AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-3D

Site Name, Location: Ciudad Cristiana

Personnel: N Rivera / H. Royer / R. Stuart

Equipment Used: dedicated tubing / cord / bladder decontaminated pump

Date: Dec 1, 2016

Monitoring Well Information:

Diameter/Material:	2 / PVC
Depth to Bottom (ft from TOC):	28.18)
Top of Screen (ft from TOC):	17.88
Bottom of Screen (ft from TOC):	27.88
Pump Intake Level (ft from TOC):	~23
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	1.45 / 1055
Measured DTB (ft from TOC)/Time:	(28.18) /
Headspace Reading (ppm):	5.5
Time @ Start Purging:	1115
Time @ Stop Purging:	1149
Time @ Stop Sampling:	1215
Purge Volume (gallons):	2.0

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11.04	1.74							
11:15	START							
11:24	1.76	28.69	600	3.52	7.72	157.5	2.13	200
1129	1.74	28.44	591	1.04	7.34	-5.6	1.94	200
1134	1.75	28.38	588	0.69	7.30	-25.2	1.32	200
1139	1.76	28.28	586	0.56	7.28	-35.1	2.24	200
1144	1.76	28.44	585	0.50	7.27	-41.4	2.14	200
1149	1.76	28.37	583	0.44	7.26	-43.5	2.37	200
			Ready to Sample					

Comments:

Sample Time: 1215 DUP / MS / MSD /

Water Quality/Appearance: clear

Sample Analysis: ALL below DUP / MS / MSD /

Additional Comments: VOC, VPH, SVOC, SVOC SIM, EPH, Pesticides

FB120116 @ 12:05

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-4D

Site Name, Location: Ciudad Cristiana

Personnel: N. Rivera, R. Stuart, H. Royer

Equipment Used: dedicated tubing/cord/bladder decontaminated pump

Date: 12/1/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 26.00
Top of Screen (ft from TOC): 15.70
Bottom of Screen (ft from TOC): 25.70
Pump Intake Level (ft from TOC): ~20
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 2.90 / 13:39
Measured DTB (ft from TOC)/Time: (26.00) /
Headspace Reading (ppm): 2.8
Time @ Start Purging: 14:00
Time @ Stop Purging: 15:03
Time @ Stop Sampling: 15:45
Purge Volume (gallons): 2.28

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
13:55	2.86							
14:07	2.98	31.49	632	1.97	7.57	-67.7	32.9	100
14:12	3.02	31.27	626	0.89	7.43	-72.9	60.1	100
14:17	3.02	31.20	621	0.64	7.41	-76.9	54.5	100
14:22	3.02	31.13	620	0.51	7.40	-73.9	47.3	100
14:27	3.03	31.00	618	0.52	7.39	-86.0	48.8	100
14:32	3.03	30.95	617	0.44	7.39	-84.7	40.2	100
14:37	3.03	30.95	616	0.43	7.39	-84.9	36.1	100
14:43	3.03	31.02	615	0.38	7.39	-69.9	35.4	100
14:48	3.03	30.98	615	0.38	7.39	-67.5	29.5	100
14:53	3.03	30.80	614	0.34	7.39	-65.0	27.5	100
14:59	3.03	30.63	613	0.34	7.39	-68.2	25.3	100
15:03	3.03	30.69	612	0.32	7.39	-71.4	26.6	100
			Ready to Sample					

Comments:

Sample Time: 15:24 DUP 15:45 MS / MSD / Water Quality/Appearance: turbid

Sample Analysis: see below DUP see below MS / MSD /

Additional Comments: VOC, VPH, SVOC, SVOC, SIM, EPH, Pest

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-2S

Site Name, Location: Cristiana Ciudad

Personnel: N. Rivera H. Rager

Equipment Used: dedicated bladder, tubing, cord. Decontaminated pump

Date: 12/2/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 18.57
Top of Screen (ft from TOC): 8.27
Bottom of Screen (ft from TOC): 18.27
Pump Intake Level (ft from TOC): ~13
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 2.34 / 13:21
Measured DTB (ft from TOC)/Time: (18.57) /
Headspace Reading (ppm): 3.4
Time @ Start Purging: 14:20
Time @ Stop Purging: 14:37
Time @ Stop Sampling: 15:35
Purge Volume (gallons): 3.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1415	2.34							
14:22	2.34	29.19	784	0.88	7.33	-72.3	8.43	225
14:27	2.33	28.91	784	0.37	7.32	-80.6	2.65	200 flow ↓
14:32	2.33	28.94	784	0.29	7.32	-82.7	2.38	200
14:37	2.34	28.96	783	0.27	7.32	-76.9	1.76	200

Ready to Sample

Comments:

Sample Time: 1535 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: VOC, VPH, SVOC, SVOC SIM, EPH, PEST
GeoChem 1535

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-2D

Site Name, Location: Ciudad Cristiana Humacao, PR **Personnel:** N. Rivera / H. Rojas

Equipment Used: dedicated bladder, tubing, cord, decontaminated bladder pump. **Date:** Dec 2, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 28.18
Top of Screen (ft from TOC): 17.88
Bottom of Screen (ft from TOC): 27.88
Pump Intake Level (ft from TOC): ~ 22
Desired Pumping Rate (Lpm): 0.1-0.5

Well Purging Information:

Measured DTW (ft from TOC)/Time: 2.02 / 1050
Measured DTB (ft from TOC)/Time: (28.18) /
Headspace Reading (ppm): 0.5
Time @ Start Purging: 11:12am
Time @ Stop Purging: 11:34am
Time @ Stop Sampling: 12:58
Purge Volume (gallons): 2.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1053	2.02	After	installing	the	pump			
11:12	2.07	29.63	743	1.83	7.40	-67.9	3.51	150
11:17	2.07	29.18	739	1.01	7.34	-74.6	1.82	200
11:23	2.07	29.02	737	0.62	7.34	-75.6	1.04	200
11:29	2.07	29.04	736	0.47	7.34	-80.5	0.94	200
11:34	2.07	28.96	736	0.48	7.34	-81.7	0.78	175
	Ready	to	Sample					

Comments:
Sample Time: 12:10 DUP / MS 12:30 MSD 12:58 Water Quality/Appearance: clear
Sample Analysis: see below DUP / MS see below MSD see below

Additional Comments: VOC, VPH, SVOC, SVOC SIM, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-1S

Site Name, Location: BMS PR-3

Personnel: J. Del Valle / R. Stuart

Equipment Used: YSI 650 MDS

Date: December 2, 2016

dedicated bladder, tubing/cord Decontaminated pump

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	16.50
Top of Screen (ft from TOC):	6.20
Bottom of Screen (ft from TOC):	16.20
Pump Intake Level (ft from TOC):	~11
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	2.98 / 1048
Measured DTB (ft from TOC)/Time:	(16.50) /
Headspace Reading (ppm):	10.1
Time @ Start Purging:	1111
Time @ Stop Purging:	1139
Time @ Stop Sampling:	1218
Purge Volume (gallons):	3.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1110	2.93		START					
1112	2.96	30.63	1,237	2.24	6.82	-60.4	18.5	200
1117	2.94	30.45	1,238	1.13	6.96	-68.2	-4.0	350
1122	2.90	30.45	1,238	0.66	6.99	-72.7	-7.3	300
1127	2.94	30.53	1,237	0.53	7.01	-72.7	-8.2	300
1132	2.93	30.43	1,236	0.42	7.01	-69.5	-8.5	300
1139			Ready to sample					

Comments:

Sample Time: 1218 DUP / MS / MSD / Water Quality/Appearance: Clear

Sample Analysis: see below DUP / MS / MSD /

Additional Comments: Fumes of the canal next to the well point was felt during sampling.

