22	0.22	0.22
Residential RSL (ug/kg)				NE	NE	NE	3,900	140	140	220	220	220	220
Industrial RSL (mg/kg)				NE	NE	NE	21	0.54	0.54	0.74	0.74	0.74	0.74
Industrial RSL (ug/kg)				NE	NE	NE	21,000	540	540	740	740	740	740

Notes:

TPHg = Total petroleum hydrocarbons as gasoline
TPHd = Total petroleum hydrocarbons as diesel
TPHo = Total petroleum hydrocarbons as oil
ND = Not detected at any concentration
J = Estimated value, compound observed below method detection limit
- = Not reported
TTLC = Total threshold limit concentration, used for California regulated hazardous waste (California Code of Regulations, Title 22, Chapter 11, Article 3). If a substance in a waste is equal to or greater than the TTLC level, it is considered a hazardous toxic waste.
STLC = Soluble threshold limit concentration; if a substance is ten times the STLC value found in the TTLC, the waste extraction test (WET) is indicated. If any substance in the waste extract is equal to or greater than the STLC value, it is considered a hazardous toxic waste.
TCLP = Toxicity characteristic leaching procedure
CHHSL = California Human Health Screening Level for residential land use (Cal/EPA 2009)
RSL = Regional soil screening level for residential and industrial use (USEPA 2010)
NE= Not established
NA = Not applicable
Bold = Concentrations at or above industrial RSLs
Note: Soil samples were obtained from 0.5 to 1 foot below ground surface

Tables

2015 Results: AMEC Foster Wheeler, 2015, Additional Phase II Environmental Site Assessment Report, Riverside Scrap Iron & Metal Site, Riverside, California, December 9.

TABLE 1

SUMMARY OF POLYCHLORINATED BIPHENYLS (PCBS) IN SHALLOW SOIL

Riverside Scrap Iron & Metal Site

Riverside, California

Concentrations reported in micrograms per kilogram (µg/kg)

Sample/ Boring ID	Area	Sample Date	depth (feet bgs)	EPA Method 8082 (µg/kg)						
				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
NS1	8e	8/10/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	94	57
NS2	8d	8/18/2015	0.25	ND<20	ND<20	ND<20	8,600	ND<20	28,000	2300J
		8/18/2015	1	ND<20UJ	ND<20UJ	ND<20UJ	62,000J	ND<20UJ	290,000J	34,000J
		8/18/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	23	ND<20
NS3	8f	8/10/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	47	43
NS4	8e	8/10/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	130	33
NS5	8f	8/10/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS6	8e	8/10/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS7	8a	8/21/2015	2.5	ND<20	ND<20	ND<20	55	ND<20	110	58
NS8	8a	8/21/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	2,200J	ND<20UJ	350J	110J
		8/21/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS9	8a	8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS10A	8c	8/21/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	110J	ND<20UJ	200J	100J
NS11	10b	8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	39	27
NS12	10b	8/13/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS13	10b	8/13/2015	2.5	ND<20	ND<20	ND<20	71	ND<20	76	32
NS14	8c	8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS15	8c	8/14/2015	0.25	ND<20	ND<20	ND<20	1,500	ND<20	1,600	290
		8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS16	12	8/13/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS17	8h	8/21/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS18	8h	8/21/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	250J	ND<20UJ	420J	150J
		8/21/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20

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				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
NS19	8h	8/21/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS20	8h	8/21/2015	2.5	ND<20UJ	ND<20UJ	ND<20UJ	3,200J	ND<20UJ	1,500J	1,100J
		8/21/2015	5	ND<20UJ	ND<20UJ	ND<20UJ	1,100J	ND<20UJ	480J	290J
NS21	8h	8/21/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS24	8e	8/10/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	24	21
		8/10/2015	2.5	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ
NS25	8d	8/18/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	1,300J	140J
		8/18/2015	1	ND<20	ND<20	ND<20	ND<20	ND<20	42	ND<20
NS26	8d	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	320J	ND<20UJ	12,000J	1,600J
		8/12/2015	1	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS27	8d	8/12/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	120	97
NS28	8d	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	2,000J	ND<20UJ	860J	180J
		8/12/2015	1	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
NS29	8d	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	58J	ND<20UJ	110J	89J
NS30	8d	8/21/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	44J	45J
S1	8e	8/11/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
		8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S2	8e	8/12/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	51	ND<20
		8/12/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S3	8f	8/11/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	76	47
		8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S4	8d	8/18/2015	0.25	ND<20	ND<20	ND<20	140	ND<20	940	71
		8/18/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20

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				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
S5	8d	8/12/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	170	93
		8/12/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S6	8d	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	19,000J	ND<20UJ	51,000J	6,100J
S7	12	8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S8	8a	8/13/2015	2.5	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200
S9	8a	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	120J	ND<20UJ	280J	130J
S10	12	8/11/2017	0.25	ND<20UJ	ND<20UJ	ND<20UJ	1,400J	ND<20UJ	4,300J	3,500J
		8/11/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S11	8a	8/13/2015	0.25	ND<200	ND<200	ND<200	1,600	ND<200	1,400	430
		8/13/2015	1	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200
		8/13/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S12	8a	8/12/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S13	8a	8/14/2015	0.25	ND<20	ND<20	ND<20	4,200	ND<20	1,600	300
S14	10b	8/13/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	2,900J	ND<20UJ	15,000J	9,300J
		8/13/2015	1	ND<200	ND<200	ND<200	48,000J	ND<200	50,000J	18,000J
		8/13/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	38	ND<20
S15	10b	8/12/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	230J	ND<20UJ	95J	23J
		8/12/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S16	8b	8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S17	8g	8/14/2015	0.25	ND<20	ND<20	ND<20	26	ND<20	60	30
S18	8h	8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
S19	8g	8/14/2015	0.25	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
		8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
ES1	10a	8/19/2015	0.25	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200	ND<200
		8/19/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20
ES2	8b	8/14/2015	0.25	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	ND<20UJ	22J
		8/14/2015	2.5	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20	ND<20

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Riverside Scrap Iron & Metal Site

Riverside, California

Concentrations reported in micrograms per kilogram (µg/kg)

Sample/ Boring ID	Area	Sample Date	depth (feet bgs)	EPA Method 8082 (µg/kg)						
				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
ES3	8h	8/14/2015	0.25	ND<20	ND<20	ND<20	200	ND<20	410	170
A8a-SB1	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	199	ND<50
A8a-SB2	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	790	ND<50
A8a-SB3	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	2,960	2,660	ND<50
A8a-SB4	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8a-SB5	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	8,150	4,620	ND<50
A8a-SB6	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	26,800	5,950	ND<50
A8b-SB1	8b	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	369,000	125,000	ND<50
A8b-SB2	8b	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8b-SB3	8b	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	180	274	ND<50
A8b-SB4	8b	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	903	ND<50
A8c-SB1	8c	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8c-SB2	8c	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	10,400	1,450	ND<50
A8c-SB3	8c	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	24,300	2,670	ND<50
A8c-SB4	8c	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8d-SB1	8d	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8d-SB2	8d	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	5,840	ND<50
A8d-SB3	8d	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	903	ND<50
A8d-SB4	8d	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	372	ND<50
A8e-SB1	8e	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	219	ND<50
A8e-SB2	8e	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	109	ND<50
A8e-SB3	8e	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8e-SB4	8e	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	62,800
A8e-SB5	8e	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8e-SB6	8e	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	1,430	ND<50
A8e-SB7	8e	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50

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				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
A8e-SB8	8e	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8f-SB1	8f	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8f-SB2	8f	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	161	ND<50
A8f-SB3	8f	1/25/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	3,070	ND<50
A8g-SB1	8g	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8g-SB2	8g	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8g-SB3	8g	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8h-SB1	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8h-SB10	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8h-SB2	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	1,300	ND<50
A8h-SB3	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	1,180	699	ND<50
A8h-SB4	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	1,570	552	ND<50
A8h-SB5	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8h-SB6	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	84	ND<50	ND<50
A8h-SB7	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	1,730	1,810	ND<50
A8h-SB8	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	1,490	536	ND<50
A8h-SB9	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A10a-SB1	10a	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A10a-SB2	10a	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A10b-SB1	10b	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	112	ND<50
A10b-SB2	10b	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	2,190	1,290	ND<50
A10b-SB3	10b	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	7,120	ND<50
A10b-SB4	10b	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	73,800
A12-SB1	12	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	23,000
A12-SB2	12	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A12-SB3	12	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	123	ND<50	ND<50
A12-SB4	12	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	205	120	ND<50

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				PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260
Industrial RSL (ug/kg)				27,000	720	720	970	940	970	990
Residential RSL (ug/kg)				6,600	170	170	230	230	240	240
A12-SB5	12	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	6,200
A13-SB1	13	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	425	ND<50
A13-SB2	13	1/31/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A13-SB3	13	2/3/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8e-SB7 (D1)	8e	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	165
A10b-SB4 (D2)	10b	1/26/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	69,500
A8a-SB1 (D3)	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8c-SB1 (D4)	8c	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50
A8a-SB4 (D5)	8a	1/27/2011	1	ND<50	ND<100	ND<50	ND<50	224	236	ND<50
A8h-SB9 (D6)	8h	1/28/2011	1	ND<50	ND<100	ND<50	ND<50	ND<50	ND<50	ND<50

Notes and Data Qualifiers

USEPA Region IX Regional Screening Levels (RSLs), June 2015, screening levels for industrial soil and residential soil.

Soil samples collected in 2011 at 0.5 to 1 foot bgs by Ami Adini & Associates (2011) shown for completeness.

J = The analyte was positively identified and the associated numerical value is the approximate concentration of the analyte in the sample due either to the quality of the data generated because certain quality control criteria were not met or the sample was analyzed outside the holding time. See data quality review memo for details.

UJ = The analyte was not detected above the laboratory reporting limit but the reporting limit is approximate due either to the quality of the data generated because certain quality control criteria were not met or the sample was analyzed outside the holding time for extraction. See data quality review memo for details.

Abbreviations

bgs = Below ground surface

ND = Not detected at the reporting limit shown

PCBs = Polychlorinated biphenyls

RSL = Regional soil screening level

USEPA = United States Environmental Protection Agency

µg/kg = Micrograms per kilogram

Tables

2017 Results: Hillmann Consulting, 2017, Off-Site Preliminary Environmental Assessment, Riverside Scrap Iron & Metal, Riverside, California, February 27.

2017 Results: Hillmann, 2017, Draft Remedial Action Plan, Riverside Scrap Iron & Metal, Riverside, California, May 8.

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
S21-0.25	2981 6 th St	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S21-1	St		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S22-0.25	2981 6 th St	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S22-1	St		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S23-0.25	2981 6 th St	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S23-1	St		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S24-0.25	2981 6 th St	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S24-1	St		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S25-0.25	Mssn Inn Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S25-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S26-0.25	Mssn Inn Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S26-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S27-0.25	Mssn Inn Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.076	0.076
S27-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S28-0.25	Mssn Inn Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.097	0.097
S28-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S29-0.25	5 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.74	0.74
S29-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.12	0.12
S30-0.25	5 th St Entry	Feb 2017	0.25	0.39	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.22	0.61
No Sample	Entry		--	--	--	--	--	--	--	--	--
S31-0.25	5 th St Entry	Feb 2017	0.25	0.31	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.40	0.71
S31-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S32-0.25	5 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S32-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S33-0.25	5 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S33-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S34-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	1.05	1.05
S34-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.067	0.067
S35-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.94	0.94
S35-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S36-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.061	0.061
S36-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S37-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.60	0.60
S37-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S38-0.25	6 th St Entry	Feb 2017	0.25	0.059	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.37	0.429
S38-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S39-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.13	0.13
S39-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
S40-0.25	6 th St Entry	Feb 2017	0.25	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.40	0.40
S40-1	Entry		1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05
NS1	8e	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.094	0.057	0.151

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
NS2	8d	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	8.6	ND<0.02	28	2.3	38.9
			1	ND<0.02	ND<0.02	ND<0.02	62	ND<0.02	290	34	386
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.023	ND<0.02	0.023
NS3	8f	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.047	0.043	0.09
NS4	8e	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.130	0.033	0.163
NS5	8f	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS6	8e	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS7	8a	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	0.055	ND<0.02	0.11	0.058	0.223
NS8	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	2.2	ND<0.02	0.35	0.11	2.66
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS9	8a	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS10A	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.11	ND<0.02	0.200	0.100	0.41
NS11	10b	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.039	0.027	0.066
NS12	10b	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS13	10b	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	0.071	ND<0.02	0.076	0.032	0.179
NS14	8c	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS15	8c	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	1.5	ND<0.02	1.6	0.29	3.39
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS16	12	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS17	8h	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS18	8h	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.25	ND<0.02	0.42	0.15	0.82
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS19	8h	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS20	8h	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	3.2	ND<0.02	10.5	1.1	14.8
			5	ND<0.02	ND<0.02	ND<0.02	1.1	ND<0.02	0.48	0.29	1.87
NS21	8h	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS24	8e	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.024	0.021	0.045
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS25	8d	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	1.3	0.14	1.44
			1	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.042	ND<0.02	0.042
NS26	8d	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.32	ND<0.02	12	1.6	13.92
			1	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS27	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.12	0.097	0.217
NS28	8c	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	2.0	ND<0.02	0.86	0.18	3.04
			1	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
NS29	8c	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.058	ND<0.02	0.11	0.089	0.257

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
NS30	8h	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.044	0.045	0.089
S1	8e	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S2	8e	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.051	ND<0.02	0.051
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S3	8f	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.076	0.047	0.123
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S4	8d	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.14	ND<0.02	0.94	0.071	1.151
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S5	8e	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.17	0.093	0.263
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S6	8d	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	19	ND<0.02	51	6.1	76.1
S7	12	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S8	8a	Aug 2015	2.5	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND
S9	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.12	ND<0.02	0.28	0.13	0.53
S10	12	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	1.4	ND<0.02	4.3	3.5	9.2
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S11	8a	Aug 2015	0.25	ND<0.2	ND<0.2	ND<0.2	1.6	ND<0.2	1.4	0.43	3.43
			1	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.2	ND<0.02	ND
S12	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S13	8a	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	4.2	ND<0.02	1.6	0.3	6.1
S14	10b	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	2.9	ND<0.02	15	9.3	27.2
			1	ND<0.2	ND<0.2	ND<0.2	48	ND<0.2	50	18	116
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.2	ND<0.02	0.038	ND<0.02	0.038
S15	8c	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.23	ND<0.02	0.095	0.023	0.348
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S16	8b	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S17	8g	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	0.026	ND<0.02	0.06	0.030	0.116
S18	8h	Aug 2015	2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
S19	8g	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
ES1	10a	Aug 2015	0.25	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND<0.2	ND
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
ES2	8b	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.022	0.022
			2.5	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND
ES3	8h	Aug 2015	0.25	ND<0.02	ND<0.02	ND<0.02	ND<0.02	ND<0.02	0.410	0.170	0.58

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
A8a-SB1	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.199	ND<0.05	0.199
A8a-SB2	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.790	ND<0.05	0.79
A8a-SB3	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	2.96	2.66	ND<0.05	5.62
A8a-SB4	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8a-SB5	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	8.15	4.62	ND<0.05	12.77
A8a-SB6	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	26.8	5.95	ND<0.05	32.75
A8b-SB1	8b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	369	125	ND<0.05	494
A8b-SB2	8b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8b-SB3	8b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	0.18	0.274	ND<0.05	0.454
A8b-SB4	8b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.903	ND<0.05	0.903
A8c-SB1	8c	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8c-SB2	8c	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	10.4	1.45	ND<0.05	11.85
A8c-SB3	8c	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	24.3	2.67	ND<0.05	26.97
A8c-SB4	8c	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8d-SB1	8d	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8d-SB2	8d	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	5.84	ND<0.05	5.84
A8d-SB3	8d	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.903	ND<0.05	0.903
A8d-SB4	8d	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.372	ND<0.05	0.372
A8e-SB1	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.219	ND<0.05	0.219
A8e-SB2	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.109	ND<0.05	0.109
A8e-SB3	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8e-SB4	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	62.8	62.8
A8e-SB5	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8e-SB6	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	1.43	ND<0.05	1.43
A8e-SB7	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8e-SB8	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8f-SB1	8f	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8f-SB2	8f	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.161	ND<0.05	0.161
A8f-SB3	8f	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	3.070	ND<0.05	3.07
A8g-SB1	8g	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8g-SB2	8g	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
A8g-SB3	8g	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8h-SB1	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8h-SB10	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8h-SB2	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	1.3	ND<0.05	1.3
A8h-SB3	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	1.18	0.699	ND<0.05	1.879
A8h-SB4	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	1.57	0.552	ND<0.05	2.122
A8h-SB5	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8h-SB6	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	0.084	ND<0.05	ND<0.05	0.084
A8h-SB7	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	1.73	1.810	ND<0.05	3.54
A8h-SB8	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	1.49	0.536	ND<0.05	2.026
A8h-SB9	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A10a-SB1	10a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A10a-SB2	10a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A10b-SB1	10b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.112	ND<0.05	0.112
A10b-SB2	10b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	2.190	1.29	ND<0.05	3.48
A10b-SB3	10b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	7.12	ND<0.05	7.12
A10b-SB4	10b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	73.8	73.8
A12-SB1	12	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	23	23
A12-SB2	12	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A12-SB3	12	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	0.123	ND<0.05	ND<0.05	0.123
A12-SB4	12	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	0.205	0.120	ND<0.05	0.325
A12-SB5	12	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	6.2	6.2
A13-SB1	13	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	0.425	ND<0.05	0.425
A13-SB2	13	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A13-SB3	13	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
Duplicate Samples											
A8e-SB7 (D1)	8e	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	0.165	0.165
A10b-SB4 (D2)	10b	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	69.5	69.5
A8a-SB1 (D3)	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8c-SB1 (D4)	8c	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND
A8a-SB4 (D5)	8a	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	0.224	0.236	ND<0.05	0.46

TABLE 2
Summary of PCB Soil Sampling Results (EPA)

Boring ID	Area	Date	Depth (ft)	PCB 1016	PCB 1221	PCB 1232	PCB 1242	PCB 1248	PCB 1254	PCB 1260	Total PCB
A8h-SB9 (D6)	8h	Jan 2011	1	ND<0.05	ND<0.1	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND<0.05	ND

Notes: USEPA requires a table that shows all PCB sampling results in mg/kg, and with a total PCB column. The Aroclors presented were the only ones detected in the testing. Samples with greater than 50 mg/Kg highlighted in RED.

APPENDIX C.

Historical Distribution of PCE in Soil Gas

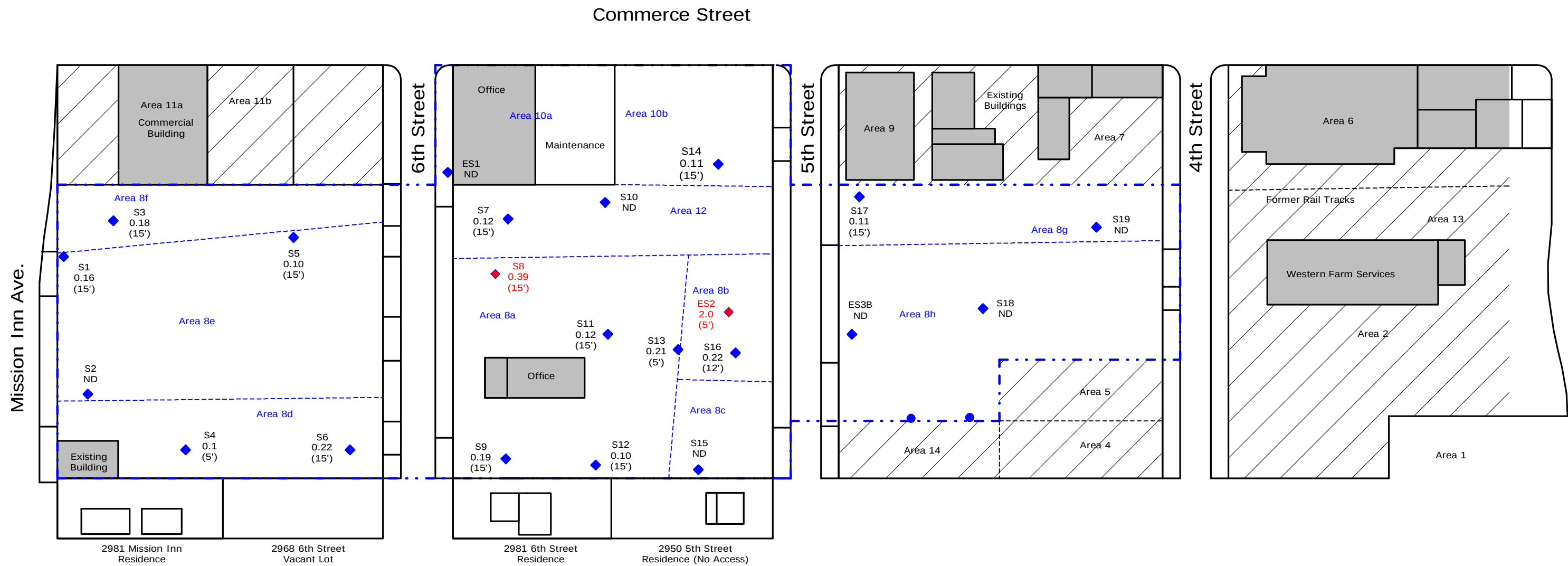
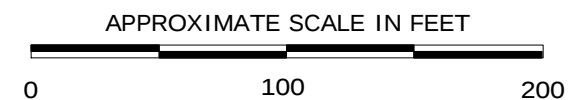


FIGURE 9A
DISTRIBUTION OF PCE IN SOIL GAS
RIVERSIDE SCRAP IRON & METAL
Riverside, California

Maximum PCE Concentrations Shown in ug/L.
 Concentrations >0.24 ug/L Shown in **RED**.

LEGEND

◆ Soil Gas Sampling Locations (Amec 2015)



Commerce Street

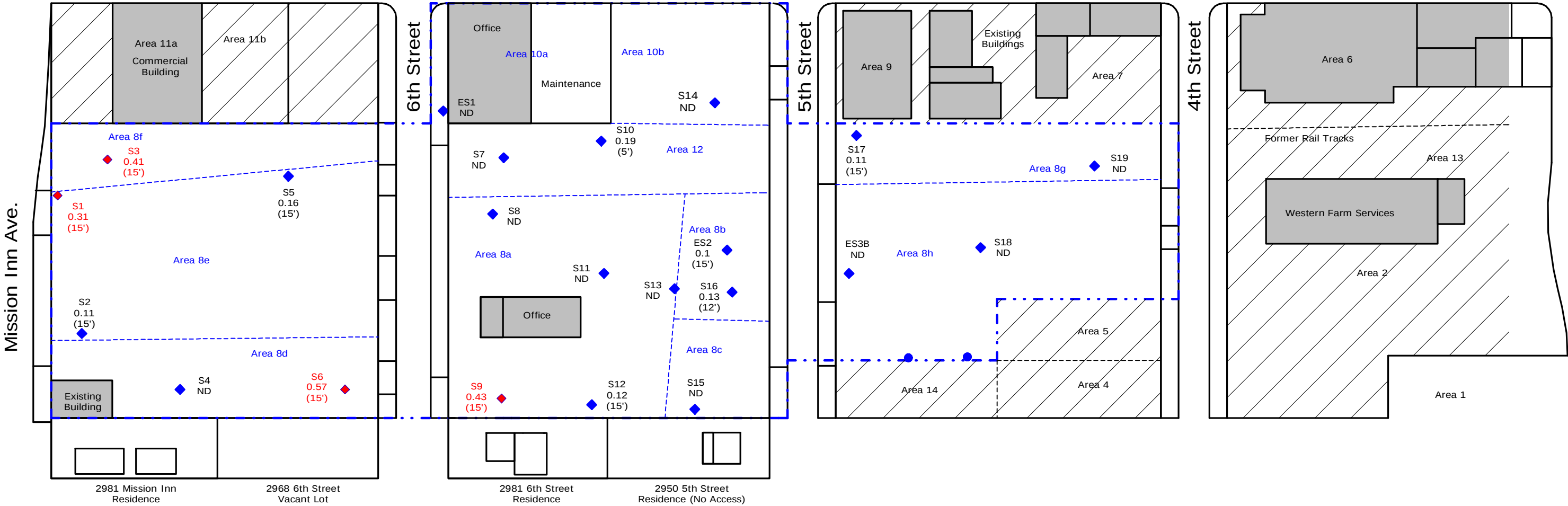
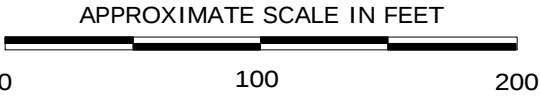
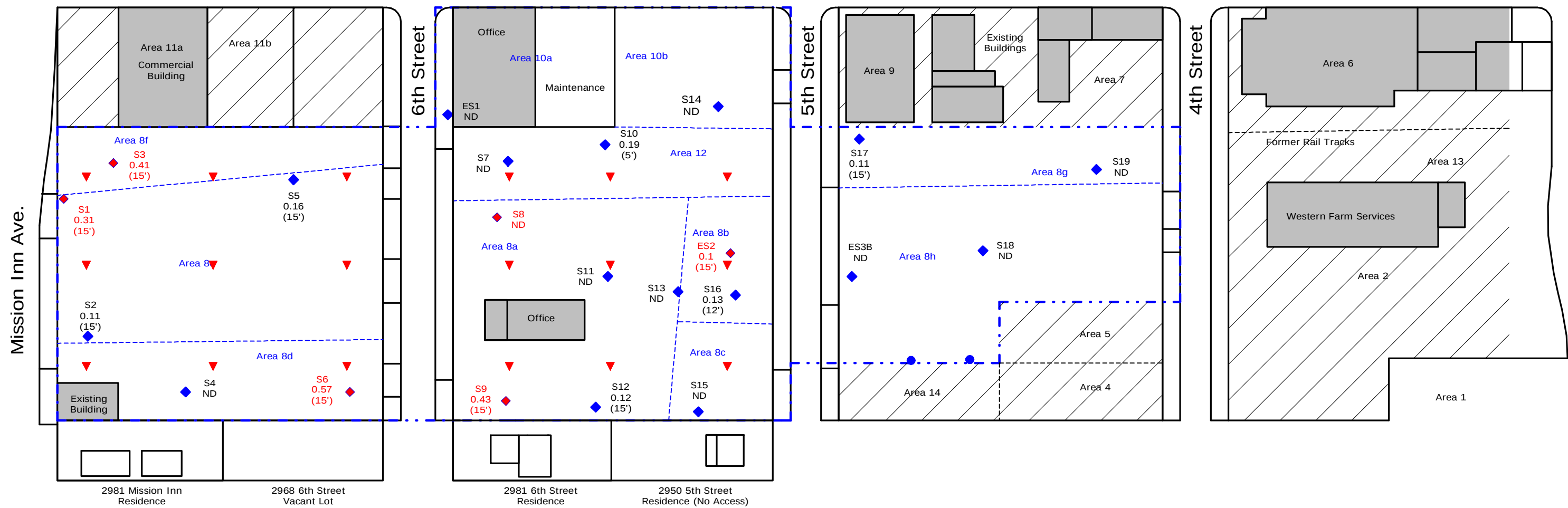


FIGURE 9B
DISTRIBUTION OF TCE IN SOIL GAS
RIVERSIDE SCRAP IRON & METAL
Riverside, California



Commerce Street



LEGEND

- ◆ Soil Gas Sampling Locations (Amec 2015)
- ▼ Proposed Soil Gas Probes (After Excavation Program)

FIGURE 9C
PROPOSED SOIL GAS PROBES
RIVERSIDE SCRAP IRON & METAL
Riverside, California

Probes with Maximum TCE or PCE Concentrations
 >0.24 ug/L Shown in **RED**.

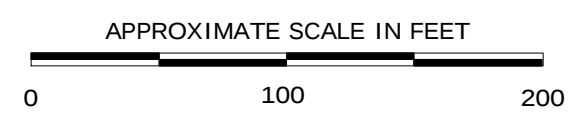
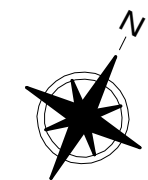


TABLE 7

SUMMARY OF VOLATILE ORGANIC COMPOUNDS (VOCS) AND GASOLINE RANGE ORGANICS (GRO) IN SOIL GAS
Riverside Scrap Iron & Metal Site
Riverside, California

Results reported in micrograms per liter (µg/L)

Soil Gas Probe Designation	Depth (feet bgs)	Purge Volume (µg/L)	Date	Chloro-methane	Freon 12	Freon 11	TCE	PCE	IPA	Gasoline Range Organics
Industrial RSLs or DTSC-modified Screening Level				390	440	3,100	3	2.1	880	NA
Ambient Air	---	---	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
	---	---	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S1	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S1	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.31	0.16	ND<1.0	ND<10
S2	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S2	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.11	ND<0.10	ND<1.0	ND<10
S3	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S3	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.37	0.17	ND<1.0	ND<10
S3	15 Dup	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.41	0.18	ND<1.0	ND<10
S4	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	0.10	ND<1.0	ND<10
S4	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S5	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S5	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.16	0.10	ND<1.0	ND<10
S6	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.14	0.14	ND<1.0	ND<10
S6	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.57	0.22	ND<1.0	ND<10
S7	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S7	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	0.12	ND<1.0	ND<10
S8	5	3	10/1/2015	ND<0.10	ND<0.10	0.12	ND<0.10	ND<0.10	ND<1.0	ND<200
S8	15	3	10/1/2015	ND<0.10	ND<0.10	0.18	ND<0.10	0.39	ND<1.0	ND<10
S9	5	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S9	15	3	10/1/2015	ND<0.10	ND<0.10	ND<0.10	0.43	0.19	ND<1.0	ND<10
S10	5	3	10/2/2015	ND<0.10	ND<0.10	0.21	0.19	ND<0.10	ND<1.0	ND<10
S10	15	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S11	5	3	10/1/2015	ND<0.10	ND<0.10	1.9	ND<0.10	ND<0.10	ND<1.0	ND<10
S11	15	3	10/1/2015	ND<0.10	ND<0.10	2.6	ND<0.10	0.12	ND<1.0	ND<10
S11	15 Dup	3	10/1/2015	ND<0.10	ND<0.10	2.6	ND<0.10	0.12	ND<1.0	ND<10
S12	5	3	10/1/2015	ND<0.10	ND<0.10	1.1	ND<0.10	ND<0.10	ND<1.0	ND<10
S12	15	3	10/1/2015	ND<0.10	ND<0.10	1.5	0.12	0.10	ND<1.0	ND<10
S13 (see notes)	5	3	10/1/2015	0.49	0.28	15	ND<0.10	0.21	ND<1.0	ND<10
S13 (See notes)	15	3	10/1/2015	ND<0.10	0.34	12	ND<0.10	0.18	ND<1.0	ND<10
S14	5	3	10/2/2015	ND<0.10	ND<0.10	0.16	ND<0.10	ND<0.10	ND<1.0	ND<10
S14	15	3	10/2/2015	ND<0.10	ND<0.10	0.11	ND<0.10	0.11	ND<1.0	ND<10
S15	5	3	10/1/2015	ND<0.10	ND<0.10	1.4	ND<0.10	ND<0.10	ND<1.0	ND<10
S15	15	3	10/1/2015	ND<0.10	ND<0.10	1.0	ND<0.10	ND<0.10	ND<1.0	ND<10
S16A	5	3	10/2/2015	ND<0.10	ND<0.10	3.5	ND<0.10	0.12	ND<1.0	ND<10
S16A	12	3	10/2/2015	ND<0.10	ND<0.10	3.0	0.13	0.22	ND<1.0	ND<10
S17	5	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S17	15	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	0.11	0.11	ND<1.0	ND<10

TABLE 7

SUMMARY OF VOLATILE ORGANIC COMPOUNDS (VOCS) AND GASOLINE RANGE ORGANICS (GRO) IN SOIL GAS
Riverside Scrap Iron & Metal Site
Riverside, California

Results reported in micrograms per liter (µg/L)

Soil Gas Probe Designation	Depth (feet bgs)	Purge Volume (µg/L)	Date	Chloro-methane	Freon 12	Freon 11	TCE	PCE	IPA	Gasoline Range Organics
S18	5	3	10/2/2015	ND<0.10UJ	ND<0.10UJ	0.62J	ND<0.10UJ	ND<0.10UJ	3.3J	ND<10
S18	15	3	10/2/2015	ND<0.10	ND<0.10	0.50	ND<0.10	ND<0.10	ND<1.0	ND<10
S18	15 Dup	3	10/2/2015	ND<0.10	ND<0.10	0.46	ND<0.10	ND<0.10	ND<1.0	ND<10
S19	5	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
S19	15	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
ES1	5	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
ES1	15	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
ES2	5	3	10/2/2015	ND<0.10	ND<0.10	0.78	ND<0.10	2.0	ND<1.0	ND<10
ES2	15	3	10/2/2015	ND<0.10	ND<0.10	0.69	0.10	1.1	ND<1.0	ND<10
ES3B	5	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
ES3B	5 Dup	3	10/2/2015	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<0.10	ND<1.0	ND<10
ES3B	11.25	3	10/2/2015	ND<0.10	ND<0.10	0.19	ND<0.10	ND<0.10	ND<1.0	ND<10

Notes and Data Qualifiers

Volatile Organic Compounds (VOCs) and Gasoline Range Organics (GRO) were analyzed using United States Environmental Protection Agency (EPA)

Method 8260M. All remaining VOCs were not detected. For a complete list of EPA 8260M analytes, see laboratory reports.

The Regional Screening Levels (RSLs) are from the EPA Region 9, revised June 2015, <http://www.epa.gov/region9/superfund/prg/>. RSLs were adjusted for a default (DTSC, 2011) attenuation factor for existing commercial buildings by multiplying the air RSLs by 1000 (representing a soil vapor-to-indoor air attenuation factor of 0.001). Therefore, the soil vapor screening levels presented are protective of existing buildings. The DTSC-modified screening level (DTSC, 2015) was used for PCE (italicized) because it was more conservative than the USEPA RSL.

S13 at 5 bgs and S13 at 15 feet bgs -Freon 11 concentrations from soil vapor samples exceeded the laboratory instrument calibration range. The samples were re-run at a higher dilution rate to quantify Freon 11 concentrations.

J - The analyte was positively identified. However, the leak detection compound IPA was detected in the sample at a concentration greater than 10 times the reporting limit of target analytes and therefore, the detected value is estimated.

UJ - The analyte was reported as not detected at the laboratory reporting limit. However, the leak detection compound IPA was detected in the sample at concentration greater than 10 times the reporting limit of the target analytes and therefore, the reporting limit is estimated.

Abbreviations

bgs = Below ground surface

ND = Not detected at the reporting limit shown

DUP = Duplicate sample

DTSC = Department of Toxic Substances Control

Freon 11 = Trichlorofluoromethane

Freon 12 = Dichlorodifluoromethane

IPA = Isopropanol

NA = Not available

PCE = Tetrachloroethene

RSL = Regional Screening Level

TCE = Trichloroethene

µg/L = Micrograms per liter

References

DTSC, 2015, Human Health Risk Assessment (HHRA) Note #3, DTSC-modified Screening Levels (DTSC-SLs), Human and Ecological Risk Office (HERO), October.

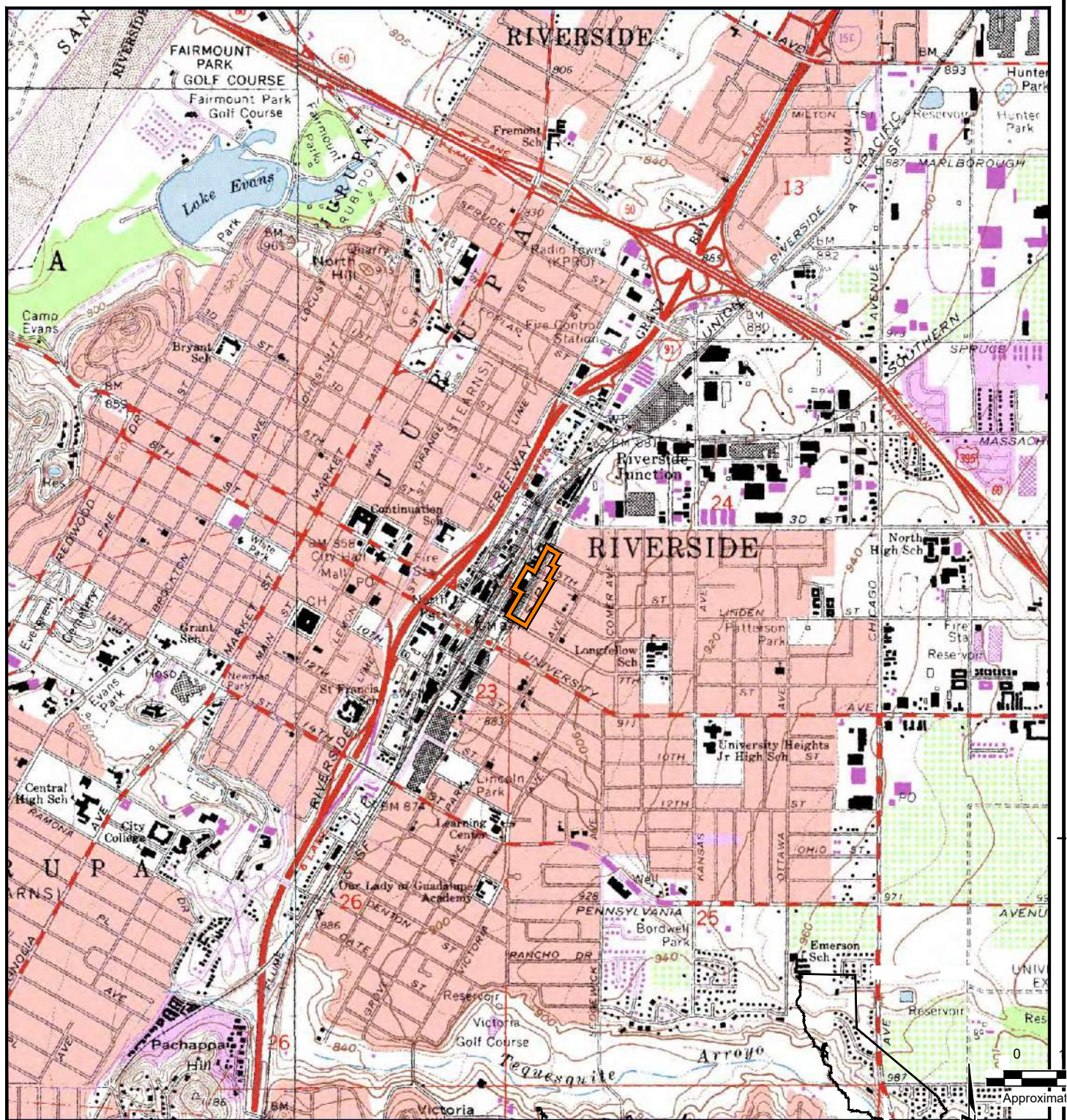
DTSC, 2011, Guidance for the Evaluation and Mitigation of Subsurface Vapor Intrusion to Indoor Air, October.

APPENDIX D.

Data from 2015 AMEC Investigation

APPENDIX A

AMEC Data



REFERENCE:

USGS 7.5 Minute Quadrangle Maps RIVERSIDE EAST, RIVERSIDE WEST, SAN BERNARDINO SOUTH, & FONTANA, California, 1967.

Photorevised 1980.



SITE LOCATION MAP

Riverside Scrap Iron & Metal Site
Riverside, California

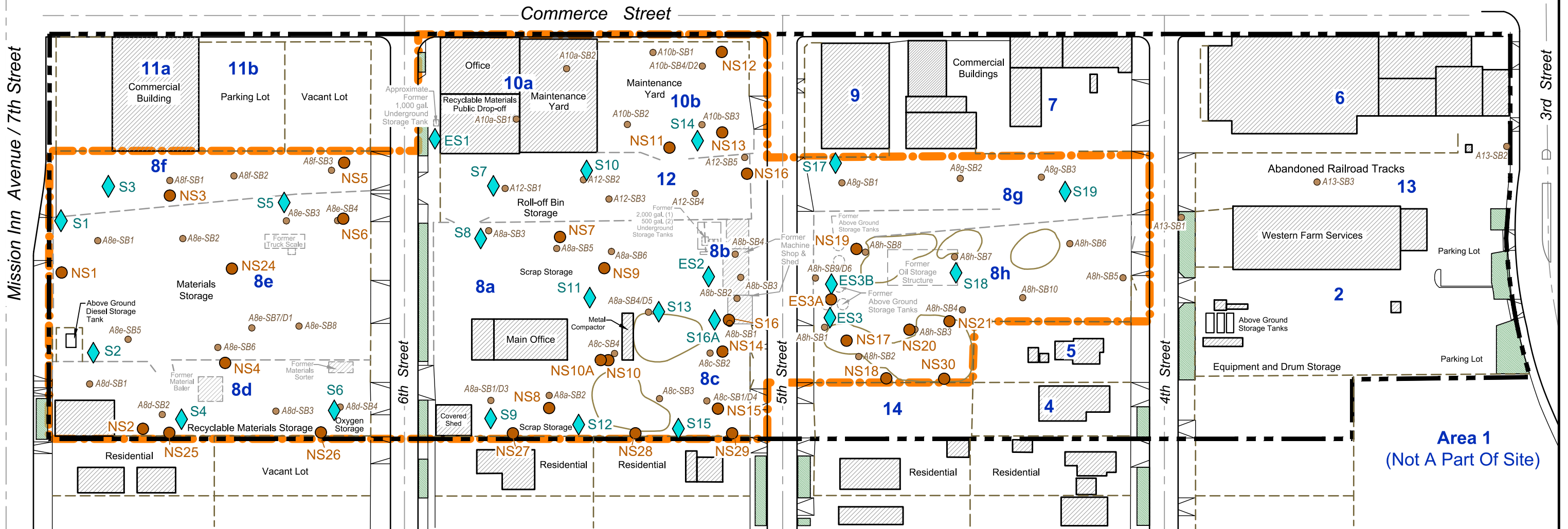
Project No. 104681002015

grr Drawn By Submitted By:



Plot Date: 10/16/2015 11:38:50 AM, Plotted by: joanna.worker, Drawing Path: W:\Projects\010468.004 (RS&M)\ACAD\Sample Locs.dwg, Sample Locs

Mission Inn Avenue / 7th Street



Explanation

NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)

S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)

A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)

A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)

8h Site Area designation (Geomatrix, 2005)

Building

Former building or structure

Former scrap heap

Fence or wall

Former fence or wall

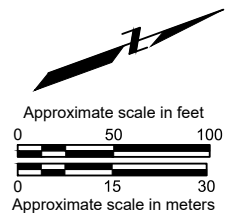
Riverside Marketplace Industrial District

Riverside Scrap Metal & Iron Site

Landscaped area

Notes:

- All locations are approximate.
- Scrap heaps shown from locations identified in January/February 2011 field work.



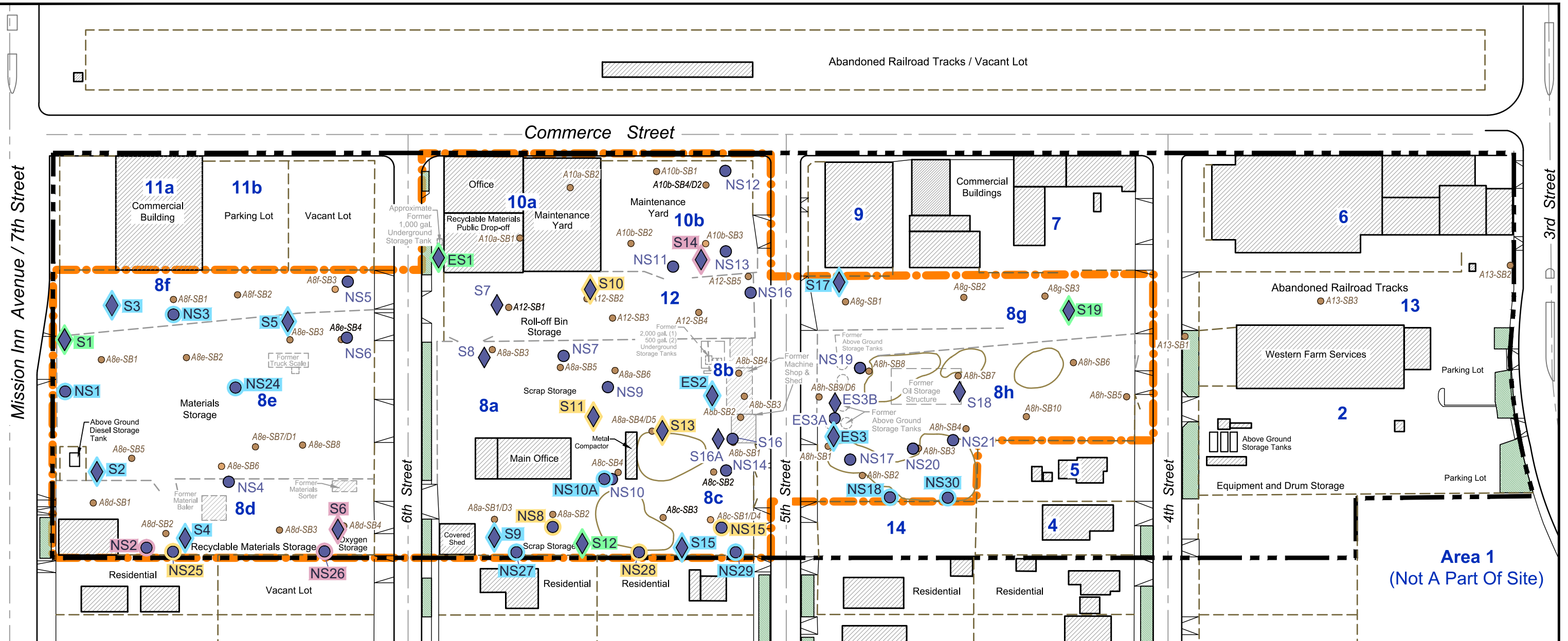
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

SAMPLING LOCATIONS
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/16/2015	Project No. 010468.0040	Figure 2
Submitted By: grr	Drawn By: jrw	

Plot Date: 10/27/2015 8:55:47 AM, Plotted by: joanna worker Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\010468.004 (RSI)M\ACAD\Results-2015.dwg, PCBs 0.25



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

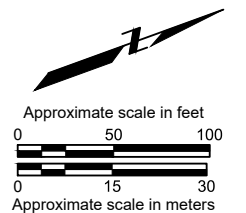
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polychlorinated Biphenyl (PCB) Concentrations

- All Aroclors Not Detected
- All Aroclors < Regional Screening Level (RSL)
- One or more Aroclors > RSL
- One or more Aroclors >10x RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Locations that were not sampled or analyzed have no color hi-lighting.
- The posted concentration category for a sample/sample duplicate pair is the higher of the two categories if they differ.
- Scrap heaps shown from locations identified in January/February 2011 field work



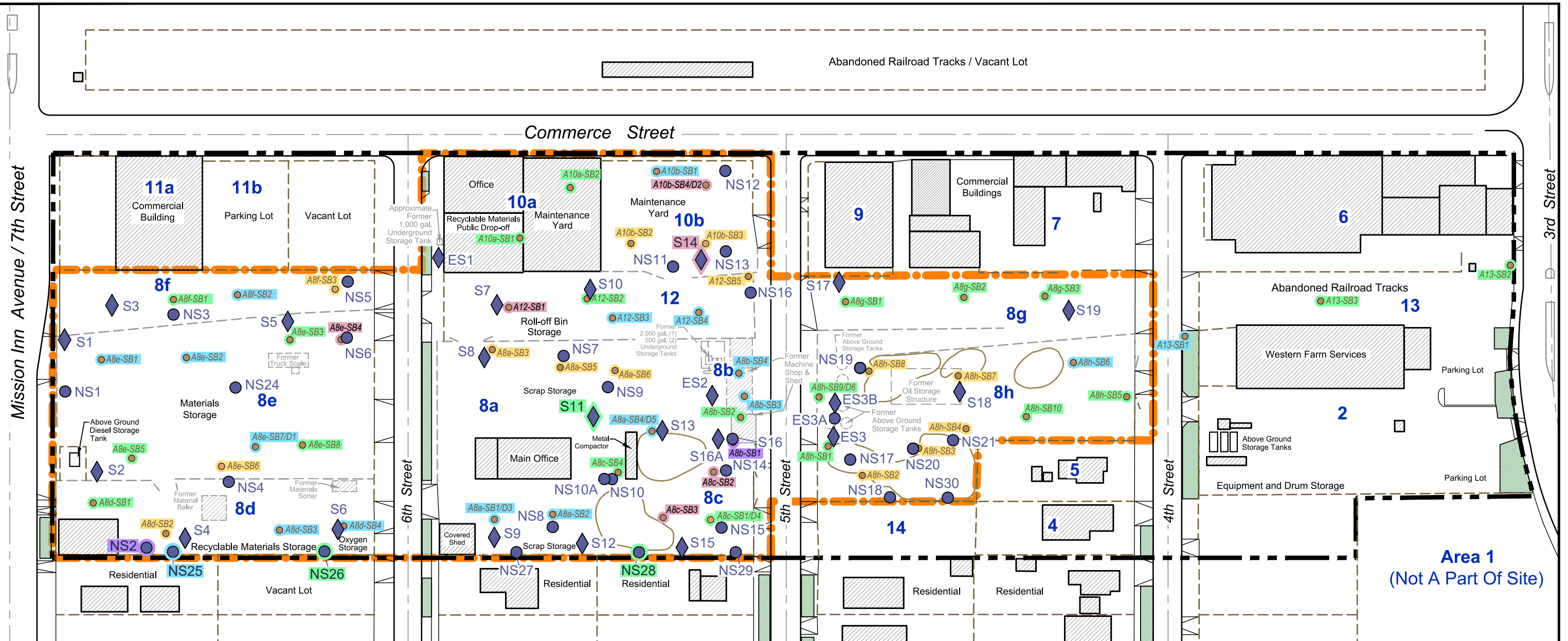
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

PCB CONCENTRATIONS IN SOIL
0.25 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040	Figure
Submitted By: grr	Drawn By: jrw	3a

Plot Date: 10/27/2015 9:01:48 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\010468.004 (RSI)M\ACAD\Results-2015.dwg, PCBs 0.5-1



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

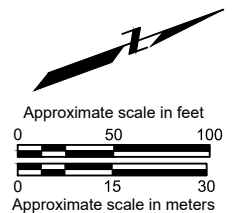
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polychlorinated Biphenyl (PCB) Concentrations

- All Aroclors Not Detected
- All Aroclors < Regional Screening Level (RSL)
- One or more Aroclors > RSL
- One or more Aroclors >10x RSL
- One or more Aroclors >100x RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Locations that were not sampled or analyzed have no color hi-lighting.
- The posted concentration category for a sample/sample duplicate pair is the higher of the two categories if they differ.
- Scrap heaps shown from locations identified in January/February 2011 field work



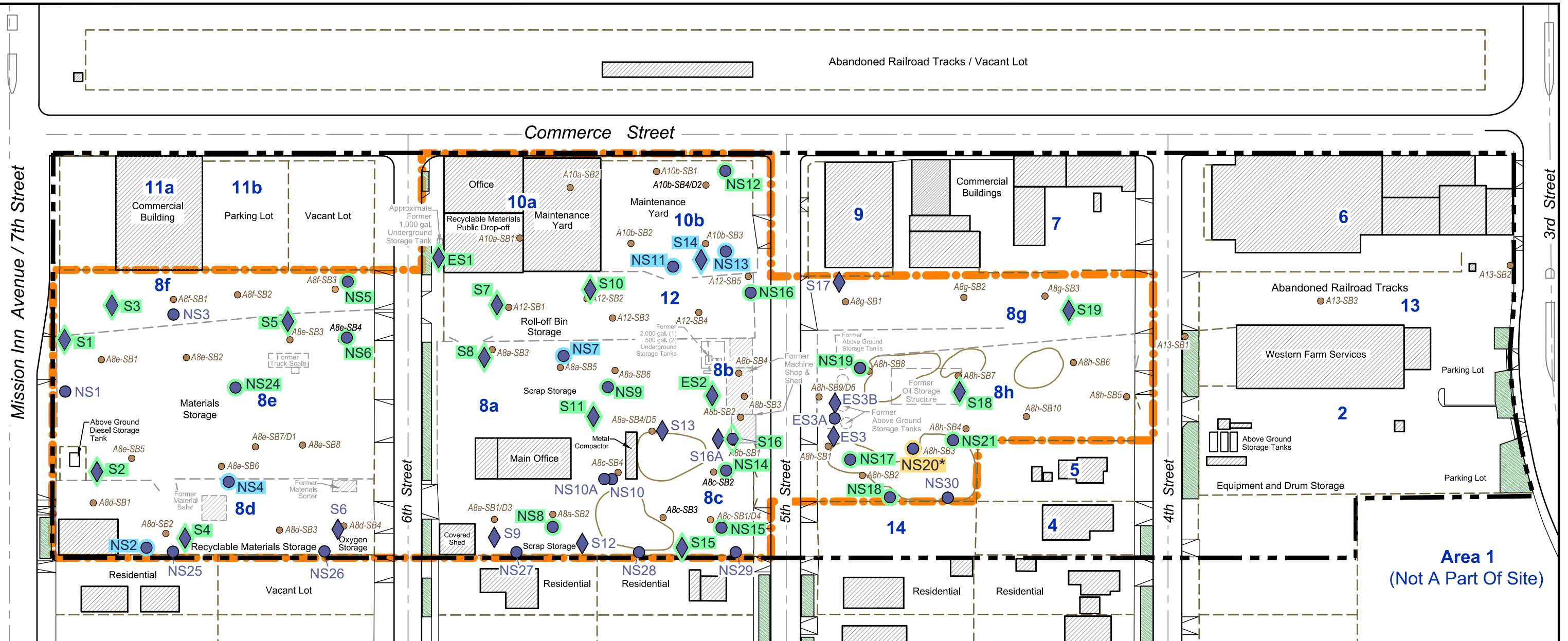
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

PCB CONCENTRATIONS IN SOIL
0.5 - 1 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040	Figure
Submitted By: grr	Drawn By: jrw	3b

Plot Date: 10/27/2015 9:03:53 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\ACAD\Results-2015.dwg, PCBs_2.5



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)

8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

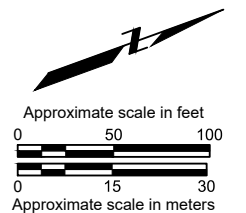
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polychlorinated Biphenyl (PCB) Concentrations

- All Aroclors Not Detected
- All Aroclors < Regional Screening Level (RSL)
- One or more Aroclors > RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Locations that were not sampled or analyzed have no color hi-lighting.
- The posted concentration category for a sample/sample duplicate pair is the higher of the two categories if they differ.
- * = sample location NS20, Area 8h, indicated concentration greater than RSL for one or more Aroclors at 2.5 feet below ground surface (bgs). Underlying sample at 5 feet bgs indicated RSL of one Aroclor greater than the RSL.
- Scrap heaps shown from locations identified in January/February 2011 field work



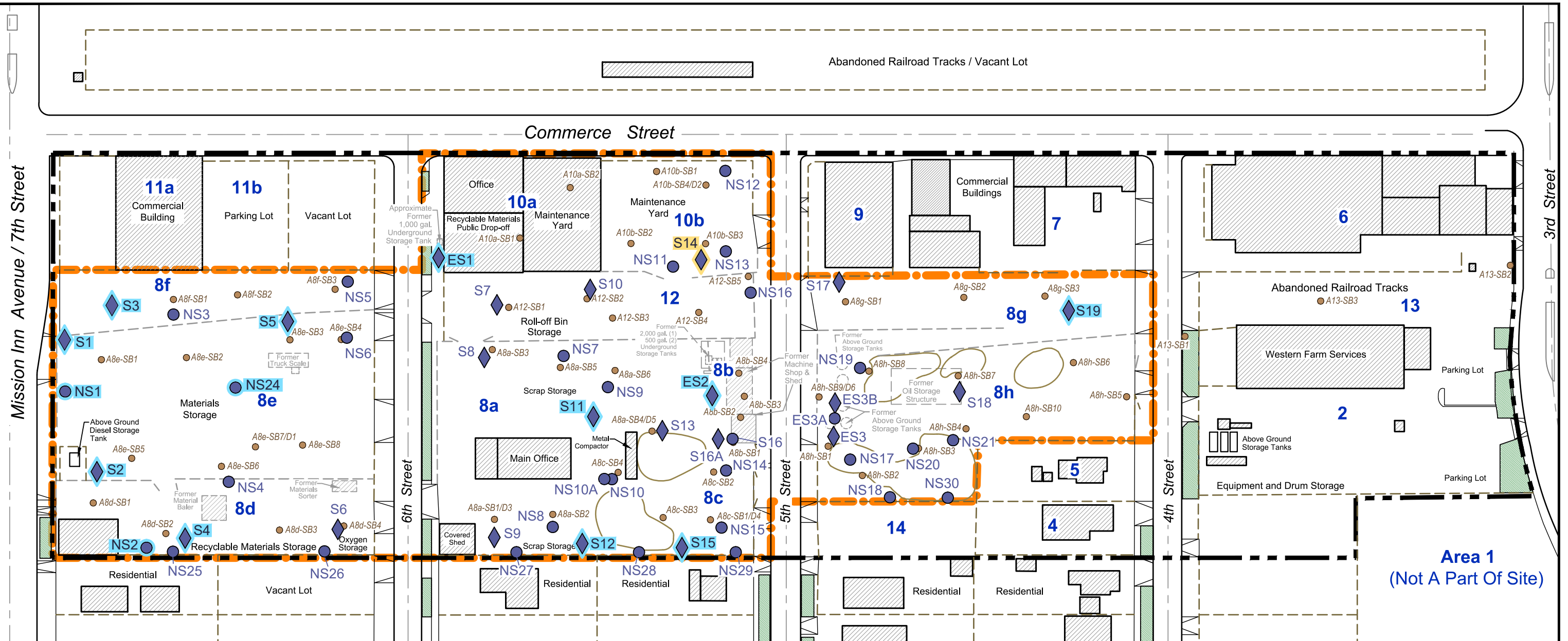
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

PCB CONCENTRATIONS IN SOIL
2.5 FEET
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040	Figure
Submitted By: grr	Drawn By: jrw	3c

Plot Date: 10/27/2015 9:34:38 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\010468.004 (RSI\RM)\ACAD\Results-2015.dwg, Lead: 0.25



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)

8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

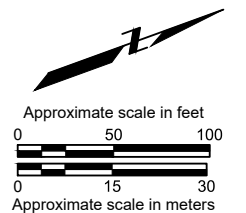
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Lead Concentrations

- Lead <Regional Screening Level (RSL) of 800 micrograms per kilogram
- Lead >RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Locations that were not sampled or analyzed have no color hi-lighting.
- The posted concentration category for sample/sample duplicate pairs is the higher of the two categories if they differ.
- Scrap heaps shown from locations identified in January/February 2011 field work



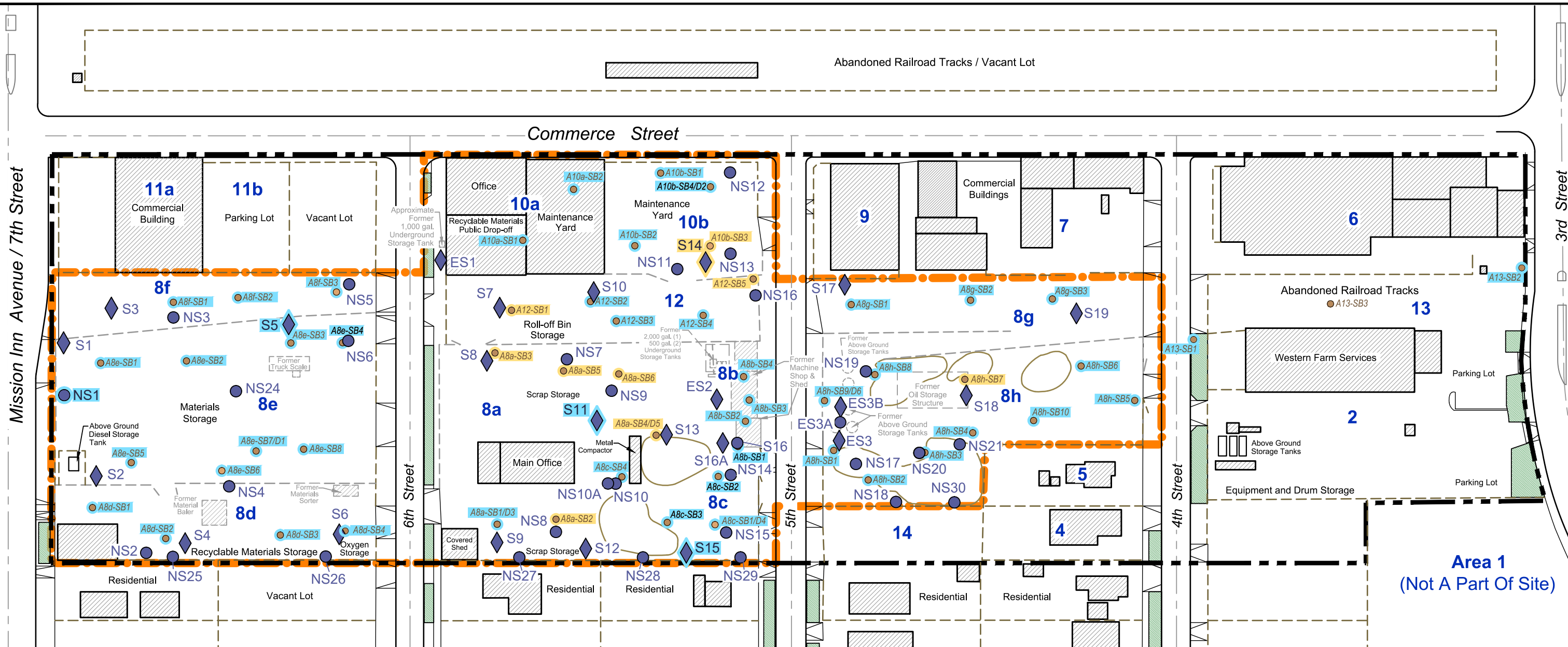
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

LEAD CONCENTRATIONS IN SOIL
0.25 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040	Figure
Submitted By: grr	Drawn By: jrw	4a

Plot Date: 10/27/2015 9:47:55 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.004 (Riverside Scrap Iron)\ACAD\Results-2015.dwg, Lead 0.5-1



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

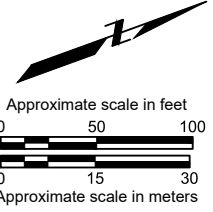
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Lead Concentrations

- Lead <Regional Screening Level (RSL) of 800 micrograms per kilogram
- Lead >RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Locations that were not sampled or analyzed have no color hi-lighting.
- Scrap heaps shown from locations identified in January/February 2011 field work



Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

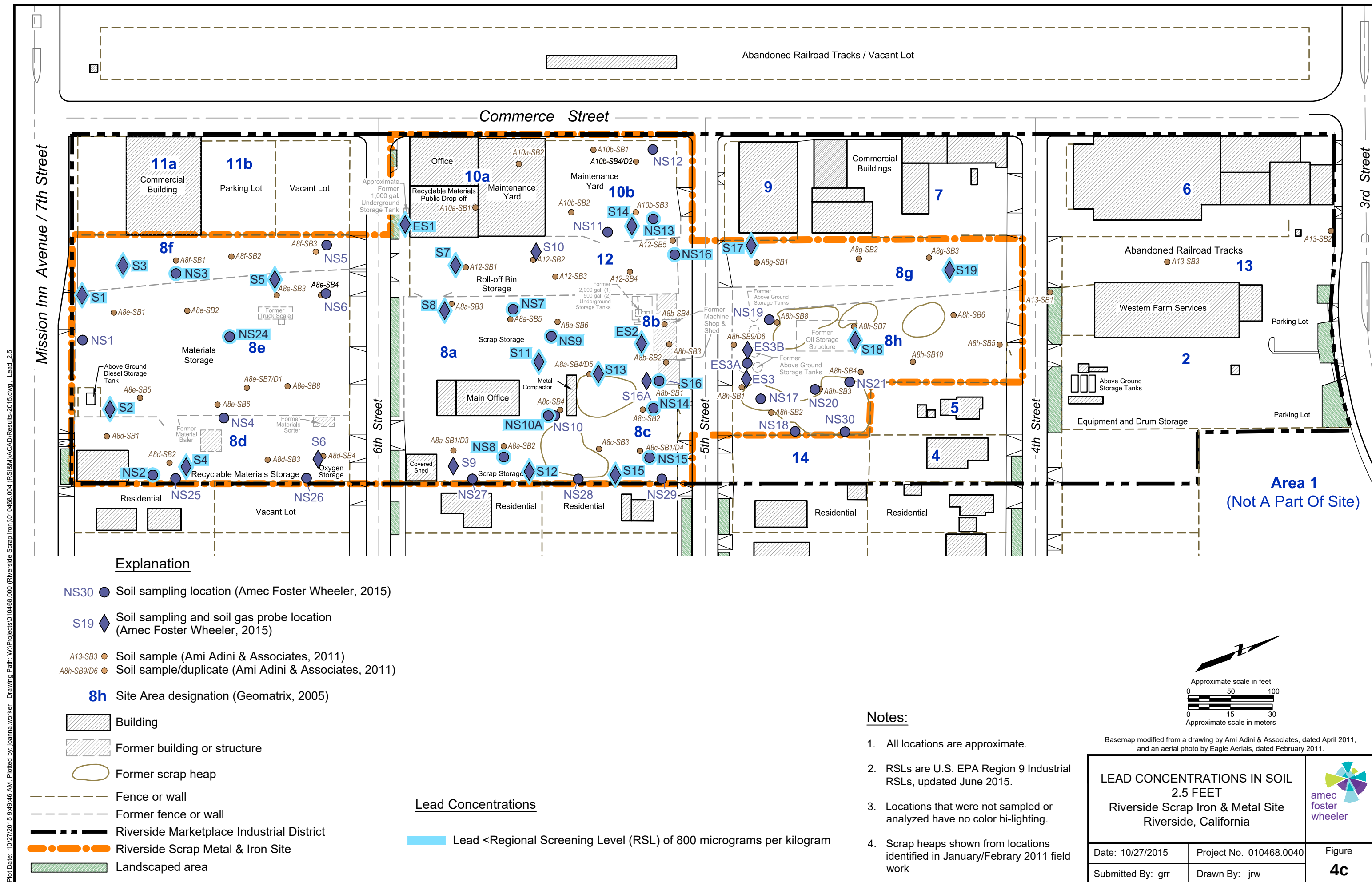
LEAD CONCENTRATIONS IN SOIL
0.5 - 1 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California



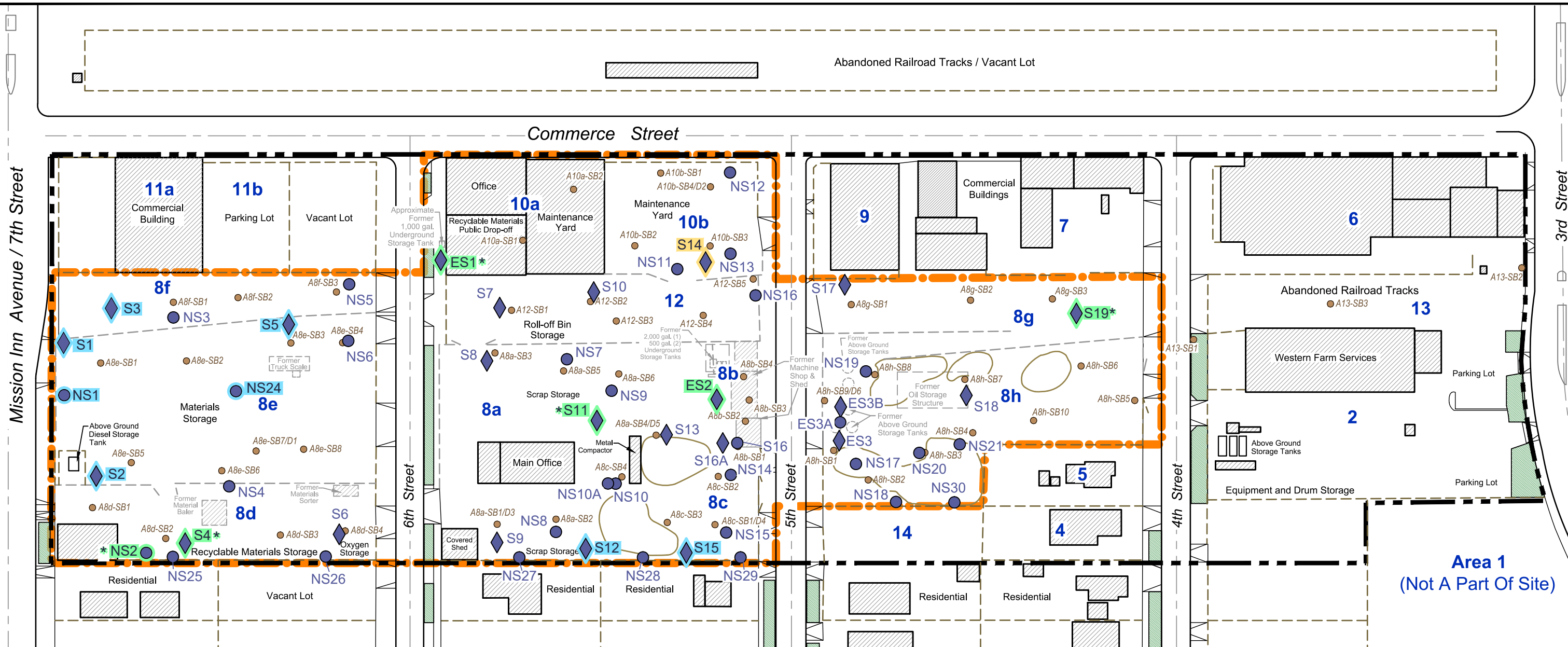
Date: 10/27/2015
Submitted By: grr

Project No. 010468.0040
Drawn By: jrw

Figure
4b



Plot Date: 10/27/2015 9:25:38 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\010468.004 (RSI)M\ACAD\Results-2015.dwg, PAH_0.25



Explanation

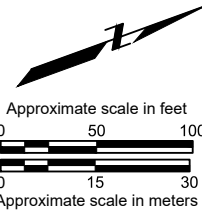
- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)
- Building
- Former building or structure
- Former scrap heap
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polynuclear Aromatic Hydrocarbon (PAH) Concentrations

- All PAHs with Regional Screening Level (RSL) Not Detected (* indicates laboratory reporting limits > RSL)
- All PAHs < RSL where available
- One or more PAHs > RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Scrap heaps shown from locations identified in January/February 2011 field work



Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

PAH CONCENTRATIONS IN SOIL
0.25 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California

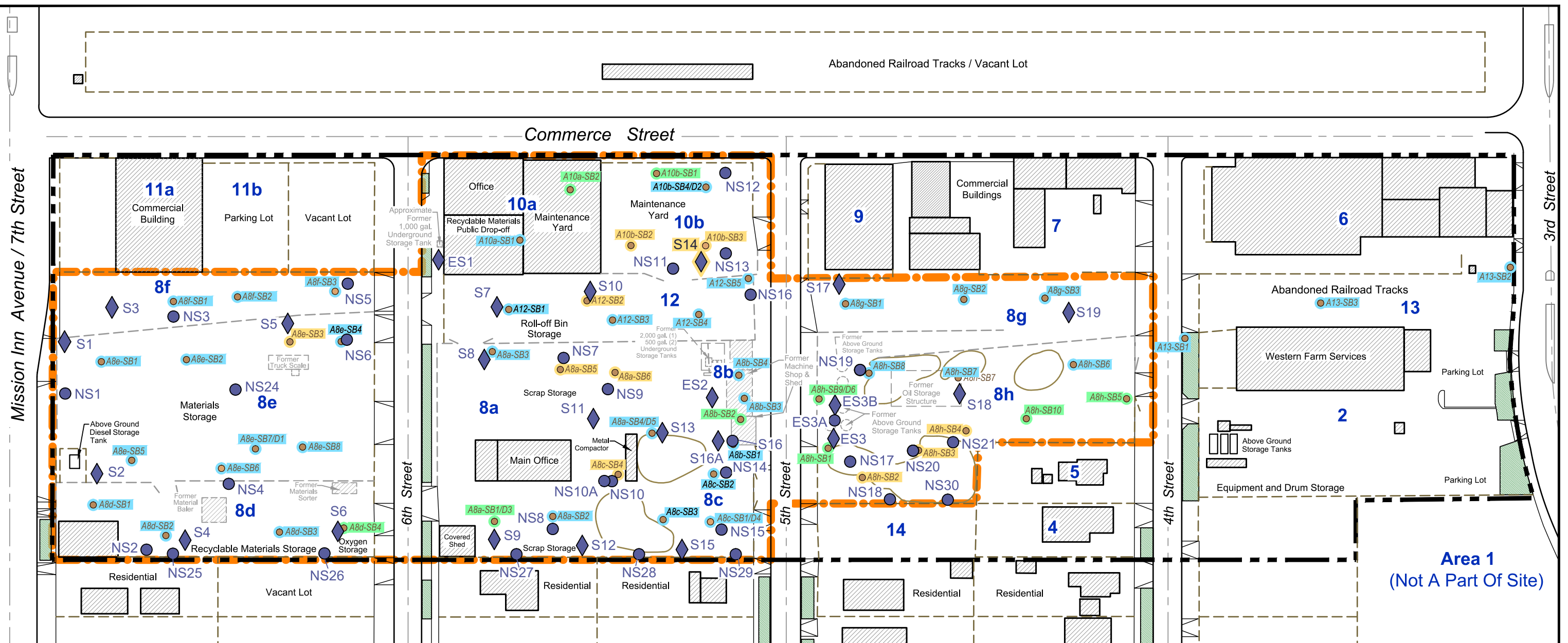


Date: 10/27/2015
Submitted By: grr

Project No. 010468.0040
Drawn By: jrw

Figure
5a

Plot Date: 10/27/2015 9:27:09 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.004 (Riverside Scrap Iron)\010468.004 (Riverside Scrap Iron)\ACAD\Results-2015.dwg, PAH 0.5-1



Explanation

- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)

- Building
- Former building or structure
- Former scrap heap

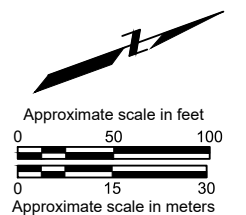
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polynuclear Aromatic Hydrocarbon (PAH) Concentrations

- All PAHs with Regional Screening Level (RSL) Not Detected
- All PAHs < RSL where available
- One or more PAHs > RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Scrap heaps shown from locations identified in January/February 2011 field work



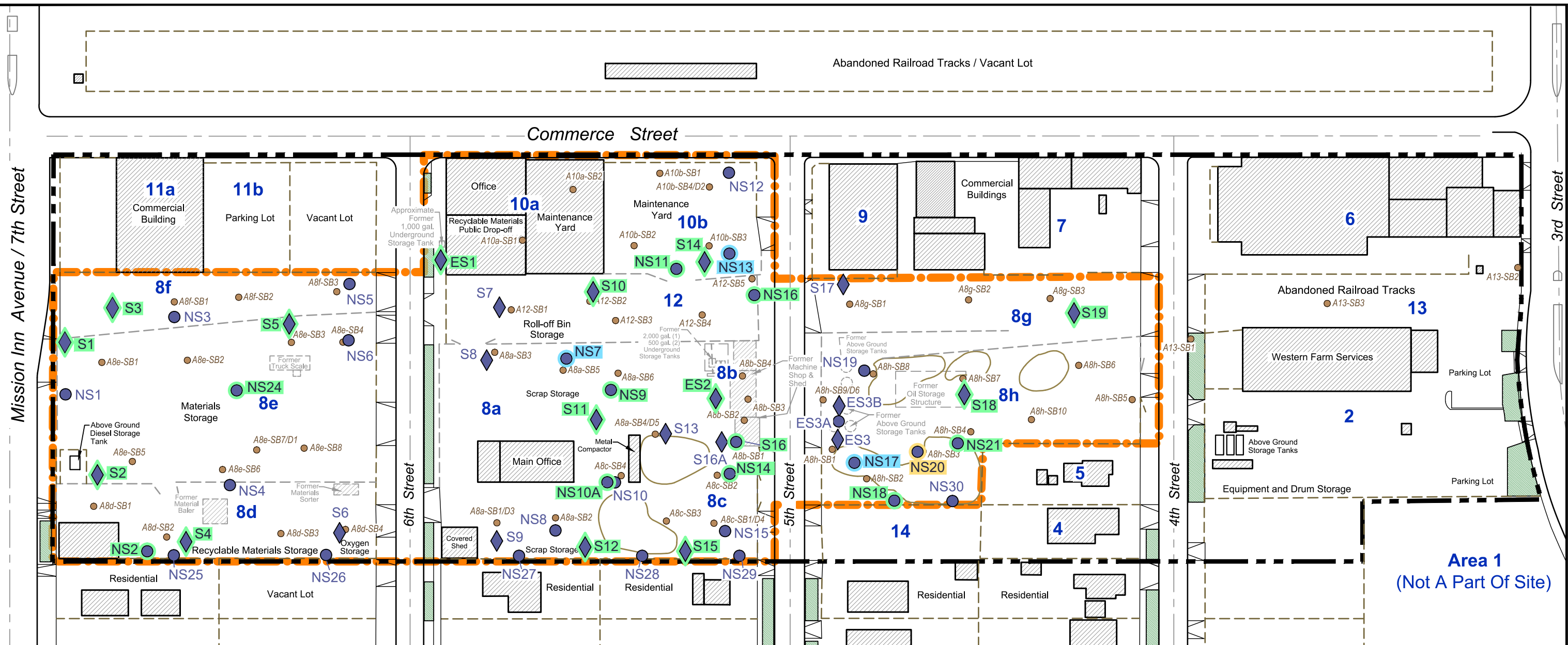
Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

PAH CONCENTRATIONS IN SOIL
0.5 - 1 FOOT
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040	Figure 5b
Submitted By: grr	Drawn By: jrw	

Plot Date: 10/27/2015 9:29:29 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.004 (Riverside Scrap Iron)\010468.004 (Riverside Scrap Iron)\ACAD\Results-2015.dwg, PAH 2.5



Explanation

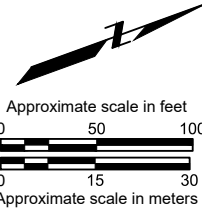
- NS30 ● Soil sampling location (Amec Foster Wheeler, 2015)
- S19 ◆ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)
- A13-SB3 ● Soil sample (Ami Adini & Associates, 2011)
- A8h-SB9/D6 ● Soil sample/duplicate (Ami Adini & Associates, 2011)
- 8h Site Area designation (Geomatrix, 2005)
- Building
- Former building or structure
- Former scrap heap
- Fence or wall
- Former fence or wall
- Riverside Marketplace Industrial District
- Riverside Scrap Metal & Iron Site
- Landscaped area

Polynuclear Aromatic Hydrocarbon (PAH) Concentrations

- All PAHs with Regional Screening Level (RSL) Not Detected
- All PAHs < RSL where available
- One or more PAHs > RSL

Notes:

- All locations are approximate.
- RSLs are U.S. EPA Region 9 Industrial RSLs, updated June 2015.
- Scrap heaps shown from locations identified in January/February 2011 field work



Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

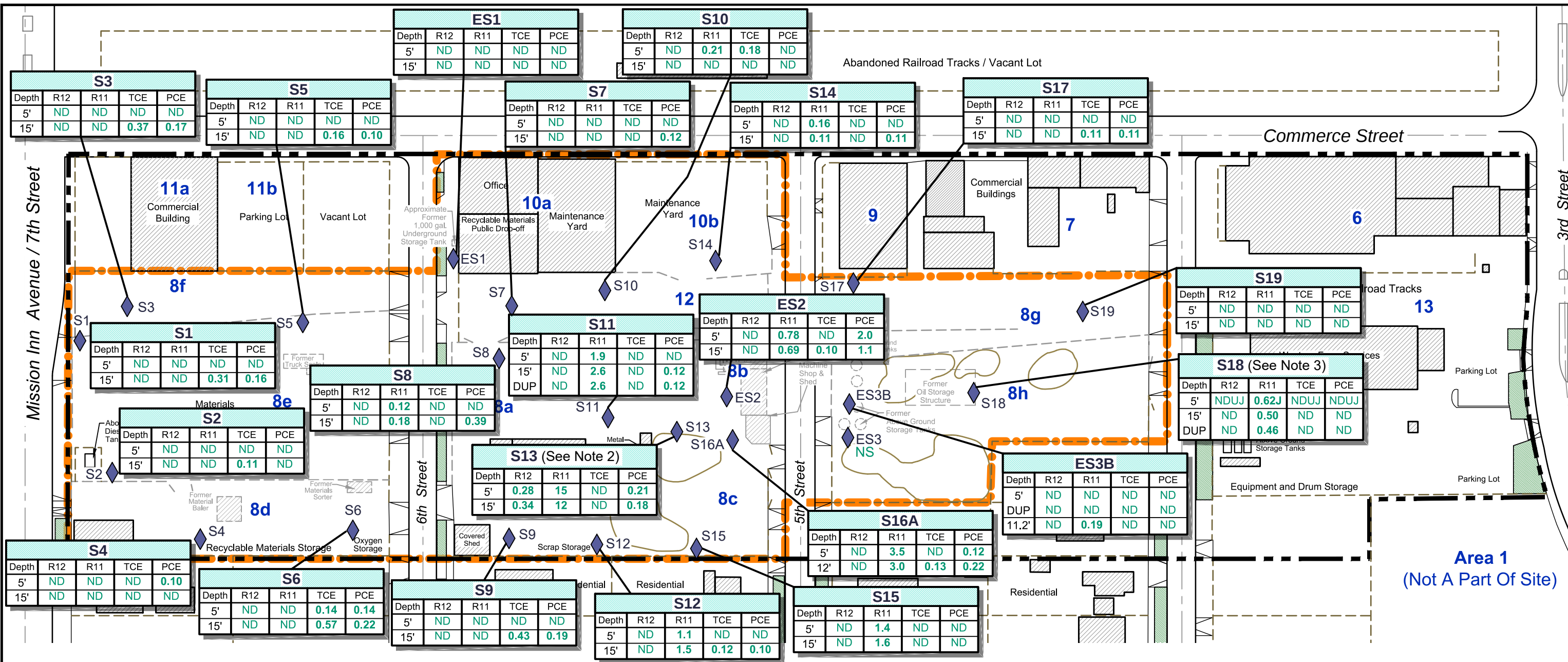
PAH CONCENTRATIONS IN SOIL
2.5 FEET
Riverside Scrap Iron & Metal Site
Riverside, California



Date: 10/27/2015	Project No. 010468.0040
Submitted By: grr	Drawn By: jrw

Figure
5c

Plot Date: 10/27/2015 9:55:10 AM, Plotted by: joanna worker, Drawing Path: W:\Projects\010468.000 (Riverside Scrap Iron)\010468.004 (RSI&M)\ACAD\Results-2015.dwg, Soil Gas



Explanation

S19 ♦ Soil sampling and soil gas probe location (Amec Foster Wheeler, 2015)

Sample Name					
Depth	R12	R11	TCE	PCE	
5'	µg/L	µg/L	µg/L	µg/L	
15'	µg/L	µg/L	µg/L	µg/L	

Results at depth indicated in feet below ground surface for Volatile Organic Compounds (VOCs) in micrograms per liter (µg/L)

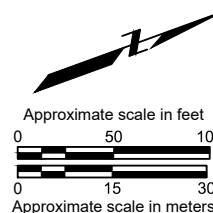
R12 Freon 12 (dichlorodifluoromethane)
R11 Freon 11 (trichlorofluoromethane)
TCE Trichloroethene
PCE Tetrachloroethene
DUP Duplicate sample
ND Not detected at laboratory limit of <0.10
NS Not sampled
J Estimated concentration based on detection of leak detection compound
UJ Estimated reporting limit based on detection of leak detection compound

8h Site Area designation (Geomatrix, 2005)

Building
Former building or structure
Former scrap heap
Fence or wall
Former fence or wall
Riverside Marketplace Industrial District
Riverside Scrap Metal & Iron Site
Landscaped area

Notes:

- All locations are approximate.
- Chloromethane detected at 0.49 µg/L in the soil gas probe S13 at depth of 5 feet below ground surface (bgs).
- Leak detection compound Isopropyl alcohol detected at 3.3 µg/L in the soil gas probe S18 at depth of 5 feet bgs.
- Scrap heaps shown from locations identified in January/February 2011 field work



Basemap modified from a drawing by Ami Adini & Associates, dated April 2011, and an aerial photo by Eagle Aerials, dated February 2011.

VOC CONCENTRATIONS IN
SOIL GAS
Riverside Scrap Iron & Metal Site
Riverside, California



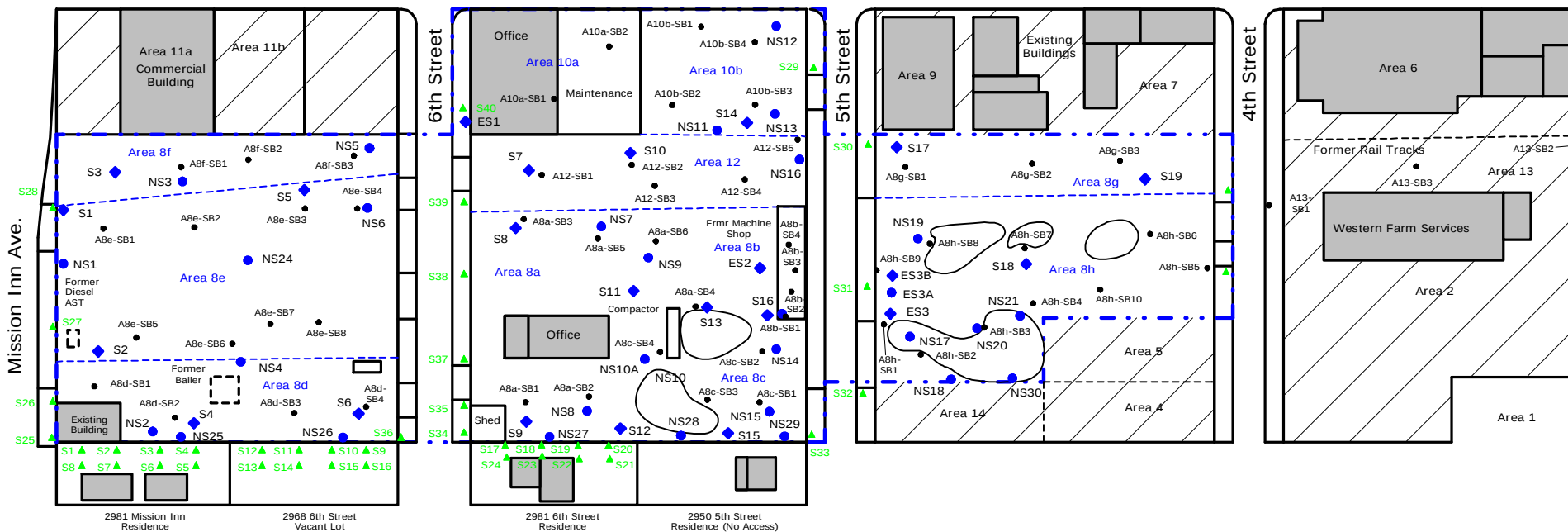
Date: 10/27/2015
Submitted By: grr
Project No. 010468.0040
Drawn By: jrw

Figure
6

APPENDIX E.

Historical Off-Site Sampling Locations

Commerce Street



See Figure 3A

See Figure 3B

LEGEND

- Soil Sampling Locations (Amec 2015)
- ◆ Soil/Soil Gas Sampling Locations (Amec 2015)
- Soil Sampling Locations (AAA 2011)
- ▲ Off-Site Sampling Locations

FIGURE 2
GENERAL SITE PLAN
RIVERSIDE SCRAP IRON & METAL
Riverside, California





Scale
1-inch = 40 ft



North

FIGURE 3A
Off-Site Soil Sampling Locations
Riverside Scrap
Riverside CA



APPENDIX F.

Summary Table for PCB Delineation

Table 1
Polychlorinated Biphenyls (PCBs) in Soil
Remedial Action Plan
Riverside Scrap Iron & Metal Site
Riverside, California

Sample/ Boring ID	Area	Sample Location	2018 Investigation Step-Out Sample Designation or Information	Sample Date	depth (feet bgs)	EPA Method 8082 (mg/kg)										Total PCBs
						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
Area 8A																
A8a-SB1	8a	SB1	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.199	<0.05				0.199
A8a-SB2	8a	SB2	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.79	<0.05				0.79
A8a-SB3	8a	SB3	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	2.96	2.66	<0.05				5.62
A8a-SB4	8a	SB4	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8a-SB5	8a	SB5	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	8.15	4.6	<0.05				12.75
A8a-SB6	8a	SB6	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	26.8	5.95	<0.05				32.75
NS9	8a	NS9	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S12	8a	S12	NA	8/12/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S9	8a	S9	NA	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	.120J	<0.02UJ	0.280J	0.130J				0.53
S11	8a	S11	NA	8/13/2015	0.25	<0.2	<0.2	<0.2	1.6	<0.2	1.4J	0.43				3.43
S11	8a	S11	NA	8/13/2015	1	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2				All ND
S11	8a	S11	NA	8/13/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S8	8a	S8	NA	8/13/2015	2.5	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2				All ND
S13	8a	S13	NA	8/14/2015	0.25	<0.02	<0.02	<0.02	4.2	<0.02	1.6	0.3				6.1
NS7	8a	NS7	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	0.055	<0.02	0.11	0.058				0.223
NS8	8a	NS8	NA	8/21/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	2.2J	<0.02UJ	.350J	0.110J				2.66
NS8	8a	NS8	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
Area 8B																
A8b-SB2	8b	SB2	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8b-SB3	8b	SB3	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	0.18	0.274	<0.05				0.454
A8b-SB4	8b	SB4	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.903	<0.05				0.903
ES2	8b	ES2	NA	8/14/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	22J				22
ES2	8b	ES2	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S16	8b	S16	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
A8b-SB1	8b	SB1	Initial >50 Sample	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	369	125	<0.05				494
A8b-SB1X-2.5	8b	SB1	X	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
A8b-SB1A-1	8b	SB1	A	1/23/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
A8b-SB1A-2.5	8b	SB1	A	1/23/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	All ND
A8b-SB1B-1	8b	SB1	B	1/23/2018	1	<0.054	0.25	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	0.25
A8b-SB1B-2.5	8b	SB1	B	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
A8b-SB1C-1	8b	SB1	C	1/23/2018	1	<0.055	<0.055	<0.055	<0.055	0.26	0.14	<0.055	<0.055	<0.055	<0.055	0.4
A8b-SB1C-2.5	8b	SB1	C	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
A8b-SB1D-1	8b	SB1	D	1/23/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
A8b-SB1D-2.5	8b	SB1	D	1/23/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND

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Remedial Action Plan
Riverside Scrap Iron & Metal Site
Riverside, California

Sample/ Boring ID	Area	Sample Location	2018 Investigation Step-Out Sample Designation or Information	Sample Date	depth (feet bgs)	EPA Method 8082 (mg/kg)										Total PCBs
						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
Area 8C																
A8c-SB1	8c	SB1	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05			All ND
A8c-SB2	8c	SB2	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	10.4	1.4	<0.05				11.8
A8c-SB3	8c	SB3	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	24.3	2.67	<0.05				26.97
A8c-SB4	8c	SB4	NA	1/27/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
NS14	8c	NS14	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS15	8c	NS15	NA	8/14/2015	0.25	<0.02	<0.02	<0.02	1.5	<0.02	1.6	0.29				3.39
NS15	8c	NS15	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS10A	8c	NS10A	NA	8/21/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	.110J	<0.02UJ	.200J	0.100J				0.41
Area 8D																
A8d-SB1	8d	SB1	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8d-SB2	8d	SB2	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	5.84	<0.05				5.84
A8d-SB3	8d	SB3	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.903	<0.05				0.903
A8d-SB4	8d	SB4	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.372	<0.05				0.372
NS25	8d	NS25	NA	8/18/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	1.3J	0.140J				1.44
NS25	8d	NS25	NA	8/18/2015	1	<0.02	<0.02	<0.02	<0.02	<0.02	0.042	<0.02				0.042
NS26	8d	NS26	NA	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	0.32J	<0.02UJ	12J	1.600J				13.92
NS26	8d	NS26	NA	8/12/2015	1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS27	8d	NS27	NA	8/12/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.012	0.097				0.109
NS28	8d	NS28	NA	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	2.0J	<0.02UJ	0.86J	.180J				3.04
NS28	8d	NS28	NA	8/12/2015	1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS29	8d	NS29	NA	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	0.058J	<0.02UJ	0.11J	0.089J				0.257
NS30	8d	NS30	NA	8/21/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	0.044J	0.045J				0.089
S4	8d	S4	NA	8/18/2015	0.25	<0.02	<0.02	<0.02	0.14	<0.02	0.94	0.071				1.151
S4	8d	S4	NA	8/18/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S5	8d	S5	NA	8/12/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.17	0.093				0.263
S5	8d	S5	NA	8/12/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS2	8d	NS2	NA	8/18/2015	0.25	<0.02	<0.02	<0.02	8.6	<0.02	28	2.3J				38.9
NS2	8d	NS2	Initial >50 Sample	8/18/2015	1	<0.02UJ	<0.02UJ	<0.02UJ	62J	<0.02UJ	290J	34J				386
NS2	8d	NS2	Initial >50 Sample	8/18/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	0.023	<0.02				0.023
NS2A-1	8d	NS2	A	1/23/2018	1	<55	<55	<55	<55	500	670	<55	<55	<55		1170
NS2A-2.5	8d	NS2	A	1/23/2018	2.5	<0.054	<0.054	<0.054	<0.054	0.21	0.41	<0.054	<0.054	<0.054		0.62
NS2B-1	8d	NS2	B	1/23/2018	1	<53	<53	<53	<53	350	520	<53	<53	<53		870
NS2B-2.5	8d	NS2	B	1/23/2018	2.5	<0.27	<0.27	<0.27	<0.27	1.3	1.8	<0.27	<0.27	<0.27		3.1
NS2C-1	8d	NS2	C	1/23/2018	1	<5.7	<5.7	<5.7	<5.7	39	71	<5.7	<5.7	<5.7		110
NS2C-2.5	8d	NS2	C	1/23/2018	2.5	<0.28	<0.28	<0.28	<0.28	0.65	1.5	<0.28	<0.28	<0.28		2.15
NS2D-1	8d	NS2	D	1/23/2018	1	<55	<55	<55	<55	150	280	<55	<55	<55		430
NS2D-2.5	8d	NS2	D	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	0.12	0.2	<0.055	<0.055	<0.055		0.32
NS2E-0.5	8d	NS2	E	5/18/2018	0.5	<5.4	<5.4	<5.4	<5.4	17	23	<5.4	<5.4	<5.4		40
NS2E-1	8d	NS2	E	5/18/2018	1	<0.55	<0.55	<0.55	<0.55	1.1	1.8	<0.55	<0.55	<0.55		2.9
NS2F-0.5	8d	NS2	F	5/18/2018	0.5	<0.053	<0.053	<0.053	<0.053	0.2	0.11	<0.053	<0.053	<0.053		0.31
NS2F-1	8d	NS2	F	5/18/2018	1	<5.6	<5.6	<5.6	<5.6	11	13	<5.6	<5.6	<5.6		24
NS2G-0.5	8d	NS2	G	5/18/2018	0.5	<0.55	<0.55	<0.55	<0.55	4.3	8.3	<0.55	<0.55	<0.55		12.6
NS2G-1	8d	NS2	G	5/18/2018	1	<5.3	<5.3	<5.3	<5.3	13	28	<5.3	<5.3	<5.3		41
NS2H-0.5	8d	NS2	H	5/18/2018	0.5	<5.4	<5.4	<5.4	<5.4	210	330	<5.4	<5.4	<5.4		540
NS2H-1	8d	NS2	H	5/18/2018	1	<2.7	<2.7	<2.7	<2.7	7.3	14	<2.7	<2.7	<2.7		21.3