VOC, VPH, SCVOC, SVOC SIM, EPH, PEST + Geo Chem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-1D

Site Name, Location: BMS PR-3

Personnel: J. Del Valle / R. Ahuar

Equipment Used: YSI 650 MDS decontaminated pump dedicated pumps + tubbing

Date: December 2, 2016.

Monitoring Well Information: bladder

Well Purging Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	21.38
Top of Screen (ft from TOC):	16.08
Bottom of Screen (ft from TOC):	21.08
Pump Intake Level (ft from TOC):	~18
Desired Pumping Rate (Lpm):	0.1-0.4

Measured DTW (ft from TOC)/Time:	2.40 / 1248
Measured DTB (ft from TOC)/Time:	(21.38) /
Headspace Reading (ppm):	2.8 —
Time @ Start Purging:	1309
Time @ Stop Purging:	1330
Time @ Stop Sampling:	1355
Purge Volume (gallons):	1.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1300	2.50		Start					
1310	2.57	31.04	1,261	2.78	7.24	-84.9	-0.7	100
1315	2.57	30.70	1,277	0.92	7.10	-87.2	-1.9	100
1320	2.57	30.61	1,285	0.70	7.10	-86.4	-4.2	200
1325	2.56	30.52	1,287	0.66	7.11	-86.9	-5.3	200
1330	2.55	30.63	1,283	0.60	7.12	-87.9	-6.3	200
			Ready for sampling					

Comments:

Sample Time: 1355 DUP — MS — MSD — Water Quality/Appearance: clear

Sample Analysis: See below DUP — MS — MSD —

Additional Comments: VOC, VPH, SVOC, SVOC SIM, EPH, Pest

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-5S

Site Name, Location: BMS Graded Cristiana

Personnel: R. Stuart, H. Royer, N. Rivera

Equipment Used: Dedicated ~~pump~~ bladder + tubbing + cord decontaminated pump

Date: 12/5/16

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	13.18
Top of Screen (ft from TOC):	7.88
Bottom of Screen (ft from TOC):	12.88
Pump Intake Level (ft from TOC):	~~10~~ 11
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	3.34 / 12:46pm
Measured DTB (ft from TOC)/Time:	(13.18) /
Headspace Reading (ppm):	3.7
Time @ Start Purging:	15:28
Time @ Stop Purging:	16.03
Time @ Stop Sampling:	16:38
Purge Volume (gallons):	3

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1509	3.31							
15:28	3.40	33.12	637	1.24	6.96	-42.9	172.4	400
15:33		33.11	649	0.63	6.82	-46.0	154.3	300 flow↓
15:38		33.03	650	0.41	6.77	-53.3	44.6	400
15:43	3.42	32.78	641	0.37	6.77	-52.7	16.2	200 flow↓
15:48	3.38	32.77	636	0.32	6.77	-52.2	10.5	200
15:53	3.36	32.66	634	0.29	6.76	-51.3	7.3	200
15:58	3.36	32.88	633	0.27	6.77	-51.9	4.9	200
16.03	3.37	32.92	631	0.26	6.77	-51.4	2.5	200
~~16:38~~								
		Ready to Sample						

Comments:

Sample Time: 16:38 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, VPH, SVOC, EPH, Pest + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: 08MW-5D

Site Name, Location: BMS Guided Cristiana

Personnel: H. Royer, N. Rivera, R. Sh

Equipment Used: Dedicated pump + tubbing + cord decontaminated pump

Date: 12/5/16

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	25.23
Top of Screen (ft from TOC):	14.93
Bottom of Screen (ft from TOC):	24.93
Pump Intake Level (ft from TOC):	~20
Desired Pumping Rate (Lpm):	0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	2.86 / 1446
Measured DTB (ft from TOC)/Time:	(25.23) /
Headspace Reading (ppm):	0.2
Time @ Start Purging:	1527
Time @ Stop Purging:	1555
Time @ Stop Sampling:	1628
Purge Volume (gallons):	2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1520	2.82	After inst						
1527	START							
1535	2.89	31.79	577	0.77	7.10	-56.0	29.9	200
1540	2.92	31.89	576	0.83	7.09	-45.3	14.9	150
1545	2.92	31.81	577	0.70	7.08	-46.0	6.36	175
1550	2.92	31.64	576	0.56	7.08	-50.7	4.13	175
1555	2.92	31.67	576	0.55	7.07	-48.9	3.21	175
1600								
			Ready to sample					

Comments:

Sample Time: 1628 DUP / MS / MSD / Water Quality/Appearance: Clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: VOC, SVOC, SVOC SIM, PEST, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW.65

Site Name, Location: Ciudad Cristiana

Personnel: N. Rivera / R. Stuart / H. Ro Roger

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 5, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 15.15
Top of Screen (ft from TOC): 4.85
Bottom of Screen (ft from TOC): 14.85
Pump Intake Level (ft from TOC): ~10
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.84 / 1112
Measured DTB (ft from TOC)/Time: (15.15) /
Headspace Reading (ppm): ~~1144~~ m2
Time @ Start Purging: 1144
Time @ Stop Purging: 1225
Time @ Stop Sampling: 1228
Purge Volume (gallons): 3.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1135	4.79	After installing pump / hosing						
1148	start							
1146	5.12	32.61	1597	0.47	6.80	-38.5	50.8	500 ↓
1151	5.11	32.57	1545	0.41	6.79	-43.5	29.4	400 ↓
1156	5.10	32.45	1412	0.37	6.80	-51.9	9.8	300 ↓
1201	4.97	32.20	1322	0.41	6.79	-46.3	0.1	150 ↑
1206	5.00	32.24	1323	0.41	6.81	-50.6	1.8	200
1211	5.01	32.32	1278	0.38	6.79	-48.8	0.7	200
1216	5.01	32.26	1276	0.34	6.80	-48.4	-1.2	200
1221	5.01	32.24	1267	0.34	6.77	-48.1	-1.6	200
			Ready to sample					

Comments:

Sample Time: 1258 DUP / MS / MSD / Water Quality/Appearance: Clear

Sample Analysis: All below DUP / MS / MSD /

Additional Comments: VOC, VPH, SVOC, SVOC SIM, EPA, PEST + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-6D

Site Name, Location: Ciudad Cristiana Humacao, PR

Personnel: N. Rivera, R. Stuart, H. Royer

Equipment Used: dedicated tubing, string, & dedicated bladder; decontaminated pump

Date: 12/5/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 24.18
Top of Screen (ft from TOC): 13.88
Bottom of Screen (ft from TOC): 23.88
Pump Intake Level (ft from TOC): ~18
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.47 / 1110
Measured DTB (ft from TOC)/Time: (24.18) /
Headspace Reading (ppm): 0.6
Time @ Start Purging: 11:40
Time @ Stop Purging: 12:21
Time @ Stop Sampling: 12:39
Purge Volume (gallons): 4

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1136	4.36	After installing pump/tubing						
1146	4.80	31.58	732	1.53	7.32	-22.8	37.3	700
11:51	4.73	31.29	724	0.59	7.30	-61.9	30.3	300 flow ↓
11:56	4.66	31.26	723	0.36	7.31	-63.6	19.4	250 flow ↓
12:01	4.63	31.27	722	0.33	7.31	-60.8	14.4	250
12:06	4.65	31.29	722	0.31	7.31	-66.3	12.3	250
12:11	4.67	31.24	720	0.31	7.30	-75.3	7.68	300
12:16	4.64	31.22	720	0.27	7.30	-75.9	6.15	275
12:21	4.63	31.19	719	0.25	7.31	-76.5	5.20	300
		Ready to Sample						

Comments:

Sample Time: 12:39 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC-SIM, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW - 4S