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						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
NS2I-0.5	8d	NS2	I	5/18/2018	0.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
NS2I-1	8d	NS2	I	5/18/2018	1	<0.51	<0.51	<0.51	<0.51	0.78	2	<0.51	<0.51	<0.51	<0.51	2.78
NS2K-0.5	8d	NS2	K	5/18/2018	0.5	<0.051	<0.051	<0.051	<0.051	0.21	0.12	<0.051	<0.051	<0.051	<0.051	0.33
NS2K-1	8d	NS2	K	5/18/2018	1	<5.3	<5.3	<5.3	<5.3	43	67	<5.3	<5.3	<5.3	<5.3	110
NS2KK-2.5	8d	NS2	KK	8/3/2018	2.5	<0.053	<0.053	<0.053	<0.053	0.082	0.16	<0.053	<0.053	<0.053	<0.053	0.242
NS2KK1-1	8d	NS2	KK1	8/3/2018	1	<2.6	<2.6	<2.6	<2.6	6.8	29	<2.6	<2.6	<2.6	<2.6	35.8
NS2L-0.5	8d	NS2	L	5/18/2018	0.5	<0.11	<0.11	<0.11	<0.11	0.49	0.26	<0.11	<0.11	<0.11	<0.11	0.75
NS2L-1	8d	NS2	L	5/18/2018	1	<0.54	<0.54	<0.54	<0.54	75	280	<0.54	<0.54	<0.54	<0.54	355
NS2LL-2.5	8d	NS2	LL	8/3/2018	2.5	<0.26	<0.26	<0.26	<0.26	<0.26	1.2	<0.26	<0.26	<0.26	<0.26	1.2
NS2M-0.5	8d	NS2	M	5/18/2018	0.5	<5.4	<5.4	<5.4	<5.4	98	86	<5.4	<5.4	<5.4	<5.4	184
NS2M-1	8d	NS2	M	5/18/2018	1	<0.57	<0.57	<0.57	<0.57	1.4	3	<0.57	<0.57	<0.57	<0.57	4.4
NS2N-0.5	8d	NS2	N	5/18/2018	0.5	<0.5	<0.5	<0.5	<0.5	3.2	<0.5	<0.5	<0.5	<0.5	<0.5	3.2
NS2N-1	8d	NS2	N	5/18/2018	1	<54	<54	<54	<54	410	670	<54	<54	<54	<54	1080
NS2NN1-1	8d	NS2	NN	8/3/2018	1	<1.1	<1.1	<1.1	<1.1	5.3	12	<1.1	<1.1	<1.1	<1.1	17.3
NS2NN-2.5	8d	NS2	NN	8/3/2018	2.5	<5.3	<5.3	<5.3	<5.3	14	30	<5.3	<5.3	<5.3	<5.3	44
NS2O-0.5	8d	NS2	O	5/18/2018	0.5	<0.51	<0.51	<0.51	<0.51	3.9	<0.51	<0.51	<0.51	<0.51	<0.51	3.9
NS2O-1	8d	NS2	O	5/18/2018	1	<5.2	<5.2	<5.2	<5.2	21	43	<5.2	<5.2	<5.2	<5.2	64
NS2OO1-1	8d	NS2	OO	8/3/2018	1	<0.53	<0.53	<0.53	<0.53	4.5	4	<0.53	<0.53	<0.53	<0.53	8.5
NS2OO-2.5	8d	NS2	OO	8/3/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	0.065	<0.054	<0.054	<0.054	<0.054	0.065
NS2P-0.5	8d	NS2	P	5/18/2018	0.5	<0.054	<0.054	<0.054	<0.054	0.19	<0.054	<0.054	<0.054	<0.054	<0.054	0.19
NS2P-1	8d	NS2	P	5/18/2018	1	<5.4	<5.4	<5.4	<5.4	44	25	<5.4	<5.4	<5.4	<5.4	69
NS2PP1-1	8d	NS2	PP	8/3/2018	1	<5.3	<5.3	<5.3	<5.3	88	53	<5.3	<5.3	<5.3	<5.3	141
NS2PP-2.5	8d	NS2	PP	8/3/2018	2.5	<0.054	<0.054	<0.054	<0.054	0.11	0.13	<0.054	<0.054	<0.054	<0.054	0.24
NS2PP1-2.5	8d	NS2	PP1	8/3/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
NS2PP2-1	8d	NS2	PP2	8/3/2018	1	<0.52	<0.52	<0.52	<0.52	3.4	3.5	<0.52	<0.52	<0.52	<0.52	6.9
NS2PP3-1.0	8d	NS2	PP3	9/27/2018	1	<5.2	<5.2	<5.2	<5.2	42	37	<5.2	<5.2	<5.2	<5.2	79
NS2PP3-2.5	8d	NS2	PP3	9/27/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
NS2PP4-1.0	8d	NS2	PP4	9/27/2018	1	<0.52	<0.52	<0.52	<0.52	1.9	4.3	<0.52	<0.52	<0.52	<0.52	6.2
NS2PP5-1.0	8d	NS2	PP5	9/27/2018	1	<55	<55	<55	<55	630	760	<55	<55	<55	<55	1390
NS2PP5-2.5	8d	NS2	PP5	9/27/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	1.2	<0.054	<0.054	<0.054	<0.054	1.2
NS2PP6-1.0	8d	NS2	PP6	9/27/2018	1	<5.4	<5.4	<5.4	<5.4	310	600	<5.4	<5.4	<5.4	<5.4	910
NS2PP6-2.5	8d	NS2	PP6	9/27/2018	2.5	<0.054	<0.054	<0.054	<0.054	0.19	0.25	<0.054	<0.054	<0.054	<0.054	0.44
NS2PP7-1.0	8d	NS2	PP7	9/27/2018	1	<0.053	<0.053	<0.053	<0.053	<0.053	0.12	<0.053	<0.053	<0.053	<0.053	0.12
NS2PP7-2.5	8d	NS2	PP7	9/27/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
NS2PP0-1	8d	NS2	PP9	9/27/2018	1	<0.052	<0.052	<0.052	<0.052	0.61	1	<0.052	<0.052	<0.052	<0.052	1.61
NS2PP9-2.5	8d	NS2	PP9	9/27/2018	2.5	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	All ND
NS2PP10-1.0	8d	NS2	PP10	9/27/2018	1	<0.053	<0.053	<0.053	<0.053	11	19	<0.053	<0.053	<0.053	<0.053	30
NS2PP10-2.5	8d	NS2	PP10	9/27/2018	2.5	<0.052	<0.052	<0.052	<0.052	0.13	0.1	<0.052	<0.052	<0.052	<0.052	0.23
NS2Q-0.5	8d	NS2	Q	5/18/2018	0.5	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	All ND
NS2Q-1	8d	NS2	Q	5/18/2018	1	<0.054	<0.054	<0.054	<0.054	0.075	0.068	<0.054	<0.054	<0.054	<0.054	0.143
S6	8d	S6	Initial >50 Sample	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	16J	<0.02UJ	51J	6.10J	<0.054	<0.054	<0.054	73.1
S6X-2.5	8d	S6	X	1/23/2018	2.5	<0.054	<0.054	<0.054	<0.054	0.4	0.52	<0.054	<0.054	<0.054	<0.054	0.92
S6A-1	8d	S6	A	1/23/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	0.062	<0.054	<0.054	<0.054	<0.054	0.062
S6A-2.5	8d	S6	A	1/23/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	0.12	<0.054	<0.054	<0.054	<0.054	0.12
S6B-1	8d	S6	B	1/23/2018	1	<0.053	<0.053	<0.053	<0.053	0.096	0.44	<0.053	<0.053	<0.053	<0.053	0.536
S6B-2.5	8d	S6	B	1/23/2018	2.5	<0.053	<0.053	<0.053	<0.053	0.078	0.32	<0.053	<0.053	<0.053	<0.053	0.398

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						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
S6C-1	8d	S6	C	1/23/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054		All ND
S6C-2.5	8d	S6	C	1/23/2018	2.5	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053		All ND
S6D-1	8d	S6	D	1/23/2018	1	<0.054	<0.054	<0.054	<0.054	0.39	0.66	<0.054	<0.054	<0.054		1.05
S6D-2.5	8d	S6	D	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
Area 8E																
A8e-SB1	8e	SB1	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.219	<0.05				0.219
A8e-SB2	8e	SB2	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.109	<0.05				0.109
A8e-SB3	8e	SB3	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8e-SB5	8e	SB5	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8e-SB6	8e	SB6	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	1.43	<0.05				1.43
A8e-SB7	8e	SB7	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8e-SB8	8e	SB8	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
NS1	8e	NS1	NA	8/10/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.094	0.057				0.151
NS24	8e	NS24	NA	8/10/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.024	0.021				0.045
NS24	8e	NS24	NA	8/10/2015	2.5	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ	<0.02UJ				All ND
NS4	8e	NS4	NA	8/10/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	0.13	0.033				0.163
NS6	8e	NS6	NA	8/10/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S1	8e	S1	NA	8/11/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S1	8e	S1	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S2	8e	S2	NA	8/12/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.051	<0.02				0.051
S2	8e	S2	NA	8/12/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
A8e-SB4	8e	SB4	Initial >50 Sample	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	62.8				62.8
A8e-SB4X-2.5	8e	SB4	X	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
A8e-SB4A-1	8e	SB4	A	1/23/2018	1	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
A8e-SB4A-2.5	8e	SB4	A	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
A8e-SB4B-1	8e	SB4	B	1/23/2018	1	<0.055	<0.055	<0.055	<0.055	0.35	0.39	<0.055	<0.055	<0.055		0.74
A8e-SB4B-2.5	8e	SB4	B	1/23/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
A8e-SB4C-1	8e	SB4	C	1/23/2018	1	<5.7	<5.7	<5.7	<5.7	48	76	<5.7	<5.7	<5.7		124
A8e-SB4C-2.5	8e	SB4	C	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
A8e-SB4D-1	8e	SB4	D	1/23/2018	1	<0.056	<0.056	<0.056	<0.056	0.16	0.39	<0.056	<0.056	<0.056		0.55
A8e-SB4D-2.5	8e	SB4	D	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
A8e-SB4E-0.5	8e	SB4	E	5/18/2018	0.5	<0.053	<0.053	<0.053	<0.053	0.17	0.2	<0.053	<0.053	<0.053		0.37
A8e-SB4E-1	8e	SB4	E	5/18/2018	1	<0.055	<0.055	<0.055	<0.055	0.11	0.072	<0.055	<0.055	<0.055		0.182
A8e-SB4F-0.5	8e	SB4	F	5/18/2018	0.5	<0.053	<0.053	<0.053	<0.053	0.18	0.25	0.11	<0.053	<0.053		0.54
A8e-SB4F-1	8e	SB4	F	5/18/2018	1	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057		All ND
A8e-SB4G-0.5	8e	SB4	G	5/18/2018	0.5	<0.052	<0.052	<0.052	<0.052	0.17	0.71	<0.052	<0.052	<0.052		0.88
A8e-SB4G-1	8e	SB4	G	5/18/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054		All ND
Area 8F																
A8f-SB1	8f	SB1	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8f-SB2	8f	SB2	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.161	<0.05				0.161
A8f-SB3	8f	SB3	NA	1/25/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	3.07	<0.05				3.07
NS3	8f	NS3	NA	8/10/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.047	0.043				0.09
NS5	8f	NS5	NA	8/10/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S3	8f	S3	NA	8/11/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	0.076	0.047				0.123
S3	8f	S3	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
Area 8G																

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Riverside Scrap Iron & Metal Site
Riverside, California

Sample/ Boring ID	Area	Sample Location	2018 Investigation Step-Out Sample Designation or Information	Sample Date	depth (feet bgs)	EPA Method 8082 (mg/kg)										Total PCBs
						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
A8g-SB1	8g	SB1	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8g-SB2	8g	SB2	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8g-SB3	8g	SB3	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
S17	8g	S17	NA	8/14/2015	0.25	<0.02	<0.02	<0.02	0.026	<0.02	0.06	0.03				0.116
S19	8g	S19	NA	8/14/2015	0.25	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
S19	8g	S19	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
Area 8H																
A8h-SB1	8h	SB1	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8h-SB10	8h	SB10	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8h-SB2	8h	SB2	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	1.3	<0.05				1.3
A8h-SB3	8h	SB3	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	1.18	0.699	<0.05				1.879
A8h-SB4	8h	SB4	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	1.57	0.552	<0.05				2.122
A8h-SB5	8h	SB5	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A8h-SB6	8h	SB6	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	0.054	<0.05	<0.05				0.054
A8h-SB7	8h	SB7	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	1.73	1.81	<0.05				3.54
A8h-SB8	8h	SB8	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	1.49	0.536	<0.05				2.026
A8h-SB9	8h	SB9	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
ES3	8h	ES3	NA	8/14/2015	0.25	<0.02	<0.02	<0.02	0.2	<0.02	0.41	0.17				0.78
S18	8h	S18	NA	8/14/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS17	8h	NS17	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS18	8h	NS18	NA	8/21/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	.250J	<0.02UJ	.420J	0.150J				0.82
NS18	8h	NS18	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS19	8h	NS19	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS20	8h	NS20	NA	8/21/2015	2.5	<0.02UJ	<0.02UJ	<0.02UJ	3.2J	<0.02UJ	1.500J	1.1J				5.8
NS20	8h	NS20	NA	8/21/2015	5	<0.02UJ	<0.02UJ	<0.02UJ	1.1J	<0.02UJ	.480J	0.290J				1.87
NS21	8h	NS21	NA	8/21/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
Area 10A																
A10a-SB1	10a	SB1	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
A10a-SB2	10a	SB2	NA	1/28/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05				All ND
ES1	10a	ES1	NA	8/19/2015	0.25	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2				All ND
ES1	10a	ES1	NA	8/19/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
Area 10B																
A10b-SB1	10b	SB1	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.112	<0.05				0.112
A10b-SB2	10b	SB2	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	2.19	1.29	<0.05				3.48
A10b-SB3	10b	SB3	NA	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	7.12	<0.05				7.12
S15	10b	S15	NA	8/12/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	0.230J	<0.02UJ	0.095J	0.023J				0.348
S15	10b	S15	NA	8/12/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				0
NS11	10b	NS11	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	0.039	0.027				0.066
NS12	10b	NS12	NA	8/13/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02				All ND
NS13	10b	NS13	NA	8/13/2015	2.5	<0.02	<0.02	<0.02	0.071	<0.02	0.076	0.032				0.179
S14	10b	S14	Initial >50 Sample	8/13/2015	1	<0.2	<0.2	<0.2	48J	<0.02	50J	18.0J				116
S14	10b	S14	Initial >50 Sample	8/13/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	0.038	<0.02				0.038
S14	10b	S14	Initial >50 Sample	8/13/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	2.9J	<0.02UJ	15J	9.30J				27.2
S14A-1	10b	S14	A	1/23/2018	1	<5.7	<5.7	<5.7	<5.7	50	33	22	<5.7	<5.7		105
S14A-2.5	10b	S14	A	1/23/2018	2.5	<0.057	<0.057	<0.057	<0.057	0.097	<0.057	<0.057	<0.057	<0.057		0.097
S14B-1	10b	S14	B	1/23/2018	1	<2.8	<2.8	<2.8	<2.8	14	13	10	<2.8	<2.8		37

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Sample/ Boring ID	Area	Sample Location	2018 Investigation Step-Out Sample Designation or Information	Sample Date	depth (feet bgs)	EPA Method 8082 (mg/kg)									
						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260			Total PCBs
S14B-2.5	10b	S14	B	1/23/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	0
S14C-1	10b	S14	C	1/23/2018	1	<0.54	<0.54	<0.54	<0.54	8.5	11	11	<0.54	<0.54	30.5
S14C-2.5	10b	S14	C	1/23/2018	2.5	<5.5	<5.5	<5.5	<5.5	82	47	8.9	<5.5	<5.5	137.9
S14C-5	10b	S14	C	1/23/2018	5	<0.055	<0.055	<0.055	<0.055	0.28	0.23	<0.055	<0.055	<0.055	0.51
S14D-1	10b	S14	D	1/23/2018	1	<3	<3	<3	<3	43	36	22	<3	<3	101
S14D-2.5	10b	S14	D	1/23/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	All ND
S14BB-0.5	10b	S14	BB	5/18/2018	0.5	<0.52	<0.52	<0.52	<0.52	9.3	7.8	8.3	<0.52	<0.52	25
S14BB-1	10b	S14	BB	5/18/2018	1	<0.54	<0.54	<0.54	<0.54	7.1	8.4	9.2	<0.54	<0.54	25
S14E-0.5	10b	S14	E	5/18/2018	0.5	<0.55	<0.55	<0.55	<0.55	6.7	<0.55	260	<0.55	<0.55	270
S14E-1	10b	S14	E	5/18/2018	1	<0.57	<0.57	<0.57	<0.57	39	13	4	<0.57	<0.57	56
S14F-0.5	10b	S14	F	5/18/2018	0.5	<5.2	<5.2	<5.2	<5.2	16	9.7	10	<5.2	<5.2	36
S14F-1	10b	S14	F	5/18/2018	1	<2.7	<2.7	<2.7	<2.7	17	<2.7	37	<2.7	<2.7	53
S14G-0.5	10b	S14	G	5/18/2018	0.5	<2.6	<2.6	<2.6	<2.6	9.4	9.4	10	<2.6	<2.6	29
S14G-1	10b	S14	G	5/18/2018	1	<2.7	<2.7	<2.7	<2.7	11	14	32	<2.7	<2.7	57
S14G-2.5	10b	S14	G	5/18/2018	2.5	<0.26	<0.26	<0.26	<0.26	0.6	2.5	5.2	<0.26	<0.26	8.2
S14H-0.5	10b	S14	H	5/18/2018	0.5	<2.5	<2.5	<2.5	<2.5	12	10	12	<2.5	<2.5	34
S14H-1	10b	S14	H	5/18/2018	1	<2.7	<2.7	<2.7	<2.7	9.7	8	8.9	<2.7	<2.7	27
S14H-2.5	10b	S14	H	5/18/2018	2.5	<0.052	<0.052	<0.052	<0.052	0.23	0.32	0.52	<0.052	<0.052	1.1
S14I-0.5	10b	S14	I	5/18/2018	0.5	<5.4	<5.4	<5.4	<5.4	13	8.4	8.8	<5.4	<5.4	30
S14I-1	10b	S14	I	5/18/2018	1	<2.7	<2.7	<2.7	<2.7	3.7	<2.7	12	<2.7	<2.7	16
S14I-2.5	10b	S14	I	5/18/2018	2.5	<2.7	<2.7	<2.7	<2.7	6.3	<2.7	28	<2.7	<2.7	34
S14J-0.5	10b	S14	J	5/18/2018	0.5	<0.053	<0.053	<0.053	<0.053	0.26	0.089	0.064	<0.053	<0.053	0.42
S14J-1	10b	S14	J	5/18/2018	1	<0.61	<0.61	<0.61	<0.61	1.1	<0.61	30	<0.61	<0.61	31
S14K-0.5	10b	S14	K	5/18/2018	0.5	<0.52	<0.52	<0.52	<0.52	4.3	3	3.5	<0.52	<0.52	11
S14K-1	10b	S14	K	5/18/2018	1	<6	<6	<6	<6	13	13	20	<6	<6	46
S14L-0.5	10b	S14	L	5/18/2018	0.5	<0.25	<0.25	<0.25	<0.25	1.4	<0.25	1.3	<0.25	<0.25	2.7
S14L-1	10b	S14	L	5/18/2018	1	<0.55	<0.55	<0.55	<0.55	6.1	<0.55	57	<0.55	<0.55	64
S14M-0.5	10b	S14	M	5/18/2018	0.5	<0.51	<0.51	<0.51	<0.51	5.7	<0.51	75	<0.51	<0.51	81
S14M-1	10b	S14	M	5/18/2018	1	<0.54	<0.54	<0.54	<0.54	3.5	<0.54	28	<0.54	<0.54	31
S14E1-0.5	10b	S14	E1	7/26/2018	0.5	<0.53	<0.53	<0.53	<0.53	<0.53	<0.53	7.2	<0.53	<0.53	7.2
S14EE-2.5	10b	S14	EE	7/26/2018	2.5	<0.052	<0.052	<0.052	<0.052	0.085	<0.052	<0.052	<0.052	<0.052	0.085
S14FF-2.5	10b	S14	FF	7/26/2018	2.5	<0.054	<0.054	<0.054	<0.054	1.6	1.1	0.43	<0.054	<0.054	3.1
S14FF1-1	10b	S14	FF1	7/26/2018	1	<2.6	<2.6	<2.6	<2.6	12	19	15	<2.6	<2.6	46
S14G1-1	10b	S14	G1	7/26/2018	1	<2.6	<2.6	<2.6	<2.6	12	15	12	<2.6	<2.6	39
S14G2-1	10b	S14	G2	7/26/2018	1	<2.6	<2.6	<2.6	<2.6	9.8	14	11	<2.6	<2.6	35
S14LL-2.5	10b	S14	LL	7/26/2018	2.5	<0.055	<0.055	<0.055	<0.055	0.17	<0.055	0.2	<0.055	<0.055	0.37
S14LL1-1	10b	S14	LL1	7/26/2018	1	<0.55	<0.55	<0.55	<0.55	3.3	3.3	2.7	<0.55	<0.55	9.4
S14LL2-1	10b	S14	LL2	7/26/2018	1	<0.54	<0.54	<0.54	<0.54	6.9	<0.54	1.3	<0.54	<0.54	8.2
S14LL3-0.5	10b	S14	LL3	7/26/2018	0.5	<0.52	<0.52	<0.52	<0.52	9.4	6.9	1.7	<0.52	<0.52	18
S14LL3-1	10b	S14	LL3	7/26/2018	1	<0.056	<0.056	<0.056	<0.056	15	12	13	<0.056	<0.056	40
S14M1-0.5	10b	S14	M1	7/26/2018	0.5	<2.5	<2.5	<2.5	<2.5	17	12	7.5	<2.5	<2.5	36
S14M1-1	10b	S14	M1	7/26/2018	1	<2.6	<2.6	<2.6	<2.6	44	<2.6	5	<2.6	<2.6	49
A10b-SB4	10b	SB4	Initial >50 Sample	1/26/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	73.8			73.8
A10b-SB4X-2.5	10b	SB4	X	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	0.087	<0.055	0.35	<0.055	<0.055	0.44
A10b-SB4A-1	10b	SB4	A	1/23/2018	1	<5.6	<5.6	<5.6	<5.6	<5.6	<5.6	37	<5.6	<5.6	37
A10b-SB4A-2.5	10b	SB4	A	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.14	<0.055	<0.055	0.14

Table 1
Polychlorinated Biphenyls (PCBs) in Soil
Remedial Action Plan
Riverside Scrap Iron & Metal Site
Riverside, California

Sample/ Boring ID	Area	Sample Location	2018 Investigation Step-Out Sample Designation or Information	Sample Date	depth (feet bgs)	EPA Method 8082 (mg/kg)										Total PCBs
						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
A10b-SB4B-1	10b	SB4	B	1/23/2018	1	<28	<28	<28	<28	<28	<28	140	<28	<28		140
A10b-SB4B-2.5	10b	SB4	B	1/23/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	0.24	<0.056	<0.056		0.24
A10b-SB4C-1	10b	SB4	C	1/23/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	1.1	<0.055	<0.055		1.2
A10b-SB4C-2.5	10b	SB4	C	1/23/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	0.13	<0.054	<0.054		0.13
A10b-SB4D-1	10b	SB4	D	1/23/2018	1	<5.6	<5.6	<5.6	<5.6	<5.6	<5.6	19	<5.6	<5.6		19
A10b-SB4D-2.5	10b	SB4	D	1/23/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.12	<0.055	<0.055		0.12
A10b-SB4AA-0.5	10b	SB4	AA	5/18/2018	0.5	<0.52	<0.52	<0.52	<0.52	6.8	<0.52	87	<0.52	<0.52		94
A10b-SB4AA-1	10b	SB4	AA	5/18/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054		All ND
A10b-SB4E-0.5	10b	SB4	E	5/18/2018	0.5	<1.1	<1.1	<1.1	<1.1	2.7	<1.1	26	<1.1	<1.1		29
A10b-SB4E-1	10b	SB4	E	5/18/2018	1	<0.28	<0.28	<0.28	<0.28	0.72	<0.28	21	<0.28	<0.28		22
A10b-SB4F-0.5	10b	SB4	F	5/18/2018	0.5	<0.056	<0.056	<0.056	<0.056	0.26	0.31	0.46	<0.056	<0.056		1
A10b-SB4F-1	10b	SB4	F	5/18/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.096	<0.055	<0.055		0.096
A10b-SB4G-0.5	10b	SB4	G	5/18/2018	0.5	<0.27	<0.27	<0.27	<0.27	0.91	1.8	2.1	<0.27	<0.27		4.8
A10b-SB4G-1	10b	SB4	G	5/18/2018	1	<27	<27	<27	<27	<27	<27	2600	<27	<27		2600
A10b-SB4J-0.5	10b	SB4	J	5/18/2018	0.5	<0.27	<0.27	<0.27	<0.27	0.32	0.64	1.3	<0.27	<0.27		2.2
A10b-SB4J-1	10b	SB4	J	5/18/2018	1	<0.055	<0.055	<0.055	<0.055	0.057	<0.055	0.13	<0.055	<0.055		0.19
A10b-SB4K-0.5	10b	SB4	K	5/18/2018	0.5	<0.054	<0.054	<0.054	<0.054	0.11	<0.054	2.4	<0.054	<0.054		2.5
A10b-SB4K-1	10b	SB4	K	5/18/2018	1	<27	<27	<27	<27	<27	<27	180	<27	<27		180
SB4AA1-0.5	10b	SB4	AA	7/26/2018	0.5	<5.4	<5.4	<5.4	<5.4	<5.4	<5.4	55	<5.4	<5.4		55
SB4AA1-1	10b	SB4	AA	7/26/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	0.24	<0.054	<0.054		0.24
SB4AA2-0.5	10b	SB4	AA2	7/26/2018	0.5	<5.2	<5.2	<5.2	<5.2	<5.2	<5.2	50	<5.2	<5.2		50
SB4AA2-1	10b	SB4	AA2	7/26/2018	1	<0.53	<0.53	<0.53	<0.53	0.54	<0.53	2.4	<0.53	<0.53		2.9
SB4AA7-0.5	10b	SB4	AA7	9/27/2018	0.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	13				13
SB4AA7-1.0	10b	SB4	AA7	9/27/2018	1	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052				All ND
SB4AA8-0.5	10b	SB4	AA8	9/27/2018	0.5	<0.51	<0.51	<0.51	<0.51	<0.51	<0.51	4.2				4.2
SB4AA8-1.0	10b	SB4	AA8	9/27/2018	1	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052				All ND
SB4GG-2.5	10b	SB4	GG	7/26/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
SB4KK1-1	10b	SB4	KK	7/26/2018	1	<5.5	<5.5	<5.5	<5.5	<5.5	<5.5	110	<5.5	<5.5		110
SB4KK-2.5	10b	SB4	KK	7/26/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054		All ND
SB4KK1-2.5	10b	SB4	KK1	7/26/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055		All ND
SB4KK2-1	10b	SB4	KK2	7/26/2018	1	<5.4	<5.4	<5.4	<5.4	<5.4	<5.4	27	<5.4	<5.4		27
SB4KK3-1	10b	SB4	KK3	7/26/2018	1	<5.4	<5.4	<5.4	<5.4	<5.4	<5.4	21	<5.4	<5.4		21
SB4AA3-0.5	10b	SB4	AA3	8/3/2018	0.5	<0.26	<0.26	<0.26	<0.26	<0.26	<0.26	1.7	<0.26	<0.26		1.7
SB4AA3-1	10b	SB4	AA3	8/3/2018	1	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	0.85	<0.054	<0.054		0.85
SB4AA4-0.5	10b	SB4	AA4	8/3/2018	0.5	<25	<25	<25	<25	<25	<25	140	<25	<25		140
SB4AA4-1	10b	SB4	AA4	8/3/2018	1	<0.053	<0.053	<0.053	<0.053	<0.053	<0.053	0.058	<0.053	<0.053		0.058
SB4AA5-0.5	10b	SB4	AA5	8/3/2018	0.5	<0.051	<0.051	<0.051	<0.051	<0.051	<0.051	0.1	<0.051	<0.051		0.1
SB4AA5-1	10b	SB4	AA5	8/3/2018	1	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052	<0.052		All ND
SB4AA6-0.5	10b	SB4	AA6	8/3/2018	0.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.072	<0.055	<0.055		0.072
SB4AA6-1	10b	SB4	AA6	8/3/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.31	<0.055	<0.055		0.31
SB4KK4-1	10b	SB4	KK4	8/3/2018	1	<27	<27	<27	<27	<27	<27	170	<27	<27		170
SB4KK4-2.5	10b	SB4	KK4	8/3/2018	2.5	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	0.06	<0.05	<0.05		0.06
SBKK5-1	10b	SB4	KK5	8/3/2018	1	<54	<54	<54	<54	70	<54	140	<54	<54		210
SB4KK5-2.5	10b	SB4	KK5	8/3/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	0.21	<0.056	<0.056		0.21
SB4KK6-0.5	10b	SB4	KK6	9/27/2018	0.5	<0.5	<0.5	<0.5	<0.5	4.5	2.9	2.1				9.5
SB4KK6-1.0	10b	SB4	KK6	9/27/2018	1	<2.7	<2.7	<2.7	<2.7	<2.7	<2.7	11				11

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						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260				
SB4KK7-0.5	10b	SB4	KK7	9/27/2018	0.5	<0.25	<0.25	<0.25	<0.25	1.6	0.81	0.69				3.1
SB4KK7-1.0	10b	SB4	KK7	9/27/2018	1	<5.4	<5.4	<5.4	<5.4	19	<5.4	87				110
SB4KK7-2.5	10b	SB4	KK7	9/27/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	All ND
SB4KK8-0.5	10b	SB4	KK8	9/27/2018	0.5	<0.5	<0.5	<0.5	<0.5	2.2	1.1	0.84				4.1
SB4KK8-1.0	10b	SB4	KK8	9/27/2018	1	<5.4	<5.4	<5.4	<5.4	<5.4	<5.4	76				76
SB4KK9-0.5	10b	SB4	KK9	9/27/2018	0.5	<0.26	<0.26	<0.26	<0.26	1.5	0.39	<0.26				2.1
SB4KK9-1.0	10b	SB4	KK9	9/27/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.88				0.88
SB4KK11-0.5	10b	SB4	KK11	9/27/2018	0.5	<0.5	<0.5	<0.5	<0.5	30	7.7	4	<0.5	<0.5		41
SB4KK11-1.0	10b	SB4	KK11	9/27/2018	1	<0.54	<0.54	<0.54	<0.54	<0.54	<0.54	76	<0.54	<0.54		76
SB4KK11-2.5	10b	SB4	KK11	9/27/2018	2.5	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	<0.057	All ND
SB4KK12-0.5	10b	SB4	KK12	9/27/2018	0.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
SB4KK12-1.0	10b	SB4	KK12	9/27/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
SB4KK12-2.5	10b	SB4	KK12	9/27/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
SB4KK13-0.5	10b	SB4	KK13	9/27/2018	0.5	<0.05	<0.05	<0.05	<0.05	0.45	0.43	0.37	<0.05	<0.05		1.3
SB4KK13-1.0	10b	SB4	KK13	9/27/2018	1	<2.8	<2.8	<2.8	<2.8	18	<2.8	59	<2.8	<2.8		77
SB4KK13-2.5	10b	SB4	KK13	9/27/2018	2.5	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	<0.054	All ND
SB4KK14-0.5	10b	SB4	KK14	9/27/2018	0.5	<0.05	<0.05	<0.05	<0.05	3.4	3	3.2	<0.05	<0.05		9.6
SB4KK14-1.0	10b	SB4	KK14	9/27/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	13	<0.055	<0.055		13
SB4KK14-2.5	10b	SB4	KK14	9/27/2018	2.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
SB4KK17-0.5	10b	SB4	KK17	12/20/2018	0.5	<0.055	<0.055	<0.055	<0.055	0.083	0.088	0.08	<0.055	<0.055		0.25
SB4KK17-1	10b	SB4	KK17	12/20/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	All ND
SB4KK18-0.5	10b	SB4	KK18	12/20/2018	0.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	12	<0.055	<0.055		12
SB4KK18-1	10b	SB4	KK18	12/20/2018	1	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	0.53	<0.055	<0.055		0.53
SB4KK19-0.5	10b	SB4	KK19	12/20/2018	0.5	<0.055	<0.055	<0.055	<0.055	1.9	2.8	2.9	<0.055	<0.055		7.6
SB4KK19-1	10b	SB4	KK19	12/20/2018	1	<0.055	<0.055	<0.055	<0.055	110	<0.055	7	<0.055	<0.055		120
SB4KK20-0.5	10b	SB4	KK20	12/20/2018	0.5	<0.055	<0.055	<0.055	<0.055	<0.055	<0.055	11	<0.055	<0.055		11
SB4KK20-1	10b	SB4	KK20	12/20/2018	1	<0.055	<0.055	<0.055	<0.055	90	<0.055	4.5	<0.055	<0.055		95
SB4KK19-2.5	10b	SB4	KK19	12/20/2018	2.5	<0.056	<0.056	<0.056	<0.056	0.12	<0.056	<0.056	<0.056	<0.056		0.12
SB4KK19-5	10b	SB4	KK19	12/20/2018	5	<0.056	<0.056	<0.056	<0.056	0.26	<0.056	0.12	<0.056	<0.056		0.38
SB4KK20-2.5	10b	SB4	KK20	12/20/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
SB4KK20-5	10b	SB4	KK20	12/20/2018	5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
SB4KK24-0.5	10b	SB4	KK24	12/20/2018	0.5	<0.056	<0.056	<0.056	<0.056	33	<0.056	1.8	<0.056	<0.056		35
SB4KK24-1	10b	SB4	KK24	12/20/2018	1	<0.056	<0.056	<0.056	<0.056	30	<0.056	1.7	<0.056	<0.056		32
SB4KK24-2.5	10b	SB4	KK24	12/20/2018	2.5	<0.056	<0.056	<0.056	<0.056	0.32	<0.056	0.058	<0.056	<0.056		0.37
SB4KK24-5	10b	SB4	KK24	12/20/2018	5	<0.056	<0.056	<0.056	<0.056	0.07	<0.056	<0.056	<0.056	<0.056		0.07
SB4KK25-0.5	10b	SB4	KK25	12/20/2018	0.5	<0.056	<0.056	<0.056	<0.056	0.83	<0.056	3.4	<0.056	<0.056		4.3
SB4KK25-1	10b	SB4	KK25	12/20/2018	1	<0.056	<0.056	<0.056	<0.056	7.5	<0.056	0.28	<0.056	<0.056		7.8
SB4KK25-2.5	10b	SB4	KK25	12/20/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
SB4KK25-5	10b	SB4	KK25	12/20/2018	5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
SB4KK26-0.5	10b	SB4	KK26	12/20/2018	0.5	<0.056	<0.056	<0.056	<0.056	0.91	3.1	2.5	<0.056	<0.056		6.5
SB4KK26-1	10b	SB4	KK26	12/20/2018	1	<0.056	<0.056	<0.056	<0.056	87	<0.056	6.4	<0.056	<0.056		93
SB4KK26-2.5	10b	SB4	KK26	12/20/2018	2.5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND
SB4KK26-5	10b	SB4	KK26	12/20/2018	5	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056	<0.056		All ND

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						PCB-1016	PCB-1221	PCB-1232	PCB-1242	PCB-1248	PCB-1254	PCB-1260			Total PCBs
Area 12															
A12-SB1	12	SB1	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	23			23
A12-SB2	12	SB2	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05			All ND
A12-SB3	12	SB3	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	0.123	<0.05	<0.05			0.123
A12-SB4	12	SB4	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	0.205	0.12	<0.05			0.325
A12-SB5	12	SB5	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	6.2			6.2
S10	12	S10	NA	8/11/2015	0.25	<0.02UJ	<0.02UJ	<0.02UJ	1.4J	<0.02UJ	4.3J	3.50J			9.2
S10	12	S10	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02			All ND
S7	12	S7	NA	8/11/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02			All ND
NS16	12	NS16	NA	8/13/2015	2.5	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02			All ND
Area 13															
A13-SB1	13	SB1	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	0.425	<0.05			0.425
A13-SB2	13	SB2	NA	1/31/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05			ALL ND
A13-SB3	13	SB3	NA	2/3/2011	1	<0.05	<0.1	<0.05	<0.05	<0.05	<0.05	<0.05			ALL ND

Notes and Data Qualifiers

USEPA Region IX Regional Screening Levels (RSLs), June 2015, screening levels for industrial soil and residential soil.

J = The analyte was detected at a concentration above the method detection limit, but below the reporting limit and is an approximate concentration of the analyte in the sample.

UJ = The analyte was not detected above the laboratory reporting limit but the reporting limit is approximate due either to the quality of the data generated because certain quality control criteria were not met or the sample was analyzed outside the holding time for extraction.

J-flagged results are included in the calculation of "Total PCBs"

The following PCB Aroclors were not detected in any sample above laboratory reporting limits: PCB-1016, PCB-1232, PCB-1262, and PCB-1268.

Note that some Aroclor's with higher concentrations required dilution to report within calibration range, which resulted in elevated laboratory reporting limits. During excavation confirmation sampling activities, chain-of-custody instructions will note to report each Aroclor at the lowest dilution possible that either has a reportable result or ND at the applicable reporting limit.

Abbreviations

bgs = Below ground surface

NA = Not applicable to 2018 investigation

< = Not detected at the reporting limit shown

PCBs = Polychlorinated biphenyls

RSL = Regional soil screening level

USEPA = United States Environmental Protection Agency

mg/kg = milligrams per kilogram

APPENDIX G.

2023 Soil Vapor Investigation Reports



SOIL VAPOR INVESTIGATION REPORT

FORMER RIVERSIDE SCRAP IRON & METAL PROPERTY

2993 6th Street

Riverside, California 92507

Department of Toxic Substances Control Docket No HAS-FY21/22-032

Issued: January 17, 2023

Prepared for: IRON LOFTS LLC
1201 Dove Street, Suite 520
Newport Beach, California 92660

Prepared by: GSI ENVIRONMENTAL INC.
19200 Von Karman Avenue, Suite 800
Irvine, California 92612
949.679.1070
www.gsienv.com

SOIL VAPOR INVESTIGATION REPORT

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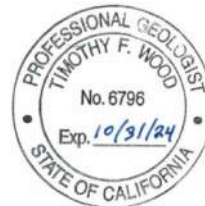
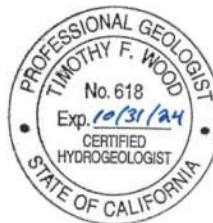
This Soil Vapor Investigation Report was prepared by the staff of GSI Environmental Inc., under the supervision of the Engineer(s) and/or Geologist(s) whose signatures appear hereon.

The findings, recommendations, specifications, or professional opinions were prepared in accordance with generally accepted professional engineering and/or geologic practice. No warranty is expressed or implied.

Issued: January 17, 2023



Timothy F. Wood, PG, CHG
Vice President & Principal Geologist



Peter Scaramella
Senior Risk Assessor



Samantha Curtis, PG
Senior Geologist

SOIL VAPOR INVESTIGATION REPORT
Former Riverside Scrap Iron & Metal Property
2993 6th Street
Riverside, California 92507

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SOIL VAPOR INVESTIGATION REPORT
Former Riverside Scrap Iron & Metal Property
2993 6th Street
Riverside, California 92507

1.0 INTRODUCTION

On behalf of Iron Lofts LLC (Iron Lofts), GSI Environmental Inc. (GSI) has prepared this Soil Vapor Investigation Report (SVI Report) for the former Riverside Scrap Iron & Metal (RSIM) property located at 2993 6th Street in Riverside, California (the Site; Figures 1 and 2).

The Site has a 45-year history of use as a scrap metal recycling facility and is located in a mixed-use area that is adjoined by residential and commercial properties. Redevelopment plans for the Site are to construct a multi-family, multi-story residential building development, similar to the recently constructed residential development located adjacent, across Mission Inn Avenue, to the south of the Site.

In 2015, AMEC Foster Wheeler conducted a soil vapor investigation at the Site, and results identified VOCs in soil vapor at concentrations above residential screening levels (GSI, 2022). The objective of the work summarized in this SVI Report is to further evaluate PCE and TCE in soil vapor and provide the additional assessment data required to support the planned multifamily redevelopment planning, design, and regulatory oversight, and for the evaluation of unrestricted Site use.

2.0 SITE DESCRIPTION

The Site is approximately 7 acres in size and is identified as “light industrial” by the Riverside County Assessor’s Office. Surrounding properties are mixed commercial and residential. The Site is located within the former Marketplace Brownfields Study Area in the City of Riverside, bound by Commerce Street to the northwest, Mission Inn Avenue and 7th Street to the southwest, and 4th Street to the northeast. The Site is being planned for redevelopment for multi-family residential use, similar to surrounding recent redevelopment projects. The current layout of the Site is shown on Figure 2. Two existing historic buildings (“Buildings of Merit”) with crawl spaces remain at the Site (approximately 1,200 and 5,000 square feet) and will be repurposed for use as amenity space (i.e., gymnasium, club room, co-working space).

2.1 Current and Historical Uses

The Site was used as a scrap metal recycling yard for over 45 years and formerly maintained underground and aboveground storage tanks on the western portion of the Site that were used to store and dispense fuel and oil. The scrap metal and recycling business ceased operations in 2015. By August 2015, the Site had been cleared of utilities and most mixed trash, debris and scrap metal, and currently consists mostly of unpaved bare earth and paved surfaces with some remaining debris. Surrounding land uses to the north and west are primarily commercial. Residential housing is located along the eastern border of the Site and across Mission Inn Avenue to the south.

2.2 Site Geology and Hydrogeology

The Site is located in the Riverside-Arlington Subbasin of the Upper Santa Ana River Groundwater Basin and within the Peninsular Ranges Geomorphic Province of California. The subbasin is bounded by the impermeable rocks on the south by Arlington Mountain, on the southeast by the Box Springs Mountains, on the northwest by the La Sierra Heights and Mount Rubidoux, and on the north by the Jurupa Mountains. The northeast boundary is defined as the

Rialto-Colton fault and a portion of the groundwater divide beneath the city of Bloomington and the Santa Ana River flows over the northern portion of the subbasin (Department of Water Resources [DWR], 2004).

Groundwater in the subbasin is dominantly found in young Quaternary-aged alluvial deposits from the lateral migration of the Santa Ana River over time and consist chiefly of sand, gravel, silt, and clay. The geology in the surrounding mountains and basement rock consists of Quaternary alluvium, Pleistocene nonmarine, and Mesozoic granitic rocks (California Division of Mines and Geology [CDMG], 1965). Based on the drilling logs provided in AMEC's 2015 Soil and Soil Vapor Investigation, soils beneath the Site consist primarily of silty sand and sandy silt with occasional thin layers of clay from near surface to 20 feet bgs, the maximum depth of exploration (AMEC, 2015).

In December 2009, the depth to groundwater ranged from 114 to 125 feet bgs with a southwestern groundwater gradient direction at the former Ken's Arco property, located approximately 650 feet southeast of the Site at 2871 University Avenue (as reported by Pacific Edge Engineering, Inc. and referenced in AMEC's 2015 Soil and Soil Vapor Investigation). Based on the general drought conditions since this measurement was taken, currently groundwater levels would be expected to be deeper than reported in December 2009.

3.0 SCOPE OF WORK

Soil vapor sample locations were selected to provide Site coverage and target historical Site features and are presented in Figure 2. Soil vapor probe installation and sampling was performed in accordance with the Cal-EPA July 2015 *Advisory for Active Soil Gas Investigations* (Advisory).

Soil vapor probes were installed at 21 locations on November 3, 4, and 7, 2022, and 47 soil vapor samples were collected on November 16, 2022 from the following depths:

- 5 feet: VP-1 through VP-21 (21 locations)
- 13 to 15 feet: VP-1 through VP-14 and VP-16 through VP-21 (20 locations)
- 22 to 30 feet: VP-1, VP-9, VP-12, VP-14, VP-19, and VP-20 (6 locations)

Soil samples were not collected during drilling. At each soil vapor sample location, the recovered soil core was screened for organic vapors using a photoionization detector (PID). No elevated PID readings or stained soil was observed.

3.1 Pre-field Activities

Prior to the sampling activities, the Site-Specific Health and Safety Plan (HASP) was updated in accordance with the requirements of the State of California General Industry Safety Order 5192 and Title 29 of the Code of Federal Regulations, Section 1910.120. The HASP was kept on-Site during field activities. Proposed investigation locations were marked by GSI, and Underground Services Alert (USA) was contacted a minimum of two full working days prior to initiating the field activities. In addition, GSI retained a private geophysical subcontractor to perform utility locating services to assess for the presence of underground utilities and other potential subsurface obstructions in the vicinity of the proposed investigation locations.

3.2 Soil Vapor Probe Installation

Soil vapor probes were installed at 21 locations identified on Figure 2. The probe locations included the following:

- 1 single probe set at 5 feet bgs;
- 14 dual nested probes (probes at 5 and 15 feet bgs); and
- 6 triple nested probes (probes at 5, 15, and approximately 30 feet).

Each soil vapor probe location was manually cleared to approximately 1-foot bgs using a hand auger. Direct push equipment was utilized to initially penetrate through any surface concrete and the boring was advanced from approximately 1-foot bgs to the final borehole depths.

During probe installation, the proposed 15-foot bgs soil vapor probe installation at VP-6 was adjusted to 13 feet bgs, and the 30-foot bgs soil vapor probe at VP-14 was adjusted to 22 feet bgs, due to refusal during drilling operations. Only one soil vapor probe was installed to 5 feet bgs at VP-15 due to refusal while attempting to reach the target depth of 15.5 feet bgs. The soil vapor probe proposed as VP-22 was not completed due to borehole collapse in soft fill material.

Soil vapor probes were constructed using nominal ¼-inch diameter Nylaflow tubing connected to a porous polyethylene soil vapor sample probe, set within approximately 1 foot of #3 sand placed around the sample probe. A dry bentonite seal of at least 6 inches followed by a cement and bentonite grout seal was placed on top of the sand pack to the ground surface or to the next soil vapor probe interval. The tubing was capped with a vapor-tight two-way valve or cap at the surface to eliminate the potential for barometric pressure fluctuations inducing vapor transport between the subsurface and the atmosphere. The two-way valve or cap was installed in the closed position and allowed equilibration of soil vapor concentrations after installation.

All probe locations were completed as semi-permanent, with probes protected with a plastic bag and covered with a bentonite patch and sand, with a labeled survey flag. The tubing was labeled and color coded at the surface¹ to identify the probe location and depth. In addition, the length of the tubing at the surface corresponds to the relative depth of the probe, with the shortest surface tubing corresponding with the shallowest probe, and the longest surface tubing corresponding with the deepest probe.

3.3 Soil Vapor Sampling and Analysis

Soil vapor samples were collected after an equilibration time of more than 48 hours following installation. Prior to the commencement of sampling, shut-in tests were conducted on the soil vapor probes. The probe heads were attached to the sampling train assembly of tubing, valves, and fittings and connected to a purge pump. A minimum vacuum of 100 inches of water column (W.C.) was applied to the sealed sampling train and monitored for at least 1 minute. After a successful shut-in test was completed, the soil vapor probe and sampling train was purged. A total of 3 purge volumes were removed from soil vapor probes prior to sampling. Each soil vapor probe was purged at a rate of 200 milliliters per minute (mL/min) and at a vacuum less than of 100 inches W.C. One purge volume is equal to the internal sample tubing volume and volume of stagnant air within the sand pack and dry bentonite layers (assuming 40 percent porosity). During

¹ See associated boring logs for color codes.

purging and sampling, 1,1-difluoroethane (DFA) was applied as a leak-check tracer gas to check for ambient air leaks near the above-ground probe tubing and sampling train.

Following the completion of purging, soil vapor samples were collected into Summa canisters through flow controllers at a rate of approximately 200 mL/min. Duplicate soil vapor samples were collected at a frequency of one per day. In addition, one field quality assurance/quality control sample consisting of an ambient-air blank was collected by drawing ambient air into a Summa canister through an attached sampling train.

Soil vapor samples were analyzed for VOCs using United States Environmental Protection Agency (USEPA) Method TO-15.

3.4 Equipment Decontamination

Downhole drilling and sampling equipment was washed with a potable water-detergent solution and rinsed twice with potable water before each use.

3.5 Investigation Derived Wastes

Soil cuttings were left onsite near the boring locations pending Site excavation activities. Minimal decontamination water was produced during the drilling activities and left onsite pending waste characterization for disposal.

4.0 SOIL VAPOR SAMPLE RESULTS

This section presents the results of soil vapor sampling and analysis, including a presentation of the analytical results, and a comparison of analytical results to risk-based screening criteria. Analytical results for soil vapor samples are presented in Table 1. The analytical laboratory reports for soil vapor samples are presented in Appendix A.

4.1 Soil Lithology

Soil vapor probes were installed at 21 locations in a generally gridded pattern throughout the vacant Site, and recovered soil was observed and described in accordance with the Unified Soil Classification System (USCS). Soil encountered generally consisted of silt with silty sand and/or poorly to well graded sand with silt intervals at greater depths. Soil boring logs are included as Appendix B.

4.2 Data Quality Summary

Analytical results for soil vapor sampling were reviewed to determine the data usability. Each laboratory data package was reviewed consistent with guidance provided by the USEPA. A sample evaluation was completed for primary and duplicate soil vapor samples and is presented in Appendix C. The following quality assurance/quality control (QA/QC) criteria from the analysis of the project samples were reviewed as applicable: sample preservation and holding time compliance, reporting limits and sample dilution, blank sample analysis, surrogate recovery compliance, laboratory control samples, field duplicate samples and use of laboratory data qualifiers. No data qualifiers were applied based on the results of the data validation review.

Field quality control measures included leak testing with DFA and the collection of a split-t duplicate pair of soil vapor samples. The leak test compound DFA was evaluated by comparison to an action level of 10,000 $\mu\text{g}/\text{m}^3$, which is equivalent to 3.7 parts per million by volume (ppmv). DFA was not detected in any soil vapor samples at a concentration exceeding this action level. DFA was detected in the soil vapor sample VP-8-5 at 5 feet bgs at a maximum concentration of

520 $\mu\text{g}/\text{m}^3$, which is equivalent to 0.19 ppmv. This low concentration of DFA does not represent an ambient air leak that could affect the soil vapor results.

4.3 Soil Vapor Results

Soil vapor samples were collected at 21 locations from soil vapor probes with inlets installed at depths between 5 and 30 feet bgs in November 2022 (Figure 2).

Analytical results for soil vapor samples are evaluated by comparison to risk-based screening levels for residential and commercial/industrial Site use. Screening levels (SLs) for soil vapor are developed by applying an attenuation factor to screening levels for indoor air:

$$\text{Soil Vapor Screening Level (SL}_{\text{sv}}) = \frac{\text{SL}_{\text{ia}}}{\text{AF}}$$

Where:

SL _{sv}	=	Soil vapor screening level ($\mu\text{g}/\text{m}^3$)
SL _{ia}	=	Indoor air screening level ($\mu\text{g}/\text{m}^3$)
AF	=	Attenuation factor (unitless)

For this evaluation, Regional Screening Levels (RSLs) for residential air published by USEPA (2022) and endorsed or modified by the DTSC (2022) were selected as the indoor air SLs. Soil vapor SLs were calculated using the default attenuation factors published by DTSC for residential use (0.001 for future residential buildings; DTSC, 2011 and 2022); these soil vapor SLs are referred to in this report as the “DTSC AF SLs.” In addition, soil vapor data also are presented in Table 1 with soil vapor SLs calculated using the USEPA default attenuation factor (0.03 for all buildings; USEPA, 2015); these soil vapor SLs are referred to in this report as the “USEPA AF SLs.” Soil vapor data are evaluated by comparison to the DTSC AF SLs and USEPA AF SLs.

As shown in Table 1, 17 VOCs were detected in at least one soil vapor sample. PCE, TCE, chloroform, 1,2-dichloroethane (1,2-DCA), and benzene were the only VOCs detected in at least one soil vapor sample at a concentration exceeding its residential DTSC AF SL, and the results for these VOCs are summarized below:

- PCE was detected in all soil vapor samples collected at concentrations ranging from 8 to 840 $\mu\text{g}/\text{m}^3$. The highest PCE concentrations in soil vapor were observed in the soil vapor samples collected at 30 feet bgs at the southwestern and northeastern property boundary of the southern parcel (720 $\mu\text{g}/\text{m}^3$ at VP-1-30, 670 $\mu\text{g}/\text{m}^3$ at VP-9-30, and 840 $\mu\text{g}/\text{m}^3$ at VP-19-30) and southeastern property boundary of the central parcel (710 $\mu\text{g}/\text{m}^3$ at VP-20-30 and 750 $\mu\text{g}/\text{m}^3$ at VP-20-30 Rep). The highest concentrations of PCE identified in soil vapor samples (up to 840 $\mu\text{g}/\text{m}^3$) slightly exceed the residential DTSC AF SL of 460 $\mu\text{g}/\text{m}^3$.
- TCE was detected in 43 of 49 total soil vapor samples at concentrations ranging from 6.4 to 1,700 $\mu\text{g}/\text{m}^3$. The highest TCE concentrations in soil vapor were also observed at the same soil vapor samples with the highest PCE concentrations. Specifically, TCE was detected at the highest concentrations in the soil vapor sample collected at 30 feet bgs at the southwestern and northeastern property boundary of the southern parcel (1,700 $\mu\text{g}/\text{m}^3$ at VP-1-30, 1,700 $\mu\text{g}/\text{m}^3$ at VP-9-30, and 1,500 $\mu\text{g}/\text{m}^3$ at VP-19-30) and southeastern property boundary of the central parcel (1,600 $\mu\text{g}/\text{m}^3$ at VP-20-30 and 1,700 $\mu\text{g}/\text{m}^3$ at VP-20-30 Rep). The highest concentrations of TCE identified in soil vapor samples (up to 1,700 $\mu\text{g}/\text{m}^3$) exceed the residential DTSC AF SL of 480 $\mu\text{g}/\text{m}^3$.

- Chloroform was detected in sixteen soil vapor samples at concentrations ranging from 5.9 to 34 $\mu\text{g}/\text{m}^3$, all of which exceed the residential USEPA AF SL for chloroform of 4.0 $\mu\text{g}/\text{m}^3$ but do not exceed the residential DTSC AF SL of 120 $\mu\text{g}/\text{m}^3$.
- 1,2-DCA was detected in only one soil vapor sample (VP-15-5) at a concentration of 17 $\mu\text{g}/\text{m}^3$, which exceeds the residential USEPA AF SL for 1,2-DCA of 3.7 $\mu\text{g}/\text{m}^3$ but does not exceed the residential DTSC AF SL of 120 $\mu\text{g}/\text{m}^3$.
- Benzene was detected in thirteen soil vapor samples at concentrations ranging from 3.4 to 39 $\mu\text{g}/\text{m}^3$, all of which exceed the residential USEPA AF SL for benzene of 3.2 $\mu\text{g}/\text{m}^3$ but do not exceed the residential DTSC AF SL of 97 $\mu\text{g}/\text{m}^3$.

5.0 SUMMARY AND CONCLUSIONS

Soil vapor sampling was completed at locations throughout the Site in November 2022. Specifically, 47 primary soil vapor samples (and 2 duplicate soil vapor samples) were collected from 21 locations installed at depths ranging between 5 and 30 feet bgs. The key findings of the soil vapor survey are summarized below:

- PCE and TCE were the primary VOCs detected in soil vapor samples. PCE was detected in every soil vapor sample, but at relatively low concentrations (up to 840 $\mu\text{g}/\text{m}^3$). TCE was detected less frequently (43 of 49 total samples), but at slightly higher concentrations (up to 1700 $\mu\text{g}/\text{m}^3$).
- PCE and TCE concentrations in soil vapor are consistent with an off-site source.
 - Concentrations increased with depth at all soil vapor sample locations (i.e., higher concentrations were detected in deeper soil vapor samples) with the exception of two locations (VP-4 and VP-5).
 - The highest PCE and TCE concentrations in soil vapor were observed from soil vapor samples collected at 30 feet bgs at the southwestern and northeastern property boundary of the southern parcel and southeastern property boundary of the central parcel.
 - A source of PCE or TCE to soil vapor was not identified on the Site and the low concentrations of PCE and TCE detected in soil vapor samples and increasing concentrations with depth are not indicative of an on-Site release. It is possible that the low concentrations are attributed to minor releases associated with historical on-Site operations and/or an off-Site release that is migrating in deeper soil vapor or groundwater to the Site.
- To mitigate potential for PCE and TCE detected in soil vapor to migrate to indoor air, vapor intrusion mitigation systems are recommended for future on-Site buildings. As part of the repurposing of the two existing historic buildings for amenity space, existing crawl spaces will be vented passively, and the structures will be improved and built out, including installation of modern HVAC systems. Following completion of building improvements, indoor air samples will be collected to confirm the effectiveness of the vapor mitigation measures.

6.0 REFERENCES

- AMEC Foster Wheeler (AMEC), 2015, Additional Phase II Environmental Site Assessment Report, December 9.
- Ami Adini & Associates (AA&A), 2011, Phase II Environmental Site Assessment. August 8.
- California Environmental Protection Agency, 2015, Advisory – Active Soil Gas Investigations, July
- Department of Toxic Substances Control (DTSC), 2011. Guidance for the evaluation and mitigation of subsurface vapor intrusion to indoor air (vapor intrusion guidance). California Environmental Protection Agency. October.
- DTSC, 2022, DTSC Vapor Intrusion Advisory, <https://dtsc.ca.gov/wp-content/uploads/sites/31/2022/08/Vapor-Intrusion-Update-August-2022-006.pdf>, August.
- Department of Toxic Substances Control (DTSC), 2022. Human Health Risk Assessment (HHRA) Note 3, HHRA Note 3, DTSC-modified Screening Levels (DTSC-SLs). California Environmental Protection Agency. May.
- Hillmann, 2017a, Off-Site Preliminary Environmental Assessment, February 27.
- Hillmann, 2017b, Revised Technical Memorandum Workplan for Delineation of RCRA Level PCB-Impacted Soil, October.
- United States Environmental Protection Agency (U.S. EPA). 1989. Risk Assessment Guidance for Superfund, Volume 1, Human Health Evaluation Manual (Part A). Interim Final. EPA/540/I-89/002. December.
- United States Environmental Protection Agency (U.S. EPA). 2022. Regional Screening Levels. November.

TABLE

Table 1. Analytical Results for Volatile Organic Compounds in Soil Vapor Samples

TABLE 1: Volatile Organic Compounds (VOCs) in Soil Vapor ¹
Former Riverside Scrap Iron & Metal Property
Riverside, California

Sample Location	Sample ID	Probe Depth (feet bgs)	Date Sampled	Units	Tetrachloroethene (PCE)	Trichloroethene (TCE)	Chloroform	1,1-Dichloroethene (1,1-DCE)	1,2-Dichloroethane (1,2-DCA)	Benzene	Ethylbenzene	Toluene	Xylene	1,1,1-Trichloroethane	1,1,2-Trichloro- trifluoroethane (F113)	1,2,4- Trimethylbenzene	2-Butanone (MEK)	Carbon disulfide	Dichlorodifluoromethane (F12)	Methylene chloride (Dichloromethane)	Trichloro- fluoromethane (F11)	1,1-difluoroethane (DFA) (leak check compound)
VP-1	VP-1-5	5	11/16/2022	µg/m ³	150	97	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	94	<5	<30	<6.3	<5	<3.5	22	<5.5
	VP-1-15	15	11/16/2022	µg/m ³	390	680	12	49	<4.1	25	<4.4	6.3	<8.8	<5.5	290	<5	69	69	<5	<3.5	66	<5.5
	VP-1-30	30	11/16/2022	µg/m ³	720	1700	20	120	<4.1	8.7	<4.4	4.4	<8.8	<5.5	370	<5	54	20	8.5	<3.5	85	<5.5
VP-2	VP-2-5	5	11/16/2022	µg/m ³	110	48	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	72	<5	<30	7.5	<5	<3.5	23	<5.5
	VP-2-15	15	11/16/2022	µg/m ³	450	510	33	17	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	210	<5	<30	7.4	8.2	<3.5	56	<5.5
VP-3	VP-3-5	5	11/16/2022	µg/m ³	12	28	11	<4	<4.1	6.7	<4.4	14	<8.8	<5.5	8.3	<5	<30	19	<5	9.1	5.9	14
	VP-3-15	15	11/16/2022	µg/m ³	240	250	23	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	140	<5	<30	<6.3	7.9	<3.5	66	<5.5
VP-4	VP-4-5	5	11/17/2022	µg/m ³	35	19	<4.9	<4	<4.1	<3.2	<4.4	11	<8.8	<5.5	15	<5	<30	67	<5	<3.5	64	<5.5
	VP-4-15	15	11/17/2022	µg/m ³	180	13	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	26	<5	<30	<6.3	<5	<3.5	99	<5.5
VP-5	VP-5-5	5	11/17/2022	µg/m ³	12	180	17	<4	<4.1	6.3	<4.4	23	4.9	<5.5	<7.7	<5	<30	71	<5	26	60	<5.5
	VP-5-15	15	11/17/2022	µg/m ³	110	11	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	20	<5	<30	<6.3	6.7	<3.5	220	<5.5
VP-6	VP-6-5	5	11/17/2022	µg/m ³	39	<5.5	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	35	<5	<30	<6.3	7.8	<3.5	91	<5.5
	VP-6-13	13	11/17/2022	µg/m ³	140	32	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	39	<5	<30	73	7.2	<3.5	100	<5.5
VP-7	VP-7-5	5	11/17/2022	µg/m ³	47	14	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	<7.7	<5	<30	<6.3	<5	<3.5	53	<5.5
	VP-7-15	15	11/17/2022	µg/m ³	210	40	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	26	<5	<30	<6.3	6.1	<3.5	180	<5.5
VP-8	VP-8-5	5	11/17/2022	µg/m ³	30	<5.5	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	<7.7	<5	<30	<6.3	<5	<3.5	14	520
	VP-8-15	15	11/17/2022	µg/m ³	140	190	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	50	<5	<30	52	6.8	5.3	85	<5.5
VP-9	VP-9-5	5	11/16/2022	µg/m ³	71	17	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	51	<5	<30	15	<5	<3.5	13	<5.5
	VP-9-15	15	11/16/2022	µg/m ³	250	380	6.4	6.5	<4.1	6.2	<4.4	4.7	<8.8	<5.5	230	<5	40	29	6.8	<3.5	53	<5.5
	VP-9-30	30	11/16/2022	µg/m ³	670	1700	20	110	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	370	<5	62	12	8.4	<3.5	86	<5.5
VP-10	VP-10-5	5	11/16/2022	µg/m ³	80	70	<4.9	<4	<4.1	3.5	<4.4	<3.8	<8.8	<5.5	37	<5	<30	8	<5	<3.5	23	<5.5
	VP-10-15	15	11/16/2022	µg/m ³	270	430	<4.9	17	<4.1	<3.2	<4.4	4.3	<8.8	<5.5	99	<5	<30	13	6.3	<3.5	51	<5.5
VP-11	VP-11-5	5	11/16/2022	µg/m ³	89	29	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	95	<5	<30	<6.3	5.3	<3.5	34	<5.5
	VP-11-15	15	11/16/2022	µg/m ³	460	770	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	240	<5	<30	<6.3	7.9	<3.5	90	<5.5
VP-12	VP-12-5	5	11/17/2022	µg/m ³	94	<5.5	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	27	<5	<30	<6.3	<5	<3.5	68	<5.5
	VP-12-15	15	11/17/2022	µg/m ³	210	73	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	50	<5	<30	13	8.7	<3.5	100	<5.5
	VP-12-30	30	11/17/2022	µg/m ³	330	310	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	79	<5	32	<6.3	10	<3.5	230	<5.5
VP-13	VP-13-5	5	11/17/2022	µg/m ³	40	20	<4.9	<4	<4.1	3.4	<4.4	6.9	<8.8	<5.5	14	<5	<30	32	<5	3.6	180	<5.5
	VP-13-15	15	11/17/2022	µg/m ³	120	36	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	22	<5	<30	<6.3	8.2	<3.5	410	<5.5
VP-14	VP-14-5	5	11/17/2022	µg/m ³	160	94	5.9	<4	<4.1	15	6.3	77	20.1	<5.5	21	7.9	<30	120	8.4	6.2	200	<5.5
	VP-14-15	15	11/17/2022	µg/m ³	460	120	<4.9	<4	<4.1	6.5	<4.4	27	23.4	<5.5	23	7.6	<30	<6.3	8.9	3.6	200	<5.5
	VP-14-22	22	11/17/2022	µg/m ³	570	360	8.5	<4	<4.1	3.8	<4.4	8.7	<8.8	<5.5	51	<5	<30	16	13	<3.5	350	<5.5
VP-15	VP-15-5	5	11/17/2022	µg/m ³	14	<5.5	6.9	<4	17	<3.2	<4.4	<3.8	<8.8	9.4	10	<5	<30	13	<5	<3.5	460	<5.5
VP-16	VP-16-5	5	11/17/2022	µg/m ³	97	6.4	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	16	<5	<30	<6.3	<5	<3.5	23	<5.5
	VP-16-15	15	11/17/2022	µg/m ³	360	190	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	44	<5	<30	<6.3	<5	<3.5	50	<5.5
VP-17	VP-17-5	5	11/16/2022	µg/m ³	76	55	<4.9	<4	<4.1	<3.2	<4.4	6.5	<8.8	<5.5	23	<5	<30	9.3	<5	<3.5	11	<5.5
	VP-17-15	15	11/16/2022	µg/m ³	180	290	<4.9	<4	<4.1	<3.2	<4.4	6.6	<8.8	<5.5	49	<5	39	11	<5	<3.5	19	<5.5
	VP-17-15 Rep	15	11/16/2022	µg/m ³	180	300	<4.9	<4	<4.1	<3.2	<4.4	6.7	<8.8	<5.5	51	<5	74	12	<5	<3.5	19	<5.5
VP-18	VP-18-5	5	11/16/2022	µg/m ³	49	7.6	<4.9	<4	<4.1	<3.2	<4.4	4.1	<8.8	<5.5	14	<5	<30	<6.3	<5	<3.5	41	<5.5
	VP-18-15	15	11/16/2022	µg/m ³	200	110	<4.9	<4	<4.1	<3.2	<4.4	6.6	<8.8	<5.5	43	<5	100	16	<5	<3.5	79	<5.5
VP-19	VP-19-5	5	11/17/2022	µg/m ³	91	41	<4.9	<4	<4.1	8.1	<4.4	6.5	<8.8	<5.5	32	<5	<30	44	<5	<3.5	11	<5.5
	VP-19-15	15	11/17/2022	µg/m ³	420	380	<4.9	<4	<4.1	4.9	<4.4	10	<8.8	<5.5	100	<5	<30	71	<5	<3.5	52	<5.5
	VP-19-30	30	11/17/2022	µg/m ³	840	1500	7.5	26	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	180	<5	<30	<6.3	<5	<3.5	64	<5.5