Site Name, Location: BMS, Condado Cristiana

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated ~~pump~~ bladder + tubing + cor 1 decontaminated bladder

Date: December 6, 2016

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	16.50
Top of Screen (ft from TOC):	6.20
Bottom of Screen (ft from TOC):	16.20
Pump Intake Level (ft from TOC):	~11
Desired Pumping Rate (Lpm):	0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	2.70 / 1400
Measured DTB (ft from TOC)/Time:	(16.50) /
Headspace Reading (ppm):	0.0
Time @ Start Purging:	1413
Time @ Stop Purging:	1446
Time @ Stop Sampling:	1514
Purge Volume (gallons):	2.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1411	3.70		Start	at 1413				
1416	3.76	32.00	988.0	1.72	6.77	-29.0	68.6	400
1421	3.80	31.83	994.0	0.87	6.63	-30.1	63.6	250
1426	3.85	31.64	996.0	0.67	6.65	-31.9	36.1	250
1431	3.88	31.53	999.0	0.64	6.64	-35.8	13.9	250
1436	3.84	31.57	1,000.0	0.57	6.66	-37.2	7.3	250
1441	3.85	31.63	999.0	0.58	6.65	-37.4	4.7	250
1446	3.85	31.63	998.0	0.53	6.66	-36.5	3.6	250
			Ready to sample					

Comments:

Sample Time: 1514 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: geochemical sampling + VOC, SVOC SIM, SVOC, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: OSMW-3D

Site Name, Location: BMS, Crooked Creek, Christiana

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubbing + cora bladder decontaminates pump

Date: December 6, 2014

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	25.53
Top of Screen (ft from TOC):	15.23
Bottom of Screen (ft from TOC):	25.23
Pump Intake Level (ft from TOC):	~20
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	2.40 / 1055
Measured DTB (ft from TOC)/Time:	(25.53) /
Headspace Reading (ppm):	5.5
Time @ Start Purging:	11.11
Time @ Stop Purging:	1148
Time @ Stop Sampling:	1222
Purge Volume (gallons):	3.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1109	2.25							
1113	2.58	28.94	592.0	3.73	6.78	-57.6	78.6	500
1118	2.53	28.72	594.0	2.70	6.94	-70.1	72.9	500
1123	2.48	28.74	594.0	1.85	6.99	-73.7	41.2	300
1128	2.46	28.70	594.0	1.57	7.01	-75.1	25.1	300
1133	2.46	28.71	594.0	1.33	7.02	-75.9	19.6	300
1138	2.41	29.00	595.0	1.23	7.03	-76.4	9.5	200
11.43	2.32	29.07	595.0	1.14	7.04	-77.1	0.6	
1148	2.30	29.05	594.	1.07	7.04	-76.7	0.6	
			Ready to sample					

Comments:

Sample Time: 1222 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: geochemical samples + VOC, SVOC, 8VOC SIM, VPH, EPH, PCB's

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: UP-1

Site Name, Location: BMS Humacao ~~[illegible]~~

Personnel: N. Rivera H. Royer

Equipment Used: Dedicated tubing & bladder, cord, and pump

Date: 12/6/16

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 14
Top of Screen (ft from TOC): 4'
Bottom of Screen (ft from TOC): 14
Pump Intake Level (ft from TOC): 9
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 2.88 / 10:29
Measured DTB (ft from TOC)/Time: (14) /
Headspace Reading (ppm): 0.5
Time @ Start Purging: 10:29
Time @ Stop Purging: 1147
Time @ Stop Sampling: 1248
Purge Volume (gallons): 10.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
10:29	Start	Purging						
10:35	2.96	30.77	444	0.91	6.96	-97.7	4.89	200
10:41	3.00	30.81	438	1.38	6.99	-96.7	5.11	500
10:46	3.00	30.85	436	1.04	7.06	-96.0	7.16	300 ↓
10:51	2.95	30.89	435	1.58	7.00	-92.5	6.04	450 ↓
10:56	2.95	30.89	434	1.08	7.00	-94.8	7.21	200 ↓
11:01	2.95	30.85	432	1.49	7.01	-90.5	7.27	200
11:06	2.95	30.89	432	1.24	6.98	-85.9	7.55	300
11:11	2.95	30.88	432	0.88	6.97	-92.4	7.00	250
11:16	2.95	30.91	431	1.21	6.98	-87.6	6.30	200
11:21	2.94	30.95	431	1.18	6.98	-91.6	no flow	none
11:27	2.95	30.84	427	0.96	6.97	-81.5	8.71	200
11:32	2.95	30.92	427	0.74	6.98	-79.2	no flow	
11:37	2.95	30.99	429	0.73	7.01	-91.0	8.79	100
11:42	2.95	30.94	429	0.61	6.96	-98.4	6.27	350
11:47	2.95	31.09	428	0.44	6.97	-92.3	4.93	350
			Ready to sample					

Comments:

Sample Time: 1212 DUP ✓ MS 1230 MSD 1248 Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS see below MSD see below

Additional Comments: VOC, LMA, VPH, SVOC, SVOC SIM, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: UP - 2

Site Name, Location: BMS Humacao

Personnel: N. Rivera H. Rayer

Equipment Used: Dedicated ~~[illegible]~~ tubing & bladder, cord, & pump

Date: 12/6/16

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 14
Top of Screen (ft from TOC): 4'
Bottom of Screen (ft from TOC): 14
Pump Intake Level (ft from TOC): 9
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 6.35 / 14:17
Measured DTB (ft from TOC)/Time: (14) /
Headspace Reading (ppm): 0.5
Time @ Start Purging: 1st - 14:25 2nd - 14:38
Time @ Stop Purging: 15:02
Time @ Stop Sampling: 15:34
Purge Volume (gallons): 1.5 gal

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
14:25	start	purge						
14:33	stop	bottom	ball valve	was stuck. Pump	was	replaced		
14:35	6.34	after	reinstalling	pump				
14:41	6.43	29.71	1010	1.53	7.06	-67.8	22.1	250
14:46	6.43	29.76	992	0.37	7.09	-102.8	11.2	150
14:52	6.43	29.81	974	0.24	7.11	-114.7	6.02	150
14:57	6.43	29.82	973	0.19	7.11	-115.0	3.89	150
15:02	6.43	29.77	972	0.22	7.12	-114.3	3.05	150
		Ready to sample						

Comments:

Sample Time: 15:34 DUP ✓ MS ✓ MSD ✓

Water Quality/Appearance: 15:11 clear w/ brown flakes

Sample Analysis: All below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, LMA, VPH, SVOC, SVOC SIM, PFA, PEST + Geochem

FB120616 @ 1620

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-41 ~~D~~ S mw

Site Name, Location: BMS Humacao

Personnel: N. Rivera H. Royer

Equipment Used: Dedicated tubing, cord, & bladder decontaminated pump

Date: 12/7/16

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 33.79

Top of Screen (ft from TOC): 23.49

Bottom of Screen (ft from TOC): 33.49

Pump Intake Level (ft from TOC): ~29

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 12.43 / 14:37

Measured DTB (ft from TOC)/Time: 33.79 / ____

Headspace Reading (ppm): 0.0

Time @ Start Purging: 14:51 2nd - 15:10

Time @ Stop Purging: 16:14

Time @ Stop Sampling: 1656

Purge Volume (gallons): 3

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
14:47	12.27							
15:08		12.40	Pump stopped due to odd noise. Tubing was cracked.					
		Cracked	tubing removed and pump replaced.					
15:20	12.68	27.96	1192	2.96	7.17	-43.3	74.6	50
15:25	12.70	27.54	1202	1.28	7.07	-62.6	60.7	150
15:32	12.71	27.31	1211	0.77	7.03	-72.5	44.5	150
15:37	12.70	27.29	1217	0.64	7.01	-75.3	38.2	150
15:42	12.72	27.24	1217	0.56	7.01	-75.4	29.5	175
15:47	12.72	27.25	1217	0.50	7.01	-75.8	22.1	175
15:52	12.73	27.22	1220	0.54	7.00	-76.3	17.7	175
15:57	12.73	27.17	1223	0.45	6.99	-76.2	12.3	175
16:04	12.74	27.16	1226	0.44	6.98	-75.2	8.89	175
16:09	12.74	27.17	1227	0.41	6.98	-77.2	7.50	150
16:14	12.74	27.11	1228	0.42	6.98	-77.1	6.56	150
			Ready to sample					