TABLE 1: Volatile Organic Compounds (VOCs) in Soil Vapor ¹
Former Riverside Scrap Iron & Metal Property
Riverside, California

Sample Location	Sample ID	Probe Depth (feet bgs)	Date Sampled	Units	Tetrachloroethene (PCE)	Trichloroethene (TCE)	Chloroform	1,1-Dichloroethene (1,1-DCE)	1,2-Dichloroethane (1,2-DCA)	Benzene	Ethylbenzene	Toluene	Xylene	1,1,1-Trichloroethane	1,1,2-Trichloro- trifluoroethane (F113)	1,2,4- Trimethylbenzene	2-Butanone (MEK)	Carbon disulfide	Dichlorodifluoromethane (F12)	Methylene chloride (Dichloromethane)	Trichloro- fluoromethane (F11)	1,1-difluoroethane (DFA) (leak check compound)	
VP-20	VP-20-5	5	11/17/2022	µg/m³	91	51	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	19	<5	<30	<6.3	<5	<3.5	22	<5.5	
	VP-20-15	15	11/17/2022	µg/m³	450	650	6.7	<4	<4.1	<3.2	<4.4	4.4	<8.8	<5.5	73	<5	<30	<6.3	6.9	<3.5	82	<5.5	
	VP-20-30	30	11/17/2022	µg/m³	710	1600	21	32	<4.1	<3.2	<4.4	4.3	<8.8	<5.5	130	<5	<30	<6.3	8.9	<3.5	130	<5.5	
	VP-20-30 Rep	30	11/17/2022	µg/m³	750	1700	22	31	<4.1	<3.2	<4.4	5	<8.8	<5.5	140	<5	<30	<6.3	9.9	<3.5	160	<5.5	
VP-21	VP-21-5	5	11/17/2022	µg/m³	8	<5.5	34	<4	<4.1	39	<4.4	10	<8.8	<5.5	<7.7	<5	<30	92	<5	<3.5	160	11	
	VP-21-15	15	11/17/2022	µg/m³	150	<5.5	<4.9	<4	<4.1	<3.2	<4.4	<3.8	<8.8	<5.5	39	<5	<30	<6.3	7.3	<3.5	510	<5.5	
Maximum Detected Concentration				µg/m³	840	1700	34	120	17	39	6.3	77	23	9.4	370	7.9	100	120	13	26	510	520	
Soil Vapor Screening Levels																							
Commercial/Industrial Soil Vapor Screening Levels ²																							
DTSC AF SL (AF=0.001) Existing Commercial/Industrial Buildings				µg/m³	2,000	3,000	530	310,000	470	420	4,900	1,300,000	440,000	1,000,000	5,200,000	260,000	5,200,000	730,000	100,000	1,000	1,300,000	NA	
USEPA AF SL (AF=0.03) All Commerical/Industrial Buildings				µg/m³	67	100	18	10,000	16	14	160	43,000	15,000	33,000	170,000	8,700	170,000	24,000	3,300	33	43,000	NA	
Residential Soil Vapor Screening Levels ³																							
DTSC AF SL (AF=0.001) Existing Residential Buildings				µg/m³	460	480	120	73,000	110	97	1,100	310,000	100,000	4,400,000	22,000,000	63,000	22,000,000	3,100,000	440,000	12,000	5,300,000	NA	
USEPA AF SL (AF=0.03) All Residential Buildings				µg/m³	15	16	4.0	2,400	3.7	3.2	37	10,000	3,300	150,000	730,000	2,100	730,000	100,000	14,700	400	180,000	NA	

Notes:

¹ Soil vapor samples collected by H&P Mobile Geochemistry, Inc. (H&P) of Carlsbad, CA into batch-certified, 400 or 450 milliliter summa canisters under the field oversight of GSI Environmental Inc., and analyzed by H&P at a fixed laboratory using USEPA Method TO-15.

² Soil vapor results are compared to soil vapor screening levels generated by applying default attenuation factors (AF) for all buildings (0.03), as published by the USEPA (2015), or for current commercial buildings (0.001), as published by the California Department of Toxic Substances Control (DTSC, 2011) to regional screening levels for indoor air under residential land use published by the USEPA (2022) and modified by the DTSC (2022).

³ Soil vapor results are compared to soil vapor screening levels generated by applying default attenuation factors (AF) for all buildings (0.03), as published by the USEPA (2015), or for current commercial buildings (0.001), as published by the California Department of Toxic Substances Control (DTSC, 2011) to regional screening levels for indoor air under residential land use published by the USEPA (2022) and modified by the DTSC (2022).

µg/m³ = micrograms per cubic meter

NA = Not available

References:

California Environmental Protection Agency (Cal/EPA). 2011. Final Guidance for the Evaluation and Mitigation of Subsurface Vapor Intrusion to Indoor Air (Vapor Intrusion Guidance). DTSC. October.

Department of Toxic Substances Control (DTSC). 2022. Human Health Risk Assessment (HHRA) Note, HERO HHRA Note 3, DTSC-modified Screening Levels (DTSC-SLs). May.

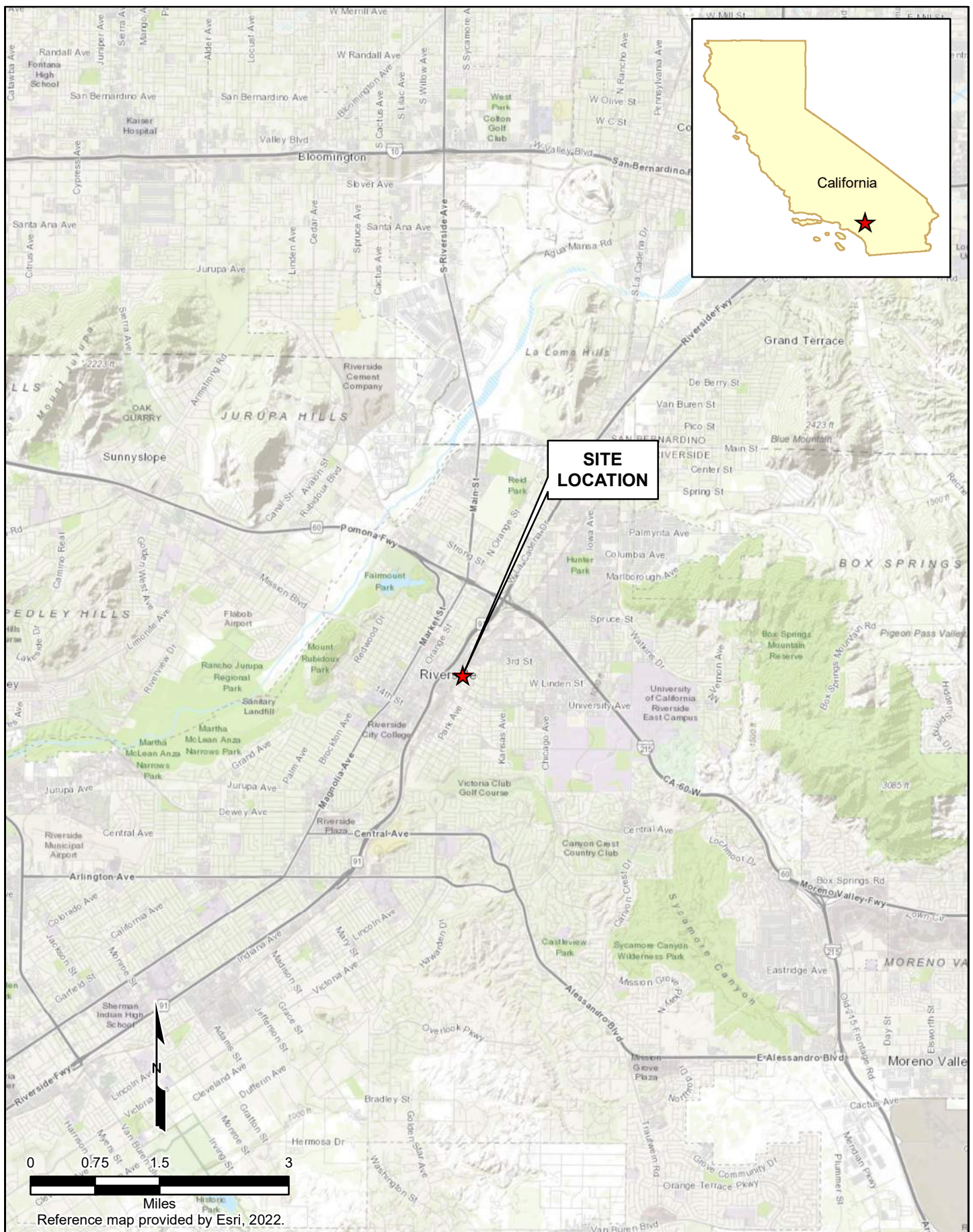
United States Environmental Protection Agency (USEPA). 2022. Regional Screening Levels (RSLs). November.

FIGURES

Figure 1. Site Location Map

Figure 2. Site Map with Sample Locations

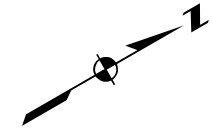
Figure 3. PCE and TCE Concentrations in Soil Vapor ($\mu\text{g}/\text{m}^3$)



GSJ Job No.	6239	Drawn by:	AV
Issued:	2-Jun-2022	Chk'd by:	SC
Revised:		Apr'd by:	TFW
Map ID:	RS6239_SLM	FIGURE 1	

SITE LOCATION MAP

Riverside Scrap Iron & Metal
Riverside, California

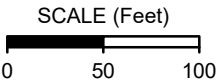


LEGEND

- 5 Foot Soil Vapor Probe
- 5 and 15 Foot Soil Vapor Probe
- 5, 15, and 30 Foot Soil Vapor Probe
- Site Boundary

Notes

- Basemap downloaded from Google Earth Pro dated October 2016.
- VP-6 probes were installed at 5' and 13'. VP-14 probes were installed at 5', 15', and 22'.



Projected Coordinate System
Datum: NAD83
State Plane California Zone VI
Units: Feet

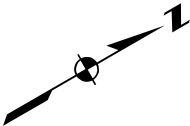


SOIL VAPOR SAMPLE LOCATIONS

Riverside Scrap Iron & Metal
Riverside, California

GSI Job No.	6239	Drawn By:	AV
Issued:	22-Nov-2022	Chk'd By:	SC
Map ID:	RS6239_SVPNov22	Appv'd By:	SC

FIGURE 2

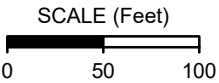


LEGEND

- 5 Foot Soil Vapor Probe
- 5 and 15 Foot Soil Vapor Probe
- 5, 15, and 30 Foot Soil Vapor Probe
- Site Boundary

Notes

- 1) Basemap downloaded from Google Earth Pro dated October 2016.
- 2) VP-6 probes were installed at 5' and 13'. VP-14 probes installed at 5', 15', and 22'.
- 3) Depth = feet below ground surface; < = not detected above the designated laboratory reporting limit; DUP = duplicate sample; PCE = tetrachloroethene; TCE = trichloroethene.
- 4) Concentrations are in micrograms per cubic meter (µg/m3)



Projected Coordinate System
Datum: NAD83
State Plane California Zone VI
Units: Feet



PCE AND TCE IN SOIL VAPOR

Riverside Scrap Iron & Metal
Riverside, California

GSI Job No.	6239	Drawn By:	AV
Issued:	9-Dec-2022	Chk'd By:	SC
Map ID:	RS6239_SVP_PCETCE	App'd By:	SC

FIGURE 3

APPENDICES

Appendix A. Analytical Laboratory Reports – Soil Vapor
Appendix B. Boring Logs
Appendix C. Duplicate Soil Vapor Sample Evaluation
Appendix D. Soil Vapor Purge Volumes
Appendix E. Historical Soil Vapor Data

APPENDIX A

Analytical Laboratory Reports – Soil Vapor

08 December 2022

Samantha Curtis
GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

H&P Project: GSI111722-10
Client Project: 6239 / Riverside



Dear Samantha Curtis:

Enclosed is the analytical report for the above referenced project. The data herein applies to samples as received by H&P Mobile Geochemistry, Inc. on 11/16/2022-11/17/2022 which were analyzed in accordance with the attached Chain of Custody record(s).

The results for all sample analyses and required QA/QC analyses are presented in the following sections and summarized in the documents:

- Sample Summary
- Case Narrative (if applicable)
- Sample Results
- Quality Control Summary
- Notes and Definitions / Appendix
- Chain of Custody
- Sampling Logs (if applicable)

Unless otherwise noted, I certify that all analyses were performed and reviewed in compliance with our Quality Systems Manual and Standard Operating Procedures. This report shall not be reproduced, except in full, without the written approval of H&P Mobile Geochemistry, Inc.

We at H&P Mobile Geochemistry, Inc. sincerely appreciate the opportunity to provide analytical services to you on this project. If you have any questions or concerns regarding this analytical report, please contact me at your convenience at 760-804-9678.

Sincerely,



Lisa Eminhizer
Laboratory Director

H&P Mobile Geochemistry, Inc. is certified under the California ELAP and the National Environmental Laboratory Accreditation Conference (NELAC) for the fields of proficiency and analytes listed on those certificates. H&P is approved as an Environmental Testing Laboratory in accordance with the DoD-ELAP Program and ISO/IEC 17025:2005 programs for the fields of proficiency and analytes included in the certification process and to the extent offered by the accreditation agency. Unless otherwise noted, accreditation certificate numbers, expiration of certificates, and scope of accreditation can be found at: www.handpmg.com/about/certifications. Fields of services and analytes contained in this report that are not listed on the certificates should be considered uncertified or unavailable for certification.

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
VP-1-30	E211049-01	Vapor	16-Nov-22	16-Nov-22
VP-1-15	E211049-02	Vapor	16-Nov-22	16-Nov-22
VP-1-5	E211049-03	Vapor	16-Nov-22	16-Nov-22
AA	E211049-04	Vapor	16-Nov-22	16-Nov-22
VP-9-30	E211049-05	Vapor	16-Nov-22	16-Nov-22
VP-9-15	E211049-06	Vapor	16-Nov-22	16-Nov-22
VP-9-5	E211049-07	Vapor	16-Nov-22	16-Nov-22
VP-2-15	E211049-08	Vapor	16-Nov-22	16-Nov-22
VP-2-5	E211049-09	Vapor	16-Nov-22	16-Nov-22
VP-3-15	E211049-10	Vapor	16-Nov-22	16-Nov-22
VP-3-5	E211049-11	Vapor	16-Nov-22	16-Nov-22
VP-11-15	E211049-12	Vapor	16-Nov-22	16-Nov-22
VP-11-5	E211049-13	Vapor	16-Nov-22	16-Nov-22
VP-10-15	E211049-14	Vapor	16-Nov-22	16-Nov-22
VP-10-5	E211049-15	Vapor	16-Nov-22	16-Nov-22
VP-17-15	E211049-16	Vapor	16-Nov-22	16-Nov-22
VP-17-5	E211049-17	Vapor	16-Nov-22	16-Nov-22
VP-17-5 Rep	E211049-18	Vapor	16-Nov-22	16-Nov-22
VP-18-15	E211049-19	Vapor	16-Nov-22	16-Nov-22
VP-18-5	E211049-20	Vapor	16-Nov-22	16-Nov-22
VP-19-30	E211050-01	Vapor	17-Nov-22	17-Nov-22
VP-19-15	E211050-02	Vapor	17-Nov-22	17-Nov-22
VP-19-5	E211050-03	Vapor	17-Nov-22	17-Nov-22
VP-20-30	E211050-04	Vapor	17-Nov-22	17-Nov-22
VP-20-30 Rep	E211050-05	Vapor	17-Nov-22	17-Nov-22
VP-20-15	E211050-06	Vapor	17-Nov-22	17-Nov-22
VP-20-5	E211050-07	Vapor	17-Nov-22	17-Nov-22
VP-12-15	E211050-08	Vapor	17-Nov-22	17-Nov-22

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
VP-12-5	E211050-09	Vapor	17-Nov-22	17-Nov-22
VP-12-30	E211050-10	Vapor	17-Nov-22	17-Nov-22
VP-13-15	E211050-11	Vapor	17-Nov-22	17-Nov-22
VP-13-5	E211050-12	Vapor	17-Nov-22	17-Nov-22
VP-14-22	E211050-13	Vapor	17-Nov-22	17-Nov-22
VP-14-15	E211050-14	Vapor	17-Nov-22	17-Nov-22
VP-14-5	E211050-15	Vapor	17-Nov-22	17-Nov-22
VP-4-15	E211050-16	Vapor	17-Nov-22	17-Nov-22
VP-4-5	E211050-17	Vapor	17-Nov-22	17-Nov-22
VP-5-15	E211050-18	Vapor	17-Nov-22	17-Nov-22
VP-5-5	E211050-19	Vapor	17-Nov-22	17-Nov-22
VP-7-15	E211050-20	Vapor	17-Nov-22	17-Nov-22
VP-7-5	E211050-21	Vapor	17-Nov-22	17-Nov-22
VP-6-13	E211050-22	Vapor	17-Nov-22	17-Nov-22
VP-6-5	E211050-23	Vapor	17-Nov-22	17-Nov-22
VP-16-15	E211050-24	Vapor	17-Nov-22	17-Nov-22
VP-16-5	E211050-25	Vapor	17-Nov-22	17-Nov-22
VP-8-15	E211050-26	Vapor	17-Nov-22	17-Nov-22
VP-8-5	E211050-27	Vapor	17-Nov-22	17-Nov-22
VP-15-5	E211050-28	Vapor	17-Nov-22	17-Nov-22
VP-21-15	E211050-29	Vapor	17-Nov-22	17-Nov-22
VP-21-5	E211050-30	Vapor	17-Nov-22	17-Nov-22

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Batch EK23015

The percent recoveries for Dichlorodifluoromethane and Chloromethane fell above the method criteria in the continuing calibration verification (CCV). Any results for these analytes, for samples included in this batch, may be biased high.

Batch EL20615

The percent recovery for Hexachlorobutadiene fell below the method criteria in the CCV. Any results for this analyte, for samples included in this batch, may be biased low.

Batch EI20716

The percent recoveries for 2-Butanone, 1,2,4-Trichlorobenzene and Hexachlorobutadiene fell below the method criteria in the CCV. Any results for these analytes, for samples included in this batch, may be biased low.

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

DETECTIONS SUMMARY

Sample ID: VP-1-30

Laboratory ID: E211049-01

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.5	5.0	ug/m3	EPA TO-15	
Chloromethane	3.5	2.1	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	85	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	120	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	370	7.7	ug/m3	EPA TO-15	
Carbon disulfide	20	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	54	30	ug/m3	EPA TO-15	
Chloroform	20	4.9	ug/m3	EPA TO-15	
Benzene	8.7	3.2	ug/m3	EPA TO-15	
Trichloroethene	1700	5.5	ug/m3	EPA TO-15	
Toluene	4.4	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	720	6.9	ug/m3	EPA TO-15	

Sample ID: VP-1-15

Laboratory ID: E211049-02

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	66	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	49	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	290	7.7	ug/m3	EPA TO-15	
Carbon disulfide	69	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	69	30	ug/m3	EPA TO-15	
Chloroform	12	4.9	ug/m3	EPA TO-15	
Benzene	25	3.2	ug/m3	EPA TO-15	
Trichloroethene	680	5.5	ug/m3	EPA TO-15	
Toluene	6.3	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	390	6.9	ug/m3	EPA TO-15	

Sample ID: VP-1-5

Laboratory ID: E211049-03

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	22	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	94	7.7	ug/m3	EPA TO-15	
Trichloroethene	97	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	150	6.9	ug/m3	EPA TO-15	

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Sample ID: AA

Laboratory ID: E211049-04

Analyte	Result	Reporting Limit	Units	Method	Notes
No Detections Reported					

Sample ID: VP-9-30

Laboratory ID: E211049-05

Analyte	Result	Reporting Limit	Units	Method	Notes
Dichlorodifluoromethane (F12)	8.4	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	86	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	110	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	370	7.7	ug/m3	EPA TO-15	
Carbon disulfide	12	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	62	30	ug/m3	EPA TO-15	
Chloroform	20	4.9	ug/m3	EPA TO-15	
Trichloroethene	1700	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	670	6.9	ug/m3	EPA TO-15	

Sample ID: VP-9-15

Laboratory ID: E211049-06

Analyte	Result	Reporting Limit	Units	Method	Notes
Dichlorodifluoromethane (F12)	6.8	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	53	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	6.5	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	230	7.7	ug/m3	EPA TO-15	
Carbon disulfide	29	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	40	30	ug/m3	EPA TO-15	
Chloroform	6.4	4.9	ug/m3	EPA TO-15	
Benzene	6.2	3.2	ug/m3	EPA TO-15	
Trichloroethene	380	5.5	ug/m3	EPA TO-15	
Toluene	4.7	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	250	6.9	ug/m3	EPA TO-15	

Sample ID: VP-9-5

Laboratory ID: E211049-07

Analyte	Result	Reporting Limit	Units	Method	Notes
Trichlorofluoromethane (F11)	13	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	ug/m3	EPA TO-15	
Carbon disulfide	15	6.3	ug/m3	EPA TO-15	
Trichloroethene	17	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	71	6.9	ug/m3	EPA TO-15	

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Reported:
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Sample ID: VP-2-15

Laboratory ID: E211049-08

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Dichlorodifluoromethane (F12)	8.2	5.0		ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	56	5.6		ug/m3	EPA TO-15	
1,1-Dichloroethene	17	4.0		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	210	7.7		ug/m3	EPA TO-15	
Carbon disulfide	7.4	6.3		ug/m3	EPA TO-15	
Chloroform	33	4.9		ug/m3	EPA TO-15	
Trichloroethene	510	5.5		ug/m3	EPA TO-15	
Tetrachloroethene	450	6.9		ug/m3	EPA TO-15	

Sample ID: VP-2-5

Laboratory ID: E211049-09

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Trichlorofluoromethane (F11)	23	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	72	7.7		ug/m3	EPA TO-15	
Carbon disulfide	7.5	6.3		ug/m3	EPA TO-15	
Trichloroethene	48	5.5		ug/m3	EPA TO-15	
Tetrachloroethene	110	6.9		ug/m3	EPA TO-15	

Sample ID: VP-3-15

Laboratory ID: E211049-10

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Dichlorodifluoromethane (F12)	7.9	5.0		ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	66	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	140	7.7		ug/m3	EPA TO-15	
Chloroform	23	4.9		ug/m3	EPA TO-15	
Trichloroethene	250	5.5		ug/m3	EPA TO-15	
Tetrachloroethene	240	6.9		ug/m3	EPA TO-15	

Sample ID: VP-3-5

Laboratory ID: E211049-11

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
1,1-Difluoroethane (LCC)	14	5.5		ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	5.9	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	8.3	7.7		ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	9.1	3.5		ug/m3	EPA TO-15	
Carbon disulfide	19	6.3		ug/m3	EPA TO-15	
Chloroform	11	4.9		ug/m3	EPA TO-15	
Benzene	6.7	3.2		ug/m3	EPA TO-15	
Trichloroethene	28	5.5		ug/m3	EPA TO-15	

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Sample ID: VP-3-5

Laboratory ID: E211049-11

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Toluene	14	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	12	6.9	ug/m3	EPA TO-15	

Sample ID: VP-11-15

Laboratory ID: E211049-12

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	7.9	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	90	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	240	7.7	ug/m3	EPA TO-15	
Trichloroethene	770	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	460	6.9	ug/m3	EPA TO-15	

Sample ID: VP-11-5

Laboratory ID: E211049-13

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	5.3	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	34	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	95	7.7	ug/m3	EPA TO-15	
Trichloroethene	29	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	89	6.9	ug/m3	EPA TO-15	

Sample ID: VP-10-15

Laboratory ID: E211049-14

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	6.3	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	51	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	17	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	99	7.7	ug/m3	EPA TO-15	
Carbon disulfide	13	6.3	ug/m3	EPA TO-15	
Trichloroethene	430	5.5	ug/m3	EPA TO-15	
Toluene	4.3	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	270	6.9	ug/m3	EPA TO-15	

Sample ID: VP-10-5

Laboratory ID: E211049-15

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	23	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	37	7.7	ug/m3	EPA TO-15	
Carbon disulfide	8.0	6.3	ug/m3	EPA TO-15	

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Sample ID: **VP-10-5**

Laboratory ID: **E211049-15**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Benzene	3.5	3.2	ug/m3	EPA TO-15	
Trichloroethene	70	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	80	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-17-15**

Laboratory ID: **E211049-16**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	19	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	49	7.7	ug/m3	EPA TO-15	
Carbon disulfide	11	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	39	30	ug/m3	EPA TO-15	
Trichloroethene	290	5.5	ug/m3	EPA TO-15	
Toluene	6.6	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	180	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-17-5**

Laboratory ID: **E211049-17**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	11	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	23	7.7	ug/m3	EPA TO-15	
Carbon disulfide	9.3	6.3	ug/m3	EPA TO-15	
Trichloroethene	55	5.5	ug/m3	EPA TO-15	
Toluene	6.5	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	76	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-17-5 Rep**

Laboratory ID: **E211049-18**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	19	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	ug/m3	EPA TO-15	
Carbon disulfide	12	6.3	ug/m3	EPA TO-15	
2-Butanone (MEK)	74	30	ug/m3	EPA TO-15	
Trichloroethene	300	5.5	ug/m3	EPA TO-15	
Toluene	6.7	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	180	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-18-15**

Laboratory ID: **E211049-19**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			

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Sample ID: **VP-18-15**

Laboratory ID: **E211049-19**

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Trichlorofluoromethane (F11)	79	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	43	7.7		ug/m3	EPA TO-15	
Carbon disulfide	16	6.3		ug/m3	EPA TO-15	
2-Butanone (MEK)	100	30		ug/m3	EPA TO-15	
Trichloroethene	110	5.5		ug/m3	EPA TO-15	
Toluene	6.6	3.8		ug/m3	EPA TO-15	
Tetrachloroethene	200	6.9		ug/m3	EPA TO-15	

Sample ID: **VP-18-5**

Laboratory ID: **E211049-20**

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Trichlorofluoromethane (F11)	41	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	14	7.7		ug/m3	EPA TO-15	
Trichloroethene	7.6	5.5		ug/m3	EPA TO-15	
Toluene	4.1	3.8		ug/m3	EPA TO-15	
Tetrachloroethene	49	6.9		ug/m3	EPA TO-15	

Sample ID: **VP-19-30**

Laboratory ID: **E211050-01**

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Trichlorofluoromethane (F11)	64	5.6		ug/m3	EPA TO-15	
1,1-Dichloroethene	26	4.0		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	180	7.7		ug/m3	EPA TO-15	
Chloroform	7.5	4.9		ug/m3	EPA TO-15	
Trichloroethene	1500	5.5		ug/m3	EPA TO-15	
Tetrachloroethene	840	6.9		ug/m3	EPA TO-15	

Sample ID: **VP-19-15**

Laboratory ID: **E211050-02**

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Trichlorofluoromethane (F11)	52	5.6		ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	100	7.7		ug/m3	EPA TO-15	
Carbon disulfide	71	6.3		ug/m3	EPA TO-15	
Benzene	4.9	3.2		ug/m3	EPA TO-15	
Trichloroethene	380	5.5		ug/m3	EPA TO-15	
Toluene	10	3.8		ug/m3	EPA TO-15	
Tetrachloroethene	420	6.9		ug/m3	EPA TO-15	

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Sample ID: **VP-19-5**

Laboratory ID: **E211050-03**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	11	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	32	7.7	ug/m3	EPA TO-15	
Carbon disulfide	44	6.3	ug/m3	EPA TO-15	
Benzene	8.1	3.2	ug/m3	EPA TO-15	
Trichloroethene	41	5.5	ug/m3	EPA TO-15	
Toluene	6.5	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	91	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-20-30**

Laboratory ID: **E211050-04**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.9	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	130	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	32	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	130	7.7	ug/m3	EPA TO-15	
Chloroform	21	4.9	ug/m3	EPA TO-15	
Trichloroethene	1600	5.5	ug/m3	EPA TO-15	
Toluene	4.3	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	710	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-20-30 Rep**

Laboratory ID: **E211050-05**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	9.9	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	160	5.6	ug/m3	EPA TO-15	
1,1-Dichloroethene	31	4.0	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	140	7.7	ug/m3	EPA TO-15	
Chloroform	22	4.9	ug/m3	EPA TO-15	
Trichloroethene	1700	5.5	ug/m3	EPA TO-15	
Toluene	5.0	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	750	6.9	ug/m3	EPA TO-15	

Sample ID: **VP-20-15**

Laboratory ID: **E211050-06**

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	6.9	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	82	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	73	7.7	ug/m3	EPA TO-15	
Chloroform	6.7	4.9	ug/m3	EPA TO-15	

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Sample ID: VP-20-15

Laboratory ID: E211050-06

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichloroethene	650	5.5	ug/m3	EPA TO-15	
Toluene	4.4	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	450	6.9	ug/m3	EPA TO-15	

Sample ID: VP-20-5

Laboratory ID: E211050-07

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	22	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	19	7.7	ug/m3	EPA TO-15	
Trichloroethene	51	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	91	6.9	ug/m3	EPA TO-15	

Sample ID: VP-12-15

Laboratory ID: E211050-08

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.7	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	100	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	50	7.7	ug/m3	EPA TO-15	
Carbon disulfide	13	6.3	ug/m3	EPA TO-15	
Trichloroethene	73	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	210	6.9	ug/m3	EPA TO-15	

Sample ID: VP-12-5

Laboratory ID: E211050-09

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	68	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	27	7.7	ug/m3	EPA TO-15	
Tetrachloroethene	94	6.9	ug/m3	EPA TO-15	

Sample ID: VP-12-30

Laboratory ID: E211050-10

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	10	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	230	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	79	7.7	ug/m3	EPA TO-15	
2-Butanone (MEK)	32	30	ug/m3	EPA TO-15	
Trichloroethene	310	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	330	6.9	ug/m3	EPA TO-15	

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Reported:
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Sample ID: VP-13-15

Laboratory ID: E211050-11

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.2	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	410	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	22	7.7	ug/m3	EPA TO-15	
Trichloroethene	36	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	120	6.9	ug/m3	EPA TO-15	

Sample ID: VP-13-5

Laboratory ID: E211050-12

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	180	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	14	7.7	ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	3.6	3.5	ug/m3	EPA TO-15	
Carbon disulfide	32	6.3	ug/m3	EPA TO-15	
Benzene	3.4	3.2	ug/m3	EPA TO-15	
Trichloroethene	20	5.5	ug/m3	EPA TO-15	
Toluene	6.9	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	40	6.9	ug/m3	EPA TO-15	

Sample ID: VP-14-22

Laboratory ID: E211050-13

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	13	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	350	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	ug/m3	EPA TO-15	
Carbon disulfide	16	6.3	ug/m3	EPA TO-15	
Chloroform	8.5	4.9	ug/m3	EPA TO-15	
Benzene	3.8	3.2	ug/m3	EPA TO-15	
Trichloroethene	360	5.5	ug/m3	EPA TO-15	
Toluene	8.7	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	570	6.9	ug/m3	EPA TO-15	

Sample ID: VP-14-15

Laboratory ID: E211050-14

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.9	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	200	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	23	7.7	ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	3.6	3.5	ug/m3	EPA TO-15	
Benzene	6.5	3.2	ug/m3	EPA TO-15	

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Sample ID: VP-14-15

Laboratory ID: E211050-14

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichloroethene	120	5.5	ug/m3	EPA TO-15	
Toluene	27	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	460	6.9	ug/m3	EPA TO-15	
m,p-Xylene	17	8.8	ug/m3	EPA TO-15	
o-Xylene	6.4	4.4	ug/m3	EPA TO-15	
1,2,4-Trimethylbenzene	7.6	5.0	ug/m3	EPA TO-15	

Sample ID: VP-14-5

Laboratory ID: E211050-15

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	8.4	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	200	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	21	7.7	ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	6.2	3.5	ug/m3	EPA TO-15	
Carbon disulfide	120	6.3	ug/m3	EPA TO-15	
Chloroform	5.9	4.9	ug/m3	EPA TO-15	
Benzene	15	3.2	ug/m3	EPA TO-15	
Trichloroethene	94	5.5	ug/m3	EPA TO-15	
Toluene	77	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	160	6.9	ug/m3	EPA TO-15	
Ethylbenzene	6.3	4.4	ug/m3	EPA TO-15	
m,p-Xylene	13	8.8	ug/m3	EPA TO-15	
o-Xylene	7.1	4.4	ug/m3	EPA TO-15	
1,2,4-Trimethylbenzene	7.9	5.0	ug/m3	EPA TO-15	

Sample ID: VP-4-15

Laboratory ID: E211050-16

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	99	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	26	7.7	ug/m3	EPA TO-15	
Trichloroethene	13	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	180	6.9	ug/m3	EPA TO-15	

Sample ID: VP-4-5

Laboratory ID: E211050-17

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	64	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	15	7.7	ug/m3	EPA TO-15	
Carbon disulfide	67	6.3	ug/m3	EPA TO-15	

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Sample ID: VP-4-5

Laboratory ID: E211050-17

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichloroethene	19	5.5	ug/m3	EPA TO-15	
Toluene	11	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	35	6.9	ug/m3	EPA TO-15	

Sample ID: VP-5-15

Laboratory ID: E211050-18

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	6.7	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	220	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	20	7.7	ug/m3	EPA TO-15	
Trichloroethene	11	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	110	6.9	ug/m3	EPA TO-15	

Sample ID: VP-5-5

Laboratory ID: E211050-19

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	60	5.6	ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	26	3.5	ug/m3	EPA TO-15	
Carbon disulfide	71	6.3	ug/m3	EPA TO-15	
Chloroform	17	4.9	ug/m3	EPA TO-15	
Benzene	6.3	3.2	ug/m3	EPA TO-15	
Trichloroethene	180	5.5	ug/m3	EPA TO-15	
Toluene	23	3.8	ug/m3	EPA TO-15	
Tetrachloroethene	12	6.9	ug/m3	EPA TO-15	
o-Xylene	4.9	4.4	ug/m3	EPA TO-15	QL-1H

Sample ID: VP-7-15

Laboratory ID: E211050-20

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	6.1	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	180	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	26	7.7	ug/m3	EPA TO-15	
Trichloroethene	40	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	210	6.9	ug/m3	EPA TO-15	

Sample ID: VP-7-5

Laboratory ID: E211050-21

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	53	5.6	ug/m3	EPA TO-15	

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Sample ID: VP-7-5

Laboratory ID: E211050-21

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichloroethene	14	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	47	6.9	ug/m3	EPA TO-15	

Sample ID: VP-6-13

Laboratory ID: E211050-22

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	7.2	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	100	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	39	7.7	ug/m3	EPA TO-15	
Carbon disulfide	73	6.3	ug/m3	EPA TO-15	
Trichloroethene	32	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	140	6.9	ug/m3	EPA TO-15	

Sample ID: VP-6-5

Laboratory ID: E211050-23

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	7.8	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	91	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	35	7.7	ug/m3	EPA TO-15	
Tetrachloroethene	39	6.9	ug/m3	EPA TO-15	

Sample ID: VP-16-15

Laboratory ID: E211050-24

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	50	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	44	7.7	ug/m3	EPA TO-15	
Trichloroethene	190	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	360	6.9	ug/m3	EPA TO-15	

Sample ID: VP-16-5

Laboratory ID: E211050-25

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	23	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	16	7.7	ug/m3	EPA TO-15	
Trichloroethene	6.4	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	97	6.9	ug/m3	EPA TO-15	

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Sample ID: VP-8-15

Laboratory ID: E211050-26

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	6.8	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	85	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	50	7.7	ug/m3	EPA TO-15	
Methylene chloride (Dichloromethane)	5.3	3.5	ug/m3	EPA TO-15	
Carbon disulfide	52	6.3	ug/m3	EPA TO-15	
Trichloroethene	190	5.5	ug/m3	EPA TO-15	
Tetrachloroethene	140	6.9	ug/m3	EPA TO-15	

Sample ID: VP-8-5

Laboratory ID: E211050-27

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
1,1-Difluoroethane (LCC)	520	5.5	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	14	5.6	ug/m3	EPA TO-15	
Tetrachloroethene	30	6.9	ug/m3	EPA TO-15	

Sample ID: VP-15-5

Laboratory ID: E211050-28

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Trichlorofluoromethane (F11)	460	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	10	7.7	ug/m3	EPA TO-15	
Carbon disulfide	13	6.3	ug/m3	EPA TO-15	
Chloroform	6.9	4.9	ug/m3	EPA TO-15	
1,1,1-Trichloroethane	9.4	5.5	ug/m3	EPA TO-15	
1,2-Dichloroethane (EDC)	17	4.1	ug/m3	EPA TO-15	
Tetrachloroethene	14	6.9	ug/m3	EPA TO-15	

Sample ID: VP-21-15

Laboratory ID: E211050-29

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
Dichlorodifluoromethane (F12)	7.3	5.0	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	510	5.6	ug/m3	EPA TO-15	
1,1,2-Trichlorotrifluoroethane (F113)	39	7.7	ug/m3	EPA TO-15	
Tetrachloroethene	150	6.9	ug/m3	EPA TO-15	

Sample ID: VP-21-5

Laboratory ID: E211050-30

Analyte	Result	Reporting	Units	Method	Notes
		Limit			
1,1-Difluoroethane (LCC)	11	5.5	ug/m3	EPA TO-15	
Trichlorofluoromethane (F11)	160	5.6	ug/m3	EPA TO-15	

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Sample ID: **VP-21-5**

Laboratory ID: **E211050-30**

Analyte	Result	Reporting		Units	Method	Notes
		Limit				
Carbon disulfide	92	6.3		ug/m3	EPA TO-15	
Chloroform	34	4.9		ug/m3	EPA TO-15	
Benzene	39	3.2		ug/m3	EPA TO-15	
Toluene	10	3.8		ug/m3	EPA TO-15	
Tetrachloroethene	8.0	6.9		ug/m3	EPA TO-15	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-1-30 (E211049-01) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.5	5.0	"	"	"	"	"	"	
Chloromethane	3.5	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	85	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	120	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	370	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	20	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	54	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	20	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	8.7	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	1700	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.4	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	720	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-1-30 (E211049-01) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

117 %

76-134

"

"

"

"

Surrogate: Toluene-d8

104 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

86.5 %

77-127

"

"

"

"

VP-1-15 (E211049-02) Vapor

Sampled: 16-Nov-22

Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	66	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	49	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	290	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	69	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	69	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	12	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	25	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-1-15 (E211049-02) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	680	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.3	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	390	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		118 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		105 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		87.6 %	77-127		"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-1-5 (E211049-03) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	22	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	94	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	97	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	150	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-1-5 (E211049-03) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		117 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		106 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		88.2 %	77-127		"	"	"	"	

AA (E211049-04) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

Dichlorodifluoromethane (F12)	ND	5.0	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	ND	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	ND	5.5	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
AA (E211049-04) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,2-Dichloropropane	ND	9.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	ND	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		118 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		108 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		86.4 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Project: GSI111722-10
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Reported:
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-9-30 (E211049-05) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.4	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	86	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	110	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	370	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	12	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	62	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	20	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	1700	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	670	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-9-30 (E211049-05) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

118 %

76-134

"

"

"

"

Surrogate: Toluene-d8

104 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

84.4 %

77-127

"

"

"

"

VP-9-15 (E211049-06) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.8	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	53	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	6.5	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	230	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	29	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	40	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	6.4	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	6.2	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-9-15 (E211049-06) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	380	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.7	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	250	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		121 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		105 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		83.6 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-9-5 (E211049-07) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	13	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	15	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	17	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	71	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-9-5 (E211049-07) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

121 %

76-134

"

"

"

"

Surrogate: Toluene-d8

108 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

85.8 %

77-127

"

"

"

"

VP-2-15 (E211049-08) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.2	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	56	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	17	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	210	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	7.4	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	33	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
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Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-2-15 (E211049-08) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	510	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	450	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		123 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		106 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		83.7 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-2-5 (E211049-09) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	23	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	72	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	7.5	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	48	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	110	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Irvine, CA 92618

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Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-2-5 (E211049-09) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

125 % 76-134

" " " "

Surrogate: Toluene-d8

110 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

84.1 % 77-127

" " " "

VP-3-15 (E211049-10) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
Dichlorodifluoromethane (F12)	7.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	66	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	140	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	23	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-3-15 (E211049-10) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	250	5.5	ug/m3	1	EK23015	30-Nov-22	30-Nov-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	240	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		124 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		108 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		83.0 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Reported:
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-3-5 (E211049-11) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	14	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	5.9	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	8.3	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	9.1	3.5	"	"	"	"	"	"	
Carbon disulfide	19	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	11	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	6.7	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	28	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	14	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	12	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-3-5 (E211049-11) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

124 %

76-134

"

"

"

"

Surrogate: Toluene-d8

109 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

85.9 %

77-127

"

"

"

"

VP-11-15 (E211049-12) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	7.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	90	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	240	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-11-15 (E211049-12) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	770	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	460	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		124 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		106 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		83.2 %	77-127		"	"	"	"	

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Reported:
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-11-5 (E211049-13) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	5.3	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	34	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	95	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	29	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	89	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-11-5 (E211049-13) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

122 %

76-134

"

"

"

"

Surrogate: Toluene-d8

110 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

81.8 %

77-127

"

"

"

"

VP-10-15 (E211049-14) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.3	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	51	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	17	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	99	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	13	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-10-15 (E211049-14) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	430	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.3	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	270	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		124 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		106 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		80.6 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-10-5 (E211049-15) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	23	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	37	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	8.0	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	3.5	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	70	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	80	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-10-5 (E211049-15) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		125 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		110 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		81.6 %	77-127		"	"	"	"	
VP-17-15 (E211049-16) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	19	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	49	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	11	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	39	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-17-15 (E211049-16) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	290	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.6	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	180	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		129 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		103 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		81.9 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-17-5 (E211049-17) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	11	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	23	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	9.3	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	55	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.5	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	76	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-17-5 (E211049-17) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

127 % 76-134

" " " "

Surrogate: Toluene-d8

111 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

82.4 % 77-127

" " " "

VP-17-5 Rep (E211049-18) Vapor

Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	19	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	12	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	74	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-17-5 Rep (E211049-18) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	300	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.7	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	180	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		125 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		101 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		79.6 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-18-15 (E211049-19) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	79	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	43	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	16	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	100	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	110	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.6	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	200	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-18-15 (E211049-19) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

127 %

76-134

"

"

"

"

Surrogate: Toluene-d8

106 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

83.3 %

77-127

"

"

"

"

VP-18-5 (E211049-20) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	41	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	14	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-18-5 (E211049-20) Vapor Sampled: 16-Nov-22 Received: 16-Nov-22									
Trichloroethene	7.6	5.5	ug/m3	1	EK23015	30-Nov-22	01-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.1	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	49	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		128 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		111 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		82.2 %	77-127		"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-19-30 (E211050-01) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	64	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	26	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	180	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	7.5	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	1500	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	840	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-19-30 (E211050-01) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

97.4 %

76-134

"

"

"

"

Surrogate: Toluene-d8

100 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

99.5 %

77-127

"

"

"

"

VP-19-15 (E211050-02) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	52	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	100	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	71	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	4.9	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-19-15 (E211050-02) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	380	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	10	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	420	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		98.2 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		97.3 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		100 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-19-5 (E211050-03) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	11	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	32	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	44	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	8.1	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	41	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.5	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	91	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-19-5 (E211050-03) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		94.1 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		97.8 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		102 %	77-127		"	"	"	"	
VP-20-30 (E211050-04) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	130	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	32	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	130	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	21	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-20-30 (E211050-04) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	1600	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.3	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	710	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		98.8 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		99.0 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		97.1 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-20-30 Rep (E211050-05) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	9.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	160	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	31	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	140	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	22	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	1700	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	5.0	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	750	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-20-30 Rep (E211050-05) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

98.4 % 76-134

" " " "

Surrogate: Toluene-d8

98.4 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

95.6 % 77-127

" " " "

VP-20-15 (E211050-06) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	82	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	73	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	6.7	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-20-15 (E211050-06) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	650	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	4.4	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	450	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		98.8 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		94.9 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		101 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-20-5 (E211050-07) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	22	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	19	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	51	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	91	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-20-5 (E211050-07) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		96.0 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		98.4 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		96.6 %	77-127		"	"	"	"	
VP-12-15 (E211050-08) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.7	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	100	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	50	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	13	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-12-15 (E211050-08) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	73	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	210	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		101 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		98.7 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		99.6 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-12-5 (E211050-09) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	68	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	27	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	ND	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	94	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

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Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-12-5 (E211050-09) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

96.3 % 76-134

" " " "

Surrogate: Toluene-d8

98.4 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

101 % 77-127

" " " "

VP-12-30 (E211050-10) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	10	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	230	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	79	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	32	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-12-30 (E211050-10) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	310	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	330	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		96.6 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		95.9 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		99.4 %	77-127		"	"	"	"	

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08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-13-15 (E211050-11) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.2	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	410	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	22	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	36	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	120	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-13-15 (E211050-11) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	06-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

96.7 % 76-134

" " " "

Surrogate: Toluene-d8

95.9 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

98.4 % 77-127

" " " "

VP-13-5 (E211050-12) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	180	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	14	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	3.6	3.5	"	"	"	"	"	"	
Carbon disulfide	32	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	3.4	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-13-5 (E211050-12) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	20	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	6.9	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	40	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		96.7 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		97.4 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		98.8 %	77-127		"	"	"	"	

GSI Environmental, Inc
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08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-14-22 (E211050-13) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	13	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	350	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	51	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	16	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	8.5	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	3.8	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	360	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	8.7	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	570	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-14-22 (E211050-13) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		96.5 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		96.4 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		101 %	77-127		"	"	"	"	
VP-14-15 (E211050-14) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.9	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	200	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	23	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	3.6	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	6.5	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-14-15 (E211050-14) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	120	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	27	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	460	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	17	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	6.4	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	7.6	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		95.3 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		99.0 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		105 %	77-127		"	"	"	"	

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Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-14-5 (E211050-15) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	8.4	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	200	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	21	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	6.2	3.5	"	"	"	"	"	"	
Carbon disulfide	120	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	5.9	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	15	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	94	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	77	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	160	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	6.3	4.4	"	"	"	"	"	"	
m,p-Xylene	13	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-14-5 (E211050-15) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	7.1	4.4	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	7.9	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

97.2 %

76-134

"

"

"

"

Surrogate: Toluene-d8

96.6 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

108 %

77-127

"

"

"

"

VP-4-15 (E211050-16) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	99	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	26	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-4-15 (E211050-16) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	13	5.5	ug/m3	1	EL20615	06-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	180	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		97.8 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		95.7 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		108 %	77-127		"	"	"	"	

GSI Environmental, Inc
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08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-4-5 (E211050-17) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	64	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	15	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	67	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	19	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	11	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	35	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-4-5 (E211050-17) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		102 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		106 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		74.3 %	77-127		"	"	"	"	S-GC

VP-5-15 (E211050-18) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.7	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	220	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	20	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-5-15 (E211050-18) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	11	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	110	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		101 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		106 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		75.2 %	77-127		"	"	"	"	S-GC

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-5-5 (E211050-19) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	60	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	26	3.5	"	"	"	"	"	"	
Carbon disulfide	71	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	17	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	6.3	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	180	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	23	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	12	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-5-5 (E211050-19) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	4.9	4.4	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	QL-1H
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

102 %

76-134

"

"

"

"

Surrogate: Toluene-d8

110 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

78.1 %

77-127

"

"

"

"

VP-7-15 (E211050-20) Vapor

Sampled: 17-Nov-22

Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.1	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	180	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	26	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-7-15 (E211050-20) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	40	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	210	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		96.0 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		104 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		80.8 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-7-5 (E211050-21) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	53	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	14	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	47	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-7-5 (E211050-21) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

97.2 %

76-134

"

"

"

"

Surrogate: Toluene-d8

103 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

86.7 %

77-127

"

"

"

"

VP-6-13 (E211050-22) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	7.2	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	100	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	39	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	73	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-6-13 (E211050-22) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	32	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	140	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		95.8 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		105 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		90.8 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-6-5 (E211050-23) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	7.8	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	91	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	35	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	ND	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	39	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-6-5 (E211050-23) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

102 % 76-134

" " " "

Surrogate: Toluene-d8

101 % 78-125

" " " "

Surrogate: 4-Bromofluorobenzene

95.4 % 77-127

" " " "

VP-16-15 (E211050-24) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	50	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	44	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-16-15 (E211050-24) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	190	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	360	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		102 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		105 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		97.9 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-16-5 (E211050-25) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	23	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	16	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	6.4	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	97	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-16-5 (E211050-25) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

102 %

76-134

"

"

"

"

Surrogate: Toluene-d8

104 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

93.6 %

77-127

"

"

"

"

VP-8-15 (E211050-26) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	6.8	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	85	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	50	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	5.3	3.5	"	"	"	"	"	"	
Carbon disulfide	52	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-8-15 (E211050-26) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	190	5.5	ug/m3	1	EL20716	07-Dec-22	07-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	140	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		98.3 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		100 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		96.3 %	77-127		"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-8-5 (E211050-27) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	520	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	14	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	ND	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	30	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
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VP-8-5 (E211050-27) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4

100 %

76-134

"

"

"

"

Surrogate: Toluene-d8

103 %

78-125

"

"

"

"

Surrogate: 4-Bromofluorobenzene

93.7 %

77-127

"

"

"

"

VP-15-5 (E211050-28) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	460	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	10	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	13	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	6.9	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	9.4	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	17	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-15-5 (E211050-28) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	ND	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	14	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		104 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		107 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		97.0 %	77-127		"	"	"	"	

GSI Environmental, Inc
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Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-21-15 (E211050-29) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	ND	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	7.3	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	510	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	39	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	ND	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	ND	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	ND	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	
Trichloroethene	ND	5.5	"	"	"	"	"	"	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	ND	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	150	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	

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Volatile Organic Compounds by EPA TO-15

H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-21-15 (E211050-29) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
o-Xylene	ND	4.4	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,2,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
<i>Surrogate: 1,2-Dichloroethane-d4</i>		96.5 %	76-134		"	"	"	"	
<i>Surrogate: Toluene-d8</i>		102 %	78-125		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		77.3 %	77-127		"	"	"	"	
VP-21-5 (E211050-30) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
1,1-Difluoroethane (LCC)	11	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
Dichlorodifluoromethane (F12)	ND	5.0	"	"	"	"	"	"	
Chloromethane	ND	2.1	"	"	"	"	"	"	
Dichlorotetrafluoroethane (F114)	ND	7.1	"	"	"	"	"	"	
Vinyl chloride	ND	2.6	"	"	"	"	"	"	
Bromomethane	ND	16	"	"	"	"	"	"	
Chloroethane	ND	8.0	"	"	"	"	"	"	
Trichlorofluoromethane (F11)	160	5.6	"	"	"	"	"	"	
1,1-Dichloroethene	ND	4.0	"	"	"	"	"	"	
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"	"	"	"	"	"	
Methylene chloride (Dichloromethane)	ND	3.5	"	"	"	"	"	"	
Carbon disulfide	92	6.3	"	"	"	"	"	"	
trans-1,2-Dichloroethene	ND	8.0	"	"	"	"	"	"	
1,1-Dichloroethane	ND	4.1	"	"	"	"	"	"	
2-Butanone (MEK)	ND	30	"	"	"	"	"	"	
cis-1,2-Dichloroethene	ND	4.0	"	"	"	"	"	"	
Chloroform	34	4.9	"	"	"	"	"	"	
1,1,1-Trichloroethane	ND	5.5	"	"	"	"	"	"	
1,2-Dichloroethane (EDC)	ND	4.1	"	"	"	"	"	"	
Benzene	39	3.2	"	"	"	"	"	"	
Carbon tetrachloride	ND	6.4	"	"	"	"	"	"	

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H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Dilution Factor	Batch	Prepared	Analyzed	Method	Notes
VP-21-5 (E211050-30) Vapor Sampled: 17-Nov-22 Received: 17-Nov-22									
Trichloroethene	ND	5.5	ug/m3	1	EL20716	07-Dec-22	08-Dec-22	EPA TO-15	
1,2-Dichloropropane	ND	9.4	"	"	"	"	"	"	
Bromodichloromethane	ND	6.8	"	"	"	"	"	"	
cis-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
4-Methyl-2-pentanone (MIBK)	ND	8.3	"	"	"	"	"	"	
trans-1,3-Dichloropropene	ND	4.6	"	"	"	"	"	"	
Toluene	10	3.8	"	"	"	"	"	"	
1,1,2-Trichloroethane	ND	5.5	"	"	"	"	"	"	
2-Hexanone (MBK)	ND	8.3	"	"	"	"	"	"	
Dibromochloromethane	ND	8.6	"	"	"	"	"	"	
Tetrachloroethene	8.0	6.9	"	"	"	"	"	"	
1,2-Dibromoethane (EDB)	ND	7.8	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
Chlorobenzene	ND	4.7	"	"	"	"	"	"	
Ethylbenzene	ND	4.4	"	"	"	"	"	"	
m,p-Xylene	ND	8.8	"	"	"	"	"	"	
Styrene	ND	4.3	"	"	"	"	"	"	
o-Xylene	ND	4.4	"	"	"	"	"	"	
Bromoform	ND	10	"	"	"	"	"	"	
1,1,1,2-Tetrachloroethane	ND	7.0	"	"	"	"	"	"	
4-Ethyltoluene	ND	5.0	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	5.0	"	"	"	"	"	"	
1,3-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,4-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2-Dichlorobenzene	ND	12	"	"	"	"	"	"	
1,2,4-Trichlorobenzene	ND	38	"	"	"	"	"	"	
Hexachlorobutadiene	ND	54	"	"	"	"	"	"	
Surrogate: 1,2-Dichloroethane-d4		102 %	76-134		"	"	"	"	
Surrogate: Toluene-d8		107 %	78-125		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		73.0 %	77-127		"	"	"	"	S-GC

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Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EK23015 - TO-15

Blank (EK23015-BLK1)

Prepared & Analyzed: 30-Nov-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3
Dichlorodifluoromethane (F12)	ND	5.0	"
Chloromethane	ND	2.1	"
Dichlorotetrafluoroethane (F114)	ND	7.1	"
Vinyl chloride	ND	2.6	"
Bromomethane	ND	16	"
Chloroethane	ND	8.0	"
Trichlorofluoromethane (F11)	ND	5.6	"
1,1-Dichloroethene	ND	4.0	"
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"
Methylene chloride (Dichloromethane)	ND	3.5	"
Carbon disulfide	ND	6.3	"
trans-1,2-Dichloroethene	ND	8.0	"
1,1-Dichloroethane	ND	4.1	"
2-Butanone (MEK)	ND	30	"
cis-1,2-Dichloroethene	ND	4.0	"
Chloroform	ND	4.9	"
1,1,1-Trichloroethane	ND	5.5	"
1,2-Dichloroethane (EDC)	ND	4.1	"
Benzene	ND	3.2	"
Carbon tetrachloride	ND	6.4	"
Trichloroethene	ND	5.5	"
1,2-Dichloropropane	ND	9.4	"
Bromodichloromethane	ND	6.8	"
cis-1,3-Dichloropropene	ND	4.6	"
4-Methyl-2-pentanone (MIBK)	ND	8.3	"
trans-1,3-Dichloropropene	ND	4.6	"
Toluene	ND	3.8	"
1,1,2-Trichloroethane	ND	5.5	"
2-Hexanone (MBK)	ND	8.3	"
Dibromochloromethane	ND	8.6	"
Tetrachloroethene	ND	6.9	"
1,2-Dibromoethane (EDB)	ND	7.8	"
1,1,1,2-Tetrachloroethane	ND	7.0	"

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Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EK23015 - TO-15

Blank (EK23015-BLK1)

Prepared & Analyzed: 30-Nov-22

Chlorobenzene	ND	4.7	ug/m3							
Ethylbenzene	ND	4.4	"							
m,p-Xylene	ND	8.8	"							
Styrene	ND	4.3	"							
o-Xylene	ND	4.4	"							
Bromoform	ND	10	"							
1,1,2,2-Tetrachloroethane	ND	7.0	"							
4-Ethyltoluene	ND	5.0	"							
1,3,5-Trimethylbenzene	ND	5.0	"							
1,2,4-Trimethylbenzene	ND	5.0	"							
1,3-Dichlorobenzene	ND	12	"							
1,4-Dichlorobenzene	ND	12	"							
1,2-Dichlorobenzene	ND	12	"							
1,2,4-Trichlorobenzene	ND	38	"							
Hexachlorobutadiene	ND	54	"							
<i>Surrogate: 1,2-Dichloroethane-d4</i>	247		"	214		116	76-134			
<i>Surrogate: Toluene-d8</i>	215		"	208		104	78-125			
<i>Surrogate: 4-Bromofluorobenzene</i>	262		"	363		72.1	77-127			S-GC

LCS (EK23015-BS1)

Prepared & Analyzed: 30-Nov-22

Dichlorodifluoromethane (F12)	120	5.0	ug/m3	101		122	59-128			
Vinyl chloride	62	2.6	"	52.0		120	64-127			
Chloroethane	70	8.0	"	53.6		130	63-127			QL-1H
Trichlorofluoromethane (F11)	110	5.6	"	113		100	62-126			
1,1-Dichloroethene	83	4.0	"	80.8		103	61-133			
1,1,2-Trichlorotrifluoroethane (F113)	150	7.7	"	155		97.1	66-126			
Methylene chloride (Dichloromethane)	71	3.5	"	70.8		101	62-115			
trans-1,2-Dichloroethene	83	8.0	"	80.8		103	67-124			
1,1-Dichloroethane	90	4.1	"	82.4		109	68-126			
cis-1,2-Dichloroethene	82	4.0	"	80.0		103	70-121			
Chloroform	100	4.9	"	99.2		104	68-123			
1,1,1-Trichloroethane	110	5.5	"	111		101	68-125			
1,2-Dichloroethane (EDC)	91	4.1	"	82.4		111	65-128			

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Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EK23015 - TO-15

LCS (EK23015-BS1)

Prepared & Analyzed: 30-Nov-22

Benzene	62	3.2	ug/m3	64.8		96.3	69-119			
Carbon tetrachloride	130	6.4	"	128		99.1	68-132			
Trichloroethene	100	5.5	"	110		95.3	71-123			
Toluene	74	3.8	"	76.8		96.1	66-119			
1,1,2-Trichloroethane	110	5.5	"	111		95.2	73-119			
Tetrachloroethene	120	6.9	"	138		84.6	66-124			
1,1,1,2-Tetrachloroethane	110	7.0	"	140		79.7	67-129			
Ethylbenzene	70	4.4	"	88.4		79.0	70-124			
m,p-Xylene	67	8.8	"	88.4		76.3	61-134			
o-Xylene	76	4.4	"	88.4		86.5	67-125			
1,1,2,2-Tetrachloroethane	140	7.0	"	140		97.9	65-127			

Surrogate: 1,2-Dichloroethane-d4	256		"	214		120	76-134			
Surrogate: Toluene-d8	210		"	208		101	78-125			
Surrogate: 4-Bromofluorobenzene	322		"	363		88.7	77-127			

Batch EL20615 - TO-15

Blank (EL20615-BLK1)

Prepared & Analyzed: 06-Dec-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3							
Dichlorodifluoromethane (F12)	ND	5.0	"							
Chloromethane	ND	2.1	"							
Dichlorotetrafluoroethane (F114)	ND	7.1	"							
Vinyl chloride	ND	2.6	"							
Bromomethane	ND	16	"							
Chloroethane	ND	8.0	"							
Trichlorofluoromethane (F11)	ND	5.6	"							
1,1-Dichloroethene	ND	4.0	"							
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"							
Methylene chloride (Dichloromethane)	ND	3.5	"							
Carbon disulfide	ND	6.3	"							
trans-1,2-Dichloroethene	ND	8.0	"							
1,1-Dichloroethane	ND	4.1	"							
2-Butanone (MEK)	ND	30	"							

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EL20615 - TO-15

Blank (EL20615-BLK1)