Comments:

Sample Time: 1656 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, LMA, VPH, SVOC, SVOC-SIM, EPH, PEST + Geo Tech

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S[redacted]-41D

Site Name, Location: BMS Humacao

Personnel: N. Rivera H. Royer

Equipment Used: Dedicated tubing, cord, & bladder pump decontaminated pump

Date: 12/7/18

Monitoring Well Information:

Diameter/Material: 2 / PVC/SS
Depth to Bottom (ft from TOC): 33.79
Top of Screen (ft from TOC): 23.49
Bottom of Screen (ft from TOC): 33.49
Pump Intake Level (ft from TOC): ~29
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 9.49 / 11:19
Measured DTB (ft from TOC)/Time: 33.79 /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 11:36
Time @ Stop Purging: 12:15
Time @ Stop Sampling: 13:31
Purge Volume (gallons): 3.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:33	9.44							
11:50	9.81	28.21	1170	1.58	7.32	175.2	12.7	200
11:55	9.87	27.72	1168	0.69	7.30	165.5	6.71	250
12:00	9.88	27.58	1168	0.55	7.30	157.7	5.04	200
12:05	9.94	27.51	1167	0.47	7.31	150.8	5.27	300
12:10	9.96	27.36	1166	0.56	7.31	146.4	6.85	250
12:15	9.95	27.37	1166	0.48	7.31	142.7	5.73	200
			Ready to sample					

Comments:

Sample Time: 12:43 DUP [redacted] MS 13:07 MSD 13:31 Water Quality/Appearance: clear

Sample Analysis: See below DUP — MS See below MSD See below

Additional Comments: VOC, SVOC, SVOC-SIM, 1MA, VPH, EPH, PCBT

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-40D

Site Name, Location: BMS Hillsborough

Personnel: J. Del Valle / R Stuart

Equipment Used: Dedicated pump and tubing + cord decontaminated pump

Date: December 7, 2016

Monitoring Well Information:

Diameter/Material:	2" / PVC & SS
Depth to Bottom (ft from TOC):	35.40
Top of Screen (ft from TOC):	25.10
Bottom of Screen (ft from TOC):	35.10
Pump Intake Level (ft from TOC):	~ 30
Desired Pumping Rate (Lpm):	0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	12.03 / 1110
Measured DTB (ft from TOC)/Time:	(35.40) /
Headspace Reading (ppm):	0.0
Time @ Start Purging:	1123
Time @ Stop Purging:	1214
Time @ Stop Sampling:	1246
Purge Volume (gallons):	2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1120	12.00							
1123			start					
1128		29.71	919.0	5.01	6.81	180.5	-0.1	
1129			Stop	—	Start			
1129	12.31	29.94	924.0	4.91	6.98	197.5	0.4	200
1134	12.41	27.88	937.0	3.09	6.83	278.6	6.7	200
1139	12.41	27.90	938.0	3.52	6.84	294.9	11.5	200
1144	12.41	27.90	940.0	2.76	6.86	317.3	13.6	200
1149	12.41	28.38	942.0	2.70	6.88	331.6	11.9	150
1154	12.21	28.46	942.0	2.59	6.90	342.9	9.1	150
1159	12.21	28.50	942.0	2.42	6.91	353.8	8.9	150
1204	12.21	28.36	943.0	1.98	6.91	363.6	8.3	150
1209	12.21	28.26	944.0	1.78	6.91	369.7	9.9	150
1214	12.21	28.25	944.0	1.73	6.92	370.9	9.86	150
			Ready to sample					

Comments:

Sample Time: 1246 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: At 1129, readings were paused; compressor was giving problems. Resume readings at 1129.
VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-40S

Site Name, Location: BMS Hill

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated bladder pump + tubing + cord decon-laminated pump

Date: December 7, 2016

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	23.80
Top of Screen (ft from TOC):	13.50
Bottom of Screen (ft from TOC):	23.50
Pump Intake Level (ft from TOC):	~19
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	11.81 / 1420
Measured DTB (ft from TOC)/Time:	(23.80) /
Headspace Reading (ppm):	0.0
Time @ Start Purging:	1433
Time @ Stop Purging:	1521
Time @ Stop Sampling:	1550
Purge Volume (gallons):	3.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1430	11.76							
1433				Start				
1436	12.02	28.89	1,259	4.73	6.46	7.4	143.0	150
1441	12.04	28.03	1,269	1.07	6.33	14.7	110.6	250
1446	12.07	27.94	1,272	0.80	6.35	12.0	48.1	150
1451	12.12	27.81	1,268	0.78	6.36	8.5	26.3	150
1456	12.14	27.86	1,258	0.86	6.37	6.3	17.3	150
1501	12.16	27.66	1,256	0.76	6.37	4.7	12.2	150
1506	12.16	27.70	1,247	0.63	6.38	4.0	9.8	150
1511	12.16	27.75	1,244	0.58	6.39	2.9	7.0	150
1516	12.16	27.73	1,239	0.66	6.39	2.3	5.2	150
1521	12.16	27.71	1,235	0.56	6.40	2.0	4.3	150
			Ready to sample.					

Comments:

Sample Time: 1550 DUP — MS — MSD — Water Quality/Appearance: clear

Sample Analysis: See below DUP — MS — MSD —

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-34

Site Name, Location: BMS Humacao

Personnel: N. Rivera H. Rayer

Equipment Used: Dedicated pump, cord, tubing

Date: 12/8/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 21.26
Top of Screen (ft from TOC): 11.26
Bottom of Screen (ft from TOC): 21.26
Pump Intake Level (ft from TOC): ~17
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 17.04 / 14:30
Measured DTB (ft from TOC)/Time: (21.26) /
Headspace Reading (ppm):
Time @ Start Purging: 14:33
Time @ Stop Purging: 15:00
Time @ Stop Sampling: 15:42
Purge Volume (gallons): 1.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
~~[illegible]~~								
14:40	17.31	28.80	859	1.28	6.88	-30.2	15.6	100
14:45	17.58	28.36	848	0.89	6.84	-53.8	8.29	150
14:50	17.78	28.18	818	0.64	6.87	-60.0	3.64	150
14:55	18.00	28.10	804	0.54	6.89	-62.8	2.92	150
15:00	18.09	28.07	800	0.46	6.90	-65.4	3.10	150
		Ready to Sample						

Comments:

Sample Time: 15:42 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, PMS, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: A-1R4

Site Name, Location: BMS Humacao

Personnel: R. Stuart & H. Rayer

Equipment Used: Dedicated pump, cord, tubing, & bladder

Date: 12/8/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 14.1
Top of Screen (ft from TOC): 4.1
Bottom of Screen (ft from TOC): 14.1
Pump Intake Level (ft from TOC): ~16
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.85 / 10:28
Measured DTB (ft from TOC)/Time: (14.1) / ____
Headspace Reading (ppm): 13.7
Time @ Start Purging: 10:31
Time @ Stop Purging: 11:19
Time @ Stop Sampling: 1215
Purge Volume (gallons): 2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
10:30	4.88							
10:34	5.04	29.50	1473	2.11	6.64	-93.9	7.4	250
10:39	5.12	29.54	1155	1.90	6.62	-93.9	8.2	200
10:44	5.12	29.67	1153	1.77	6.62	-95.3	5.5	~~100~~ 150
10:49	5.14	29.67	1172	1.57	6.62	-95.7	4.4	200
10:54	5.18	29.84	1259	1.48	6.56	-92.5	4.0	100
10:59	5.15	29.81	1326	1.31	6.54	-93.1	3.1	100
11:04	5.13	29.72	1386	1.27	6.52	-92.6	2.9	100
11:09	5.13	29.78	1477	1.20	6.48	-91.3	-0.7	100
11:14	5.17	29.84	1509	1.07	6.46	-88.0	-0.3	150
11:19	5.16	29.87	1505	0.97	6.47	-87.7	-0.9	150

Comments:

Sample Time: 1215 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, IMA, VPH, EPH, PEST + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: A-2R2

Site Name, Location: BMS, Humacao, Blg 5 **Personnel:** N. Rivera/R. Stuart/H. Rogers

Equipment Used: dedicated bladder pump/tubing cord **Date:** Dec 8, 2016

Monitoring Well Information:

Diameter/Material:	2 / PVC
Depth to Bottom (ft from TOC):	12.7
Top of Screen (ft from TOC):	2.7
Bottom of Screen (ft from TOC):	12.7
Pump Intake Level (ft from TOC):	≈10
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	5.22 / 1051
Measured DTB (ft from TOC)/Time:	(12.7) /
Headspace Reading (ppm):	0.0
Time @ Start Purging:	1057
Time @ Stop Purging:	1149
Time @ Stop Sampling:	1233
Purge Volume (gallons):	2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1057	START							
1059	5.69	29.55	594	0.35	6.85	195.0	15.9	250
1104	5.62	29.85	595	0.33	6.87	188.0	4.26	200
1109	5.62	29.54	604	0.31	6.83	146.4	2.74	200
1114	5.62	29.54	610	0.32	6.81	113.0	2.56	200
1119	5.64	29.56	613	0.31	6.80	76.5	2.16	200
1124	5.68	29.58	617	0.29	6.79	28.0	2.21	200
1129	5.76	29.61	619	0.28	6.78	6.6	2.44	200 ↓
1134	5.70	29.56	622	0.26	6.77	-7.0	1.21	175
1139	5.70	29.56	625	0.29	6.76	-12.1	1.19	200
1144	5.70	29.60	628	0.27	6.75	-18.5	1.15	200
1149	5.70	29.62	628	0.27	6.75	-19.5	1.02	200
			READY	to sample				

Comments:

Sample Time: 1233 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, LMS, VPH, SVOC, SVOC SIM, EPH, PEST → Geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-33

Site Name, Location: BMS Hill

Personnel: J Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubbing + cord + bladder

Date: December 8, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 28.80
Top of Screen (ft from TOC): 10.1
Bottom of Screen (ft from TOC): 20.1
Pump Intake Level (ft from TOC): ~18
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 14.70 / 1420
Measured DTB (ft from TOC)/Time: (28.80) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1428
Time @ Stop Purging: 1514
Time @ Stop Sampling: 1546
Purge Volume (gallons): 1.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1428	14.70							
1429	~~29.33~~ 14.70	29.33	805.00	0.86	6.56	-82.3	-3.3	150
1434	14.70	29.93	817.00	0.53	6.52	-77.3	3.1	150
1439	14.70	29.95	815.00	0.43	6.52	-84.1	29.9	100
1444	14.70	29.81	807.00	0.41	6.51	-83.9	35.0	100
1449	14.70	29.79	800.00	0.37	6.50	-82.4	27.2	100
1454	14.70	29.80	798.00	0.31	6.49	-82.4	18.3	100
1459	14.70	29.76	796.00	0.27	6.50	-82.3	12.3	100
1504	14.70	29.81	796.00	0.27	6.50	-81.9	9.1	100
1509	14.70	29.48	796.00	0.21	6.49	-84.3	2.6	100
1514	14.70	29.48	795.00	0.22	6.51	-83.2	0.3	100
			Ready to sample					

Comments:

Sample Time: 1546 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: Clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: Plenty of bubbles coming out from the tubbing while sampling

VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-37

Site Name, Location: BMS, Hill

Personnel: J. Del Valle/R. Otero

Equipment Used: Dedicated pump + tubing.

Date: December 9, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 31.7
Top of Screen (ft from TOC): 21.7
Bottom of Screen (ft from TOC): 31.7
Pump Intake Level (ft from TOC): ~26
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 20.58 / 1117
Measured DTB (ft from TOC)/Time: (31.7) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1126
Time @ Stop Purging: 1153
Time @ Stop Sampling: 1226
Purge Volume (gallons): 1.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11.24	20.58							
1126				Start				
1128	20.68	30.31	900.0	7.60	7.46	202.4	-4.3	100
1133	20.76	29.60	919.0	3.13	7.21	-8.8	-3.4	100
1138	20.78	29.32	937.0	1.42	7.02	-58.4	-3.9	100
1143	20.78	29.27	940.0	1.05	7.05	-66.3	-4.0	100
1148	20.78	29.21	940.0	0.87	7.06	-68.1	-4.1	100
1153	20.78	29.14	941.0	0.77	7.06	-69.2	-4.2	100
			Ready to sample					

Comments:

Sample Time: 1226 DUP ✓ MS — MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: Plenty of bottles while sampling.

VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-35D

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayes

Equipment Used: Dedicated tubing, bladder, & cord decontaminated pump

Date: 12/9/16

Monitoring Well Information:

Diameter/Material: 2 / SS\PVC

Depth to Bottom (ft from TOC): 35.28

Top of Screen (ft from TOC): 24.98

Bottom of Screen (ft from TOC): 34.98

Pump Intake Level (ft from TOC): ~30

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 10.31 B:15

Measured DTB (ft from TOC)/Time: ~~13~~ (35.28)

Headspace Reading (ppm): 0.0

Time @ Start Purging: B:17

Time @ Stop Purging: ~~13~~:10

Time @ Stop Sampling: 14:41

Purge Volume (gallons): 3.00

	Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
13	13:15	10.31							
13	13:32	10.55	29.63	836	1.82	7.40	78.9	1.94	200
13	13:37	10.56	29.04	833	0.77	7.37	68.1	2.10	250
13	13:44	10.34	28.85	830	0.47	7.37	34.4	1.28	250
13	13:49	10.56	28.81	830	0.46	7.37	23.4	1.085	225
13	13:54	10.53	28.76	829	0.42	7.37	13.6	1.37	250
14	14:00	10.54	28.77	829	0.36	7.37	6.0	1.26	250
14	14:05	10.55	28.74	828	0.35	7.37	3.3	1.21	200
14	14:10	10.53	28.73	828	0.33	7.37	0.8	1.27	200

Comments:

Sample Time: 14:41 DUP ✓ MS ✓ MSD ✓

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Water Quality/Appearance: clear w/ brown flakes

Additional Comments: VOC, SVOC, SVOC SIM, KMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-35

Site Name, Location: BMS Humacao **Personnel:** N. Rivera H. Rogers

Equipment Used: Dedicated pump, tubing, bladder, & cord **Date:** 12/9/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 18
Top of Screen (ft from TOC): 8
Bottom of Screen (ft from TOC): 18
Pump Intake Level (ft from TOC): -16
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 13.22 / 11:27
Measured DTB (ft from TOC)/Time: (18) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 11:28
Time @ Stop Purging: 12:01
Time @ Stop Sampling: 12:34
Purge Volume (gallons): 2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:28	13.22							
11:36	13.66	29.00	977	1.43	6.81	19.9	4.28	250
11:41	13.81	28.70	968	0.82	6.82	-6.3	4.54	200
11:46	13.86	28.78	955	0.70	6.83	-3.4	3.94	100
11:51	13.93	28.69	944	0.58	6.82	4.3	2.64	175
11:56	14.01	28.59	936	0.49	6.82	9.9	1.11	175
12:01	14.04	28.67	936	0.50	6.82	11.8	1.72	150

Comments:
Sample Time: 12:34 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear w/ brown flakes
Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-36

Site Name, Location: BMS, Hill

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated tubbing + pump + cord

Date: December 9, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 19.5
Top of Screen (ft from TOC): 9.5
Bottom of Screen (ft from TOC): 19.5
Pump Intake Level (ft from TOC): -17
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 14.81 / 1410
Measured DTB (ft from TOC)/Time: (19.5) / ____
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1416
Time @ Stop Purging: 1505
Time @ Stop Sampling: 1531
Purge Volume (gallons): 1.75

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1416			Start					
1417								
1419			Stop					
1422			Resume					
1423			Stop					
1424	1522		Stop					
1425			Resume					
1425	1526	30.81	1,177.0	3.56	6.68	11.3	63.5	150
1430	1532	29.93	1,171	2.48	6.70	19.3	34.2	150
1435	1542	30.04	1,175	1.89	6.62	18.3	26.4	150
1440	1542	29.95	1,177	1.59	6.64	14.5	18.3	150
1445	1545	29.95	1,180	1.46	6.61	13.9	12.9	150
1450	1545	29.92	1,185	1.31	6.62	10.8	15.2	150
1455	1545	29.98	1,188	1.18	6.67	7.4	8.9	150
1500	1545	29.91	1,190	1.10	6.63	8.6	9.8	150
1505	1545	29.95	1,192	0.99	6.64	7.4	10.0	150
			Ready to sample					

Comments:

Sample Time: 1531 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: Cloudy

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Additional Comments: Stop purging at 1419 to unclogged the pump. Resume purging at 1422. Stop purging at 1423 due to air rope through the pump. Resume 1424. Stop at 1425 resume at 1425. Flocks observed while sampling.

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-39S

Site Name, Location: BMS Humacao PR **Personnel:** N. Rivera H. Rayer

Equipment Used: Dedicated tubing, cord, & bladder decontaminated pump **Date:** 12/12/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 20.50
Top of Screen (ft from TOC): 10.20
Bottom of Screen (ft from TOC): ~~1~~ 20.20
Pump Intake Level (ft from TOC): ~16
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 9.84 / 14:45
Measured DTB (ft from TOC)/Time: (20.50) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: ~~20~~ 14:59
Time @ Stop Purging: 15:21
Time @ Stop Sampling: 16:04
Purge Volume (gallons): 2.75

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
14:53	9.71	After	installing	pump				
15:01	9.91	29.66	1173	1.16	7.01	-66.7	36.2	350
15:06	10.13	30.01	1189	0.34	6.88	-78.1	12.3	300
15:11	10.15	29.98	1184	0.29	6.86	-80.2	7.32	300
15:16	10.17	29.96	1185	0.27	6.84	-82.5	5.37	325
15:21	10.20	29.96	1189	0.26	6.82	-83.1	4.57	350

Comments:
Sample Time: 16:04 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear/colorless
Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC sim, LMA, VPH, EPH, PEST + geo chem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-39D

Site Name, Location: BMS Humacao PR **Personnel:** N. Rivera H. Royer

Equipment Used: Dedicated tubing, bladder, & cord **Date:** 12/12/16

Monitoring Well Information:

Diameter/Material: 2 / SS/PVC
Depth to Bottom (ft from TOC): 30.10
Top of Screen (ft from TOC): 19.80
Bottom of Screen (ft from TOC): 29.80
Pump Intake Level (ft from TOC): ~25
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 9.81 / 11:48
Measured DTB (ft from TOC)/Time: 30.10 /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 11:57
Time @ Stop Purging: 12:27
Time @ Stop Sampling: 13:51
Purge Volume (gallons): 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:55	9.74	after	installing	pump				
12:02	10.02	29.45	1021	3.19	7.32	130.0	-26	150
12:07	10.06	29.58	1033	1.20	7.24	-10.6	-23	150
12:12	10.08	29.58	1033	0.50	7.23	-49.5	-10	150
12:17	10.07	29.48	1033	0.42	7.24	-61.8	-13	150
12:22	10.07	29.43	1032	0.38	7.24	-64.2	-34	150
12:27	10.07	29.33	1030	0.40	7.25	-66.5	60.9	150
	Disregarding Turbidity due to odd							
	readings; Ready to Sample							

Comments:
Sample Time: 12:55 DUP / MS 13:23 MSD 13:31 Water Quality/Appearance: brown & turbid
Sample Analysis: see below DUP / MS see below MSD see below

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-28

Site Name, Location: BMS

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubing + cord

Date: December 12, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 19.92
Top of Screen (ft from TOC): 9.8
Bottom of Screen (ft from TOC): 19.8
Pump Intake Level (ft from TOC): ~15
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 8.78 / 1116
Measured DTB (ft from TOC)/Time: (19.8) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1118
Time @ Stop Purging: 1212
Time @ Stop Sampling: 1241
Purge Volume (gallons): 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1118				Start				
1121				Stop				
1127	8.78			Start (resume)				
1132	9.03	30.02	848.0	1.74	6.52	-16.0	17.7	200
1137	9.02	29.96	968.0	0.51	6.58	-49.2	12.2	150
1142	9.02	30.15	1,009.0	0.40	6.60	-54.5	12.2	150
1147	9.02	30.11	1,003.0	0.35	6.61	-56.3	24.7	150
1152	9.02	30.15	1,015.0	0.32	6.62	-57.2	20.9	150
1157	9.02	30.23	1,013.0	0.43	6.62	-56.0	17.3	150
1202	9.02	30.32	1,008.0	0.67	6.65	-46.7	14.1	150
1207	9.02	30.42	1,009.0	0.69	6.65	-45.7	12.8	150
1212	9.02	30.30	1,010.0	0.68	6.64	-45.0	12.3	150
			Ready to sample					

Comments:

Sample Time: 1241 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: Purging was paused at 1121, water is not coming out. Resume purging at 1127.
VOC, SVOC, SVOC SIM, TMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-32

Site Name, Location: BMS Hill

Personnel: J Del Valle / R Stuart

Equipment Used: Dedicated pump + tubing + cord

Date: 12/12/16

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 21.6
Top of Screen (ft from TOC): 11.6
Bottom of Screen (ft from TOC): 21.6
Pump Intake Level (ft from TOC): ~17
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 12.90 / 1305
Measured DTB (ft from TOC)/Time: (21.6) /
Headspace Reading (ppm): 80.9
Time @ Start Purging: 1307
Time @ Stop Purging: 1338
Time @ Stop Sampling: 1429
Purge Volume (gallons): ~2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1307	12.80			Start				
1308	13.15	31.63	930.0	1.48	6.40	76.3	76.3	300
1313	13.02	31.71	948.0	0.93	6.40	-83.0	50.0	050
1318	13.06	31.62	949.0	0.83	6.41	-83.9	27.8	125
1323	13.08	31.60	954.0	0.71	6.42	-86.1	15.2	150
1328	13.07	31.59	954.0	0.62	6.42	-87.0	9.1	100
1333	13.09	31.61	954.0	0.57	6.42	-89.1	7.1	100
1338	13.08	31.57	955.0	0.56	6.42	-86.0	6.5	100
				Ready to sample.				

Comments:

Sample Time: 14.29 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: Clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: Sheen observed in bucket while purging.

VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PCB + PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: E-1R

Site Name, Location: BMS, Building 5

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated pump and tubbing + cor 1

Date: December 13, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 20.37
Top of Screen (ft from TOC): 10.37
Bottom of Screen (ft from TOC): 20.37
Pump Intake Level (ft from TOC): ~15
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 7.47 / 1106
Measured DTB (ft from TOC)/Time: (20.3) /
Headspace Reading (ppm): 0.4
Time @ Start Purging: 1109
Time @ Stop Purging: 1147
Time @ Stop Sampling: 1207
Purge Volume (gallons): 2.0

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1109				Start				
1112	7.52	30.45	1,244.0	0.85	6.36	3.0	36.0	200
1117	7.52	30.77	1,189.0	0.47	6.67	-46.5	42.8	200
1122	7.52	30.88	1,222.0	0.40	6.76	-62.9	26.0	200 ↓
1127	7.52	31.00	1,217.0	0.36	6.79	-68.2	21.5	150
1132	7.52	30.78	1,248.0	0.33	6.83	-71.9	13.4	150
1137	7.52	30.67	1,257.0	0.33	6.83	-75.2	8.2	150
1142	7.52	30.78	1,262.0	0.32	6.82	-75.5	7.2	150
1147	7.52	30.71	1,279	0.31	6.82	-76.5	5.2	150
			Ready to sample.					

Comments:

Sample Time: 1207 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC's, VPH, LMA, SVOC, EPH, Pest

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: D - 1R

Site Name, Location: BMS, Building 5.
Equipment Used: Dedicated pump and tubbing

Personnel: J. Del Valle / R. Stuart
Date: December 13, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 16.1
Top of Screen (ft from TOC): 6.1
Bottom of Screen (ft from TOC): 16.1
Pump Intake Level (ft from TOC): 16.30
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 7.88 / 1322
Measured DTB (ft from TOC)/Time: (16.1) / ____
Headspace Reading (ppm): 0.6
Time @ Start Purging: 1327
Time @ Stop Purging: 1401
Time @ Stop Sampling: 1424
Purge Volume (gallons): 2.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1324				Start				
1326				Stop				
1327				Resume				
1331	7.95	30.80	802.0	0.85	6.70	-52.3	24.7	200
1336	7.95	30.71	772.0	0.39	6.57	-56.1	29.6	200
1341	7.95	30.74	768.0	0.29	6.56	-60.2	22.3	200
1346	7.95	30.65	767.0	0.27	6.56	-62.0	12.6	200
1351	7.95	30.64	767.0	0.27	6.56	-63.0	8.9	200
1356	7.95	30.64	766.0	0.25	6.56	-63.9	4.9	200
1401	7.95	30.67	766.0	0.25	6.56	-64.0	3.2	200
			Ready to sample					

Comments:
Sample Time: 1424 DUP 1436 MS ✓ MSD ✓ Water Quality/Appearance: clear
Sample Analysis: see below DUP see below MS ✓ MSD ✓

Additional Comments: VOC, VPH, LMA, SVOC, EPH, pest

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: G-1R3

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayer

Equipment Used: Dedicated pump, tubing, bladder, & cord

Date: 12/13/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 15.7
Top of Screen (ft from TOC): 5.7
Bottom of Screen (ft from TOC): 15.7
Pump Intake Level (ft from TOC): -10
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.45 / 11:12
Measured DTB (ft from TOC)/Time: (15.7) /
Headspace Reading (ppm): 1576
Time @ Start Purging: 11:53
Time @ Stop Purging: 12:19
Time @ Stop Sampling: 12:56
Purge Volume (gallons): 1.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:50	4.79	H_2O level after pump was removed and replaced to fix						
		leaky	airline					
11:52	4.80	pump	installed					
11:59	5.54	29.53	357	1.68	6.55	44.0	40.5	250
12:04	6.19	29.81	327	0.28	6.51	-15.8	42.4	200
12:09	6.36	29.86	328	0.23	6.50	-22.3	42.9	175
12:14	6.43	29.87	330	0.20	6.49	-23.5	42.4	175
12:19	6.48	29.94	333	0.20	6.48	-24.1	42.1	175

Comments:

Sample Time: 12:56 DUP / MS / MSD /
Sample Analysis: See below DUP / MS / MSD /
Water Quality/Appearance: cloudy w/ brown flecks

Additional Comments: VOC, SVOC, SVOC SIM, LMP, VPH, EPH, PES

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-22S

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera R. Stuart H. Royer

Equipment Used: Dedicated tubing, cord (bladder) decontaminated pump

Date: 12/14/16

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 14.76

Top of Screen (ft from TOC): 4.46

Bottom of Screen (ft from TOC): 14.46

Pump Intake Level (ft from TOC): ~10

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: ~~3.37~~ 3.73 / 3:32

Measured DTB (ft from TOC)/Time: (14.76) /

Headspace Reading (ppm): 0.3

Time @ Start Purging: 15:55

Time @ Stop Purging: 16:21

Time @ Stop Sampling: 17:05

Purge Volume (gallons): 1.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
~~3:57~~	~~3.47~~	~~28.57~~	~~413~~	~~1.54~~	~~7.11~~	~~65.5~~	Pump not	on
16:00	3.78	28.52	412	1.07	6.70	81.2	13.70	175
16:05	3.80	28.29	411	0.70	6.64	88.8	13.40	150
16:10	3.83	28.19	411	0.42	6.63	92.5	8.45	200
16:16	3.83	28.21	411	0.43	6.62	93.7	7.32	150
16:21	3.83	28.24	410	0.42	6.61	95.0	6.67	100

Comments:

Sample Time: 17:05 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear/colorless

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, PEST, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-21S

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayes

Equipment Used: Dedicated tubing, cord, & bladder

Date: 12/14/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 18.28
Top of Screen (ft from TOC): 7.98
Bottom of Screen (ft from TOC): 17.98
Pump Intake Level (ft from TOC): 13
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.15 / 9:42
Measured DTB (ft from TOC)/Time: (18.28) /
Headspace Reading (ppm): 0.9
Time @ Start Purging: 10:26
Time @ Stop Purging: 10:59
Time @ Stop Sampling: 12:46
Purge Volume (gallons): ~~2~~ 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
9:45	4.15	After	Installing	Pump				
10:33	4.18	28.71	558	2.44	6.62	155.6	32.7	200
10:38	4.23	28.29	558	1.03	6.54	123.8	27.0	200
10:44	4.23	28.19	556	0.47	6.53	83.0	20.6	200
10:49	4.23	28.19	555	0.41	6.53	68.7	16.2	200
10:54	4.21	28.17	555	0.39	6.53	62.5	14.5	200
10:59	4.22	28.18	557	0.33	6.53	59.6	12.0	200

Comments:

Sample Time: 11:36 DUP ✓ MS 12:03 MSD 12:46 Water Quality/Appearance: cloudy

Sample Analysis: See below DUP ✓ MS See below MSD See below

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, PEST, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-7

Site Name, Location: BMS Humacao

Personnel: Jose Del Valle

Equipment Used: Dedicated Pump.

Date: 12-14-16

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 16.7
Top of Screen (ft from TOC): 6.7
Bottom of Screen (ft from TOC): 16.7
Pump Intake Level (ft from TOC): ~13
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.73 / 1228
Measured DTB (ft from TOC)/Time: (16.7) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1248
Time @ Stop Purging: 1323
Time @ Stop Sampling: 1341
Purge Volume (gallons): 1.5

	Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
Started	1248	3.73							
	1253	3.90	31.18	.905	1.36	6.78	-42.3	8.8	300
	1258	3.85	31.27	.902	.95	6.79	-48.8	5.1	200
	1303	3.85	31.29	.901	.81	6.80	-50.6	6.7	200
	1308	3.85	31.34	.894	.68	6.80	-53.8	2.4	200
	1313	3.85	31.39	.881	.54	6.79	-55.1	1.8	200
	1318	3.85	31.40	.877	.52	6.80	-53.8	1.3	200
	1323	3.85	31.40	.871	.48	6.79	-55.2	0.4	200
				Ready To Sample					

Comments:
Sample Time: 1341 DUP — MS — MSD —
Water Quality/Appearance: clear / with small Flakes
Sample Analysis: See below DUP — MS — MSD —

Additional Comments: VOC, SVOC, SVOC SIM, LMW, VPH, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-13

Site Name, Location: BMS HUMACAO

Personnel: J. DelVALLE

Equipment Used: dedicated Bladder, Tubing / cord Pump

Date: 12-14-16

Monitoring Well Information:

Diameter/Material: 2" / PVC

Depth to Bottom (ft from TOC): 15

Top of Screen (ft from TOC): 5

Bottom of Screen (ft from TOC): 15

Pump Intake Level (ft from TOC): ~10

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.95 / 1048

Measured DTB (ft from TOC)/Time: (15) /

Headspace Reading (ppm): 0.1

Time @ Start Purging: 1055

Time @ Stop Purging: 1130

Time @ Stop Sampling: 1158 1154

Purge Volume (gallons): 1.5

	Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
START	1055	3.95	29.32		2.29				
	1100	4.02	29.32	.241	2.29	6.95	216.4	66.1	200 ↓
	1105	3.98	29.17	.242	2.13	7.05	253.6	37.7	100
	1110	3.98	29.15	.243	2.13	7.10	286.9	16.8	100
	1115	3.98	29.01	.244	2.25	7.13	301.3	9.6	100
	1120	3.98	29.08	.243	2.25	7.12	318.0	5.0	100
	1125	3.98	29.08	244	2.26	7.12	322.1	3.9	100
	1130	3.98	29.06	249	2.30	7.11	320.5	2.3	100
			Ready To		Sample				

Comments:

Sample Time: 1154 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: Clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC Sim, LMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-43D

Site Name, Location: BMS parking Gate C

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated bladder pump, tubing + rod decontaminated pump

Date: December 15, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 25.73
Top of Screen (ft from TOC): 15.43
Bottom of Screen (ft from TOC): 25.43
Pump Intake Level (ft from TOC): ~20
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.98 / 1113
Measured DTB (ft from TOC)/Time: (25.73) /
Headspace Reading (ppm): —
Time @ Start Purging: 1349
Time @ Stop Purging: 1416
Time @ Stop Sampling: 1440
Purge Volume (gallons): 1.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1127	3.98		with pump inside					
1349			Start					
1351	4.00	30.05	737.00	7.39	6.51	-22.6	40.5	300
1356	4.00	30.30	727.00	7.15	6.49	-32.0	32.6	100
1401	4.00	30.02	730.00	6.92	6.49	-37.1	12.4	150
1406	4.02	29.97	724.00	6.71	6.48	-38.1	8.5	150
1411	4.04	29.90	722.00	6.48	6.53	-39.7	4.8	150
1416	4.04	29.96	723.00	6.26	6.51	-40.8	3.6	150
			Ready to sample					

Comments:

Sample Time: 1440 DUP — MS — MSD — Water Quality/Appearance: clear

Sample Analysis: See below DUP — MS — MSD —

Additional Comments: VOC, VPH, LMA, SVOC, EPH, Pesticides, SVOC Sim

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-43S

Site Name, Location: BMS parking Gate B.

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated ~~pump~~ bladder pump, tubing and cord decontaminate + pump

Date: December 15, 2016.

Monitoring Well Information:

Diameter/Material:	2" / PVC
Depth to Bottom (ft from TOC):	18.35
Top of Screen (ft from TOC):	8.05
Bottom of Screen (ft from TOC):	18.05
Pump Intake Level (ft from TOC):	~14
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	3.83 / 1108
Measured DTB (ft from TOC)/Time:	(18.35) /
Headspace Reading (ppm):	—
Time @ Start Purging:	1128
Time @ Stop Purging:	1149
Time @ Stop Sampling:	1225
Purge Volume (gallons):	2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1126	3.85		with pump inside					
1128				Start				
1129	~~24.9~~ 3.88	29.95	641.0	6.79	6.35	-19.2	58.3	200
1134	4.78	29.67	641.0	6.86	6.40	-31.8	17.7	200
11.39	3.82	29.62	639.0	6.55	6.45	-36.8	8.4	200
1149	3.88	29.59	639.0	6.37	6.47	-39.3	4.1	200
1149	3.88	29.58	639.0	6.22	6.47	-40.0	1.6	200
			Ready to sample.					

Comments:

Sample Time: 1225 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: see below DUP / MS / MSD /

Additional Comments: VOC, VPH, LMA, SVOC, Pest, EPH, methane and other geochemical analysis

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-42D

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Reyes

Equipment Used: Dedicated bladder, tubing, & cord

Date: 12/15/16

Monitoring Well Information:

Diameter/Material: 2 / PVC/SS
Depth to Bottom (ft from TOC): 26.10
Top of Screen (ft from TOC): 15.80
Bottom of Screen (ft from TOC): 25.80
Pump Intake Level (ft from TOC): ~21
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 7.47 / 13:27
Measured DTB (ft from TOC)/Time: (26.10) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 13:50
Time @ Stop Purging: 14:20
Time @ Stop Sampling: 14:53
Purge Volume (gallons): 2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
13:43	7.47	After	installing	pump				
1359	7.57	30.29	1129	2.73	7.08	-48.6	2.25	200
14:04	7.55	30.12	1136	0.75	6.95	-61.5	1.17	200
14:10	7.56	30.02	1137	0.45	6.94	-67.4	0.91	200
14:15	7.57	30.03	1138	0.35	6.94	-70.1	1.10	200
14:20	7.57	29.98	1136	0.34	6.94	-70.4	0.91	200
		Ready to sample						

Comments:
Sample Time: 14:53 DUP / MS / MSD / Water Quality/Appearance: clear
Sample Analysis: See below DUP / MS / MSD /

Additional Comments: VOC, SVOC, SVOC SIM, LMA, EPH, VPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-42S

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayer

Equipment Used: Dedicated tubing, bladder, & cord decontaminated pump

Date: 12/15/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 18.25
Top of Screen (ft from TOC): 7.95
Bottom of Screen (ft from TOC): 17.98
Pump Intake Level (ft from TOC): ~13
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 7.61 / 11:18
Measured DTB (ft from TOC)/Time: (18.25) /
Headspace Reading (ppm): 1.9
Time @ Start Purging: 11:44
Time @ Stop Purging: 12:15
Time @ Stop Sampling: 12:57
Purge Volume (gallons): 2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:39	7.82	After	installing	pump				
11:48	7.87	30.25	1151	2.89	6.80	-8.9	22.7	225
11:53	7.79	30.17	1152	1.47	6.84	-56.6	13.0	200
11:58	7.79	30.12	1155	1.00	6.87	-59.3	7.55	200
12:03	7.69	30.13	1156	0.78	6.88	-56.5	5.45	225
12:08	7.69	30.15	1156	0.61	6.88	-53.4	4.89	200
12:13	7.69	30.15	1156	0.51	6.88	-55.7	4.15	200
		Ready to sample						

Comments:

Sample Time: 12:57 DUP — MS — MSD — Water Quality/Appearance: clear & colorless

Sample Analysis: See below DUP — MS — MSD —

Additional Comments: VOC, SVOC, SVOC SIM, LMA, PDB, EPH