Prepared & Analyzed: 06-Dec-22

cis-1,2-Dichloroethene	ND	4.0	ug/m3
Chloroform	ND	4.9	"
1,1,1-Trichloroethane	ND	5.5	"
1,2-Dichloroethane (EDC)	ND	4.1	"
Benzene	ND	3.2	"
Carbon tetrachloride	ND	6.4	"
Trichloroethene	ND	5.5	"
1,2-Dichloropropane	ND	9.4	"
Bromodichloromethane	ND	6.8	"
cis-1,3-Dichloropropene	ND	4.6	"
4-Methyl-2-pentanone (MIBK)	ND	8.3	"
trans-1,3-Dichloropropene	ND	4.6	"
Toluene	ND	3.8	"
1,1,2-Trichloroethane	ND	5.5	"
2-Hexanone (MBK)	ND	8.3	"
Dibromochloromethane	ND	8.6	"
Tetrachloroethene	ND	6.9	"
1,2-Dibromoethane (EDB)	ND	7.8	"
1,1,1,2-Tetrachloroethane	ND	7.0	"
Chlorobenzene	ND	4.7	"
Ethylbenzene	ND	4.4	"
m,p-Xylene	ND	8.8	"
Styrene	ND	4.3	"
o-Xylene	ND	4.4	"
Bromoform	ND	10	"
1,1,2,2-Tetrachloroethane	ND	7.0	"
4-Ethyltoluene	ND	5.0	"
1,3,5-Trimethylbenzene	ND	5.0	"
1,2,4-Trimethylbenzene	ND	5.0	"
1,3-Dichlorobenzene	ND	12	"
1,4-Dichlorobenzene	ND	12	"
1,2-Dichlorobenzene	ND	12	"
1,2,4-Trichlorobenzene	ND	38	"
Hexachlorobutadiene	ND	54	"

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EL20615 - TO-15

Blank (EL20615-BLK1)

Prepared & Analyzed: 06-Dec-22

Surrogate: 1,2-Dichloroethane-d4	204		ug/m3	214		95.3	76-134			
Surrogate: Toluene-d8	200		"	208		96.4	78-125			
Surrogate: 4-Bromofluorobenzene	371		"	363		102	77-127			

LCS (EL20615-BS1)

Prepared & Analyzed: 06-Dec-22

Dichlorodifluoromethane (F12)	100	5.0	ug/m3	101		99.6	59-128			
Vinyl chloride	55	2.6	"	52.0		105	64-127			
Chloroethane	53	8.0	"	53.6		98.7	63-127			
Trichlorofluoromethane (F11)	96	5.6	"	113		84.6	62-126			
1,1-Dichloroethene	78	4.0	"	80.8		96.6	61-133			
1,1,2-Trichlorotrifluoroethane (F113)	170	7.7	"	155		107	66-126			
Methylene chloride (Dichloromethane)	68	3.5	"	70.8		95.9	62-115			
trans-1,2-Dichloroethene	78	8.0	"	80.8		96.8	67-124			
1,1-Dichloroethane	80	4.1	"	82.4		97.0	68-126			
cis-1,2-Dichloroethene	79	4.0	"	80.0		98.8	70-121			
Chloroform	100	4.9	"	99.2		102	68-123			
1,1,1-Trichloroethane	110	5.5	"	111		99.5	68-125			
1,2-Dichloroethane (EDC)	82	4.1	"	82.4		99.6	65-128			
Benzene	64	3.2	"	64.8		98.1	69-119			
Carbon tetrachloride	130	6.4	"	128		101	68-132			
Trichloroethene	120	5.5	"	110		107	71-123			
Toluene	79	3.8	"	76.8		103	66-119			
1,1,2-Trichloroethane	120	5.5	"	111		107	73-119			
Tetrachloroethene	150	6.9	"	138		106	66-124			
1,1,1,2-Tetrachloroethane	140	7.0	"	140		103	67-129			
Ethylbenzene	89	4.4	"	88.4		101	70-124			
m,p-Xylene	98	8.8	"	88.4		111	61-134			
o-Xylene	91	4.4	"	88.4		103	67-125			
1,1,2,2-Tetrachloroethane	140	7.0	"	140		97.3	65-127			

Surrogate: 1,2-Dichloroethane-d4	206		"	214		96.7	76-134			
Surrogate: Toluene-d8	207		"	208		99.5	78-125			
Surrogate: 4-Bromofluorobenzene	364		"	363		100	77-127			

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EL20615 - TO-15

Batch EL20716 - TO-15

Blank (EL20716-BLK1)

Prepared & Analyzed: 07-Dec-22

1,1-Difluoroethane (LCC)	ND	5.5	ug/m3
Dichlorodifluoromethane (F12)	ND	5.0	"
Chloromethane	ND	2.1	"
Dichlorotetrafluoroethane (F114)	ND	7.1	"
Vinyl chloride	ND	2.6	"
Bromomethane	ND	16	"
Chloroethane	ND	8.0	"
Trichlorofluoromethane (F11)	ND	5.6	"
1,1-Dichloroethene	ND	4.0	"
1,1,2-Trichlorotrifluoroethane (F113)	ND	7.7	"
Methylene chloride (Dichloromethane)	ND	3.5	"
Carbon disulfide	ND	6.3	"
trans-1,2-Dichloroethene	ND	8.0	"
1,1-Dichloroethane	ND	4.1	"
2-Butanone (MEK)	ND	30	"
cis-1,2-Dichloroethene	ND	4.0	"
Chloroform	ND	4.9	"
1,1,1-Trichloroethane	ND	5.5	"
1,2-Dichloroethane (EDC)	ND	4.1	"
Benzene	ND	3.2	"
Carbon tetrachloride	ND	6.4	"
Trichloroethene	ND	5.5	"
1,2-Dichloropropane	ND	9.4	"
Bromodichloromethane	ND	6.8	"
cis-1,3-Dichloropropene	ND	4.6	"
4-Methyl-2-pentanone (MIBK)	ND	8.3	"
trans-1,3-Dichloropropene	ND	4.6	"
Toluene	ND	3.8	"
1,1,2-Trichloroethane	ND	5.5	"
2-Hexanone (MBK)	ND	8.3	"
Dibromochloromethane	ND	8.6	"
Tetrachloroethene	ND	6.9	"

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EL20716 - TO-15

Blank (EL20716-BLK1)

Prepared & Analyzed: 07-Dec-22

1,2-Dibromoethane (EDB)	ND	7.8	ug/m3							
1,1,1,2-Tetrachloroethane	ND	7.0	"							
Chlorobenzene	ND	4.7	"							
Ethylbenzene	ND	4.4	"							
m,p-Xylene	ND	8.8	"							
Styrene	ND	4.3	"							
o-Xylene	ND	4.4	"							
Bromoform	ND	10	"							
1,1,2,2-Tetrachloroethane	ND	7.0	"							
4-Ethyltoluene	ND	5.0	"							
1,3,5-Trimethylbenzene	ND	5.0	"							
1,2,4-Trimethylbenzene	ND	5.0	"							
1,3-Dichlorobenzene	ND	12	"							
1,4-Dichlorobenzene	ND	12	"							
1,2-Dichlorobenzene	ND	12	"							
1,2,4-Trichlorobenzene	ND	38	"							
Hexachlorobutadiene	ND	54	"							
<i>Surrogate: 1,2-Dichloroethane-d4</i>	<i>218</i>		<i>"</i>	<i>214</i>		<i>102</i>	<i>76-134</i>			
<i>Surrogate: Toluene-d8</i>	<i>216</i>		<i>"</i>	<i>208</i>		<i>104</i>	<i>78-125</i>			
<i>Surrogate: 4-Bromofluorobenzene</i>	<i>268</i>		<i>"</i>	<i>363</i>		<i>73.8</i>	<i>77-127</i>			<i>S-GC</i>

LCS (EL20716-BS1)

Prepared & Analyzed: 07-Dec-22

Dichlorodifluoromethane (F12)	120	5.0	ug/m3	101		114	59-128			
Vinyl chloride	60	2.6	"	52.0		116	64-127			
Chloroethane	57	8.0	"	53.6		106	63-127			
Trichlorofluoromethane (F11)	95	5.6	"	113		83.8	62-126			
1,1-Dichloroethene	83	4.0	"	80.8		102	61-133			
1,1,2-Trichlorotrifluoroethane (F113)	170	7.7	"	155		108	66-126			
Methylene chloride (Dichloromethane)	76	3.5	"	70.8		108	62-115			
trans-1,2-Dichloroethene	82	8.0	"	80.8		101	67-124			
1,1-Dichloroethane	87	4.1	"	82.4		106	68-126			
cis-1,2-Dichloroethene	81	4.0	"	80.0		102	70-121			
Chloroform	110	4.9	"	99.2		107	68-123			

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Volatile Organic Compounds by EPA TO-15 - Quality Control
H&P Mobile Geochemistry, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch EL20716 - TO-15

LCS (EL20716-BS1)

Prepared & Analyzed: 07-Dec-22

1,1,1-Trichloroethane	120	5.5	ug/m3	111		107	68-125			
1,2-Dichloroethane (EDC)	86	4.1	"	82.4		105	65-128			
Benzene	68	3.2	"	64.8		105	69-119			
Carbon tetrachloride	130	6.4	"	128		105	68-132			
Trichloroethene	120	5.5	"	110		112	71-123			
Toluene	80	3.8	"	76.8		104	66-119			
1,1,2-Trichloroethane	130	5.5	"	111		113	73-119			
Tetrachloroethene	150	6.9	"	138		111	66-124			
1,1,1,2-Tetrachloroethane	170	7.0	"	140		120	67-129			
Ethylbenzene	96	4.4	"	88.4		109	70-124			
m,p-Xylene	100	8.8	"	88.4		114	61-134			
o-Xylene	110	4.4	"	88.4		127	67-125			QL-1H
1,1,2,2-Tetrachloroethane	190	7.0	"	140		135	65-127			QL-1H
Surrogate: 1,2-Dichloroethane-d4	216		"	214		101	76-134			
Surrogate: Toluene-d8	207		"	208		99.6	78-125			
Surrogate: 4-Bromofluorobenzene	309		"	363		85.2	77-127			

GSI Environmental, Inc
7595 Irvine Center Dr, Ste 250
Irvine, CA 92618

Project: GSI111722-10
Project Number: 6239 / Riverside
Project Manager: Samantha Curtis

Reported:
08-Dec-22 14:54

Notes and Definitions

S-GC	Surrogate recovery outside of control limits. The data was accepted based on valid recovery of the remaining surrogate(s).
S-GC	Surrogate recovery outside of control limits. The data was accepted based on valid recovery of the remaining surrogate(s).
QL-1H	The LCS and/or LCSD recoveries fell above the established control specifications for this analyte. Any result for this compound is qualified and should be considered biased high.
QL-1H	The LCS and/or LCSD recoveries fell above the established control specifications for this analyte. Any result for this compound is qualified and should be considered biased high.
LCC	Leak Check Compound
ND	Analyte NOT DETECTED at or above the reporting limit
MDL	Method Detection Limit
%REC	Percent Recovery
RPD	Relative Percent Difference

All soil results are reported in wet weight.

Appendix

H&P Mobile Geochemistry, Inc. is approved as an Environmental Testing Laboratory and Mobile Laboratory in accordance with the DoD-ELAP Program and ISO/IEC 17025:2005 programs through PJLA, accreditation number 69070 for EPA Method TO-15, EPA Method 8260B and H&P 8260SV.

H&P is approved by the State of California as an Environmental Laboratory and Mobile Laboratory in conformance with the Environmental Laboratory Accreditation Program (ELAP) for the category of Volatile and Semi-Volatile Organic Chemistry of Hazardous Waste, certification numbers 2740, 2741, 2743 & 2745.

H&P is approved by the State of Louisiana Department of Environmental Quality under the National Environmental Laboratory Accreditation Conference (NELAC) certification number 04138

The complete list of stationary and mobile laboratory certifications along with the fields of testing (FOTs) and analyte lists are available at www.handpimg.com/about/certifications.

Lab Client and Project Information	
Lab Client/Consultant: <u>GSI</u>	Project Name / #: <u>6239</u>
Lab Client Project Manager: <u>Samantha Curtis</u>	Project Location: <u>2993 6th St Riverside</u>
Lab Client Address: <u>7595 Irvine Center Dr Suite 250</u>	Report E-Mail(s): <u>scurtis@gsi-net.com</u>
Lab Client City, State, Zip: <u>Irvine CA 92618</u>	<u>KRbrochacki</u>
Phone Number: <u>949-892-5239</u>	
Reporting Requirements	Turnaround Time
☒ Standard Report ☐ Level III ☐ Level IV ☒ Excel EDD ☐ Other EDD: _____ ☐ CA Geotracker Global ID: _____	☒ Standard (7 days for preliminary report, 10 days for final report) ☐ Rush (specify): _____
Sampler Information Sampler(s): <u>Mike Hembert</u> Signature: <u>[Signature]</u> Date: <u>11-16-22</u>	

Sample Receipt (Lab Use Only)	
Date Rec'd: <u>11/17</u>	Control #: <u>280726.02</u>
H&P Project #: <u>GSI111722-10</u>	
Lab Work Order #: <u>E211049</u>	
Sample In tact: ☒ Yes ☐ No ☐ See Notes Below	
Receipt Gauge ID: <u>60206</u>	Temp: <u>RT</u>
Outside Lab:	
Receipt Notes/Tracking #: _____	
Lab PM Initials: <u>VB</u>	

Additional Instructions to Laboratory:

* Preferred VOC units (please choose one):

☒ $\mu\text{g/L}$ ☒ $\mu\text{g}/\text{m}^3$ ☐ ppbv ☐ ppmv

SAMPLE NAME	FIELD POINT NAME (if applicable)	DATE mm/dd/yy	TIME 24hr clock	SAMPLE TYPE Indoor Air (IA), Ambient Air (AA), Subslab (SS), Soil Vapor (SV)	CONTAINER SIZE & TYPE 400mL/1L/6L Summa, Tedlar, Tube, etc.	CONTAINER ID (#)	Lab use only: Receipt Vac	VOCs Standard Full List ☒ 8260SV ☐ TO-15	VOCs Short List/ Project List ☐ 8260SV ☐ TO-15	Oxygenates ☐ 8260SV ☐ TO-15	Naphthalene ☐ 8260SV ☐ TO-15	TPHv as Gas ☐ 8260SVm ☐ TO-15	Aromatic/Aliphatic Fractions ☐ 8260SVm ☐ TO-15	Leak Check Compound ☒ DFA ☐ IPA ☐ He	Methane by EPA 8015m	Fixed Gases by ASTM D1945 ☐ CO2 ☐ O2 ☐ N2
VP-1-30		11-16-22	826	SV	400 mL	150	-0.23	X						X		
VP-1-15			825	SV		156	-0.13	X						X		
VP-1-5			849	SV		156	-0.73	X						X		
AA			856	AA		229	-0.78	X						X		
VP-9-30			922	SV		136	-0.20	X						X		
VP-9-15			921	SV		148	-2.19	X						X		
VP-9-5			937	SV		135	-0.55	X						X		
VP-2-15			1006	SV		107	-0.39	X						X		
VP-2-5			1005	SV		234	-1.42	X						X		
VP-3-15			1051	SV		006	-1.35	X						X		

Approved/Relinquished by: <u>[Signature]</u>	Company: <u>GSI</u>	Date: <u>11/16/2022</u>	Time: <u>14:00</u>
Approved/Relinquished by: _____	Company: _____	Date: _____	Time: _____
Approved/Relinquished by: _____	Company: _____	Date: _____	Time: _____

VAPOR / AIR Chain of Custody

DATE: 11-16-22
Page 2 of 2

Lab Client and Project Information	
Lab Client/Consultant: <u>GSI</u>	Project Name / #: <u>6239</u>
Lab Client Project Manager: <u>Samantha Curtis</u>	Project Location: <u>2993 6th St Riverside</u>
Lab Client Address: <u>7595 Irvine Center Dr Suite 2500</u>	Report E-Mail(s): <u>swats@gsi-net.com</u>
Lab Client City, State, Zip: <u>Irvine CA 92618</u>	<u>KKbrockacki</u>
Phone Number: <u>949-892-5239</u>	

Reporting Requirements	Turnaround Time	Sampler Information
☒ Standard Report ☐ Level III ☐ Level IV ☒ Excel EDD ☐ Other EDD: _____ ☐ CA Geotracker Global ID: _____	☒ Standard (7 days for preliminary report, 10 days for final report) ☐ Rush (specify): _____	Sampler(s): <u>Mike Pontford</u> Signature: <u>[Signature]</u> Date: <u>11-16-22</u>

Sample Receipt (Lab Use Only)	
Date Rec'd: <u>11/17</u>	Control #: <u>2208602</u>
H&P Project #: <u>GSI11722-10</u>	
Lab Work Order #: <u>E211049</u>	
Sample Intact: ☒ Yes ☐ No ☐ See Notes Below	
Receipt Gauge ID: <u>60206</u>	Temp: <u>RT</u>
Outside Lab:	
Receipt Notes/Tracking #:	
Lab PM Initials: <u>VB</u>	

Additional Instructions to Laboratory:

* Preferred VOC units (please choose one):

☒ $\mu\text{g/L}$ ☒ $\mu\text{g}/\text{m}^3$ ☐ ppbv ☐ ppmv

SAMPLE NAME	FIELD POINT NAME (if applicable)	DATE mm/dd/yy	TIME 24hr clock	SAMPLE TYPE Indoor Air (IA), Ambient Air (AA), Subslab (SS), Soil Vapor (SV)	CONTAINER SIZE & TYPE 400mL/1L/6L Summa, Tedlar, Tube, etc.	CONTAINER ID (#)	Lab use only: Receipt Vac	VOCs Standard Full List ☐ 8260SV ☒ TO-15	VOCs Short List / Project List ☐ 8260SV ☐ TO-15	Oxygenates ☐ 8260SV ☐ TO-15	Naphthalene ☐ 8260SV ☐ TO-15	TPHv as Gas ☐ 8260SVm ☐ TO-15m	Aromatic/Aliphatic Fractions ☐ 8260SVm ☐ TO-15m	Leak Check Compound ☒ DFA ☐ IPA ☐ He	Methane by EPA 8015m	Fixed Gases by ASTM D1945 ☐ CO2 ☐ O2 ☐ N2
VP-3-5		11-16-22	0800	SV	400mL	106	-0.90	X						X		
VP-11-15			1124			052	-1.25	X						X		
VP-11-5			1123			071	-0.93	X						X		
VP-6-15			1159			086	-0.66	X						X		
VP-10-5			1158			050	-0.88	X						X		
VP-17-15			1230			072	-1.68	X						X		
VP-17-5			1229			007	-0.73	X						X		
VP-17-15 Rep			1235			081	-0.95	X						X		
VP-18-15			1302			074	-1.91	X						X		
VP-18-5			1300			010	-1.08	X						X		

Approved/Relinquished by: <u>[Signature]</u>	Company: <u>GSI</u>	Date: <u>11/16/22</u>	Time: <u>14:00</u>
Approved/Relinquished by: <u>[Signature]</u>	Company: <u>H&P</u>	Date: <u>11-16-22</u>	Time: <u>14:00</u>
Approved/Relinquished by: _____	Company: _____	Date: _____	Time: _____

Lab Client and Project Information	
Lab Client/Consultant: <u>GSI</u>	Project Name / #: <u>6239</u>
Lab Client Project Manager: <u>Samantha Curtis</u>	Project Location: <u>2993 6th St Riverside</u>
Lab Client Address: <u>7695 Irvine Center Dr Suite 250</u>	Report E-Mail(s): <u>swatts@gsi-net.com</u>
Lab Client City, State, Zip: <u>Irvine CA 92616</u>	<u>KK Grochowski</u>
Phone Number: <u>949-892-5239</u>	
Reporting Requirements	
☒ Standard Report ☐ Level III ☐ Level IV	Turnaround Time
☒ Excel EDD ☐ Other EDD: _____	
☐ CA Geotracker Global ID: _____	
Sampler Information	
Sampler(s): <u>Mike Horford</u>	Date: <u>11-17-22</u>
Signature: <u>[Signature]</u>	

Sample Receipt (Lab Use Only)	
Date Rec'd: <u>11/18</u>	Control #: <u>22072602</u>
H&P Project #: <u>GSI111722-10</u>	
Lab Work Order #: <u>E21050</u>	
Sample Intact: ☒ Yes ☐ No ☐ See Notes Below	
Receipt Gauge ID: <u>60206</u>	Temp: <u>12</u>
Outside Lab:	
Receipt Notes/Tracking #:	
Lab PM Initials: <u>MB</u>	

Additional Instructions to Laboratory:

* Preferred VOC units (please choose one):

☒ µg/L ☒ µg/m³ ☐ ppbv ☐ ppmv

SAMPLE NAME	FIELD POINT NAME (if applicable)	DATE mm/dd/yy	TIME 24hr clock	SAMPLE TYPE Indoor Air (IA), Ambient Air (AA), Subslab (SS), Soil Vapor (SV)	CONTAINER SIZE & TYPE 400mL/1L/6L Summa, Tedlar, Tube, etc.	CONTAINER ID (###)	Lab use only: Receipt Vac	VOCs Standard Full List TO-15	VOCs Short List/ Project List TO-15	Oxygenates TO-15	Naphthalene TO-15	TPH as Gas TO-15	Aromatic/Aliphatic Fractions TO-15	Leak Check Compound DFA IPA He	Methane by EPA 8015m	Fixed Gases by ASTM D1945 CO2 O2 N2
VP-19-30		11-17-22	738	SV	400 mL	211	-0.22	X						X		
VP-19-15			737			205	-0.48	X						X		
VP-19-5			752			220	-0.53	X						X		
VP-20-30			827			471	-0.11	X						X		
VP-20-30 Rep			831			267	-0.18	X						X		
VP-20-15			826			192	-0.23	X						X		
VP-20-5			945			213	-0.19	X						X		
VP-12-15			918			223	-1.02	X						X		
VP-12-5			934			264	-2.21	X						X		
VP-12-30			919			241	-1.00	X						X		

Approved/Relinquished by: <u>[Signature]</u>	Company: <u>GSI</u>	Date: <u>11/17/22</u>	Time: <u>1445</u>	Received by: <u>[Signature]</u>	Company: <u>HSP</u>	Date: <u>11-17-22</u>	Time: <u>1445</u>
Approved/Relinquished by:	Company:	Date:	Time:	Received by:	Company:	Date:	Time:
Approved/Relinquished by:	Company:	Date:	Time:	Received by:	Company:	Date:	Time:

Lab Client and Project Information			
Lab Client/Consultant:	GS1	Project Name / #:	6239
Lab Client Project Manager:	Samantha Curtis	Project Location:	2943 6th St Riverside
Lab Client Address:	7545 Irvine Center Dr Suite 250	Report E-Mail(s):	scutts@gsi-net.com " " kbrochock, " "
Lab Client City, State, Zip:	Irvine CA 92613		
Phone Number:	949 - 892-5239		
Reporting Requirements		Turnaround Time	
☒ Standard Report ☐ Level III ☐ Level IV ☒ Excel EDD ☐ Other EDD: _____ ☐ CA Geotracker Global ID: _____	☒ Standard (7 days for preliminary report, 10 days for final report) ☐ Rush (specify): _____	Sampler Information Sampler(s): Mike Hentford Signature:  Date: 11-17-22	

Sample Receipt (Lab Use Only)	
Date Rec'd: 11/18	Control #: 2207602
H&P Project # GSI111722-10	
Lab Work Order # E211050	
Sample Intact: ☒ Yes ☐ No ☐ See Notes Below	
Receipt Gauge ID: 60206	Temp: RT
Outside Lab:	
Receipt Notes/Tracking #:	

Lab PM Initials: KB

Additional Instructions to Laboratory:

* Preferred VOC units (please choose one):

☒ $\mu\text{g/L}$ ☐ $\mu\text{g/m}^3$ ☐ ppmv ☐ ppbv

Additional Instructions to Laboratory:									
* Preferred VOC units (please choose one): ☒ µg/L ☐ µg/m ³ ☐ ppbv ☐ ppmv									
SAMPLE NAME	FIELD POINT NAME (if applicable)	DATE mm/dd/yy	TIME 24hr clock	SAMPLE TYPE Indoor Air (IA), Ambient Air (AA), Subslab (SS), Soil Vapor (SV)	CONTAINER SIZE & TYPE 400mL/1L/6L Summa, Tedlar, Tube, etc.	CONTAINER ID (###)	Lab use only: Receipt Vac	VOCs Standard Full List ☐ 8260SV ☒ TO-15 VOCs Short List / Project List ☐ 8260SV ☐ TO-15 Oxygenates ☐ 8260SV ☐ TO-15 Naphthalene ☐ 8260SV ☐ TO-15 TPHv as Gas ☐ 8260SVm ☐ TO-15m Aromatic/Aliphatic Fractions ☐ 8260SVm ☐ TO-15m Leak Check Compound ☒ DFA ☐ IPA ☐ He Methane by EPA 8015m Fixed Gases by ASTM D1945 ☐ CO2 ☐ O2 ☐ N2	
VP-13-15		11-17-22	956	SV	400 ml	790	-1.05	X	
VP-13-5			955			789	-1.41	X	
VP-14-22			1101			792	-1.54	X	
VP-14-15			1103			755	-1.93	X	
VP-14-5			1148			773	-1.55	X	
VP-4-15			1142			786	-1.60	X	
VP-4-5			1148			742	-1.98	X	
VP-5-5			1213			763	-2.78	X	
VP-5-5			1209			773	-2.63	X	
VP-7-5			1231			741	-2.51	X	

Approved/Reinquished by:	<i>John Smith</i>	Date:	11/17/22	Time:	1445	Received by:	<i>Mike</i>	Company:	43P	Date:	11-17-22	Time:	1445
Approved/Reinquished by:		Date:		Time:		Received by:		Company:		Date:		Time:	
Approved/Reinquished by:		Date:		Time:		Received by:		Company:		Date:		Time:	

VAPOR / AIR Chain of Custody

DATE: 11-17-22
Page 3 of 3

Lab Client and Project Information			
Lab Client/Consultant:	651	Project Name / #:	6239
Lab Client Project Manager:	Samantha Curtis	Project Location:	2943 6th St Riverside
Lab Client Address:	7595 Irvine Center Dr, Suite 250	Report E-Mail(s):	scutts@gsi-net.com
Lab Client City, State, Zip:	Irvine CA 92618		"
Phone Number:	949-442-5239		kkbrochocki
Reporting Requirements		Turnaround Time	
☒ Standard Report	☐ Level III ☐ Level IV	☒ Standard (7 days for preliminary report, 10 days for final report)	Sampler Information Sampler(s): Mike Hemford Signature: <i>[Signature]</i> Date: 11-17-22
☒ Excel EDD	☐ Other EDD:	☐ Rush (specify):	
☐ CA Geotracker Global ID:			

Sample Receipt (Lab Use Only)			
Date Rec'd:	11/18	Control #:	220726.02
H&P Project #	GSF 111722-10	Lab Work Order #	F211050
Sample Inlet:	☒ Yes ☐ No	See Notes Below	
Receipt Gauge ID:	60206	Temp:	25
Outside Lab:			
Receipt Notes/Tracking #:			
Lab PM Initials: VB			

Additional Instructions to Laboratory:

* Preferred VOC units (please choose one):

☒ µg/L ☒ µg/m³ ☐ ppbv ☐ ppmv

SAMPLE NAME	FIELD POINT NAME (if applicable)	DATE mm/dd/yy	TIME 24hr clock	SAMPLE TYPE Indoor Air (IA), Ambient Air (AA), Subslab (SS), Soil Vapor (SV)	CONTAINER SIZE & TYPE 400ml/1L/6L Summa, Tedlar, Tube, etc.	CONTAINER ID (##)	Lab use only: Receipt Vac	VOCs Standard Full List ☒ TO-15	VOCs Short List / Project List ☐ 8260SV ☐ TO-15	Oxygenates ☐ 8260SV ☐ TO-15	Naphthalene ☐ 8260SV ☐ TO-15	TPHV as Gas ☐ 8260SVm ☐ TO-15m	Aromatic/Aliphatic Fractions ☐ 8260SVm ☐ TO-15m	Leak Check Compound ☒ DFA ☐ IPA ☐ He	Methane by EPA 8015m	Fixed Gases by ASTM D1945 ☐ CO2 ☐ O2 ☐ N2
VP-7-B		11-17-22	1232	SV	400 ml	784	1.84	X						X		
VP-6-13			1254			734	2.33	X						X		
VP-6-5			1252			740	3.10	X						X		
VP-6-15			1319			735	1.36	X						X		
VP-6-5			1320			738	2.19	X						X		
VP-8-15			1345			619	1.91	X						X		
VP-8-5			1344			730	1.21	X						X		
VP-15-5			1403			623	2.42	X						X		
VP-21-15			1023			787	1.60	X						X		
VP-21-5			1035			786	1.21	X						X		

Approved/Relinquished by:	<i>[Signature]</i>	Company:	GS1	Date:	11/17/22	Time:	1445
Approved/Relinquished by:		Company:		Date:		Time:	
Approved/Relinquished by:		Company:		Date:		Time:	

Log Sheet: Soil Vapor Sampling with Summa

H&P Project #: 65111622-Tech
Date: 11-16-22
Site Address: 2943 6th Street Riverside
Page: 1 of 2
Consultant: CS1
H&P Rep(s): Mike Henderson
Reviewed: DB
Scanned:

Equipment Info
Inline Gauge ID#: 0078040
Pump ID#: 0078040

Purge Volume Information
PV Amount: 3PV PV Includes: ☒ Tubing
☒ Sand 40%
☒ Dry Bent 50%

Leak Check Compound
☒ 1,1-DFA
☐ 1,1,1,2-TFA
☐ IPA
☐ Other:
A cloth saturated with LCC is placed around tubing connections and probe seal. This is done for all samples unless otherwise noted.

Sample and Summa Information							Probe Specs					Purge & Collection Information								
Point ID	Summa ID #	Sample Kit ID #	Start Time	Initial Vac (" Hg)	End / Sample Time	End Vac (" Hg)	Probe Depth (ft)	Tubing Length (ft)	Tubing OD (in.)	Sand Ht (in.)	Sand Dia (in.)	Dry Bent. Ht (in.)	Dry Bent. Dia (in.)	Shut In Test 60 sec (✓)	Leak Check (✓)	Purge Vol (mL)	Purge Flow Rate (mL/min)	Pump Time (min:sec)	Sample Flow Rate (mL/min)	ProbeVac ☐ Hg ☒ H ₂ O
1 VP-1-30	150	132	823	-30 ⁺	826	0	30	31.5	1/4	12	2.25	6	2.25	✓	✓	2233	200	10:10	1200	-10
2 VP-1-15	158	086	822	-29	825	0	15	16.25	1/4	12	2.25	6	2.25	✓	✓	1778	200	8:54	1200	-20
3 VP-1-5	156	013	844	-30 ⁺	849	0	5	6	1/4	12	2.25	6	2.25	✓	✓	1607	200	8:03	1200	-5
4 AA	224	275	853	-26	856	0	-	-	-	-	-	-	-	-	-	-	-	-	1200	0
5 VP-4-30	136	235	918	-29	922	0	30	31.5	1/4	12	2.25	6	2.25	✓	✓	2033	200	10:10	1200	-10
6 VP-4-15	148	346	917	-27	921	0	15	16.25	1/4	12	2.25	6	2.25	✓	✓	1778	200	8:54	1200	-15
7 VP-4-5	135	016	854	-26	857	0	5	6	1/4	12	2.25	6	2.25	✓	✓	1607	200	9:03	1200	-20
8 VP-2-15	107	379	1003	-26	1006	0	15	16.25	1/4	12	2.25	6	2.25	✓	✓	1778	200	8:54	1200	-10
9 VP-2-5	234	374	1002	-27	1005	0	5	6	1/4	12	2.25	6	2.25	✓	✓	1607	200	8:03	1200	-15
10 VP-3-15	006	007	1048	-30 ⁺	1051	0	15	16.25	1/4	12	2.25	6	2.25	✓	✓	1778	200	8:54	1200	-10
11 VP-3-5	106	380	1047	-26	1050	0	5	6	1/4	12	2.25	6	2.25	✓	✓	1607	200	9:03	1200	-10
12 VP-11-15	052	051	1121	-30 ⁺	1124	0	15	16.25	1/4	12	2.25	6	2.25	✓	✓	1778	200	8:54	1200	-15

Site Notes such as weather, visitors, scope deviations, health & safety issues, etc. (When making sample specific notes, reference the line number above):

Color Coded Probes
Yellow - 9-11-16-22
Blue - 11-16-22
Red - 11-16-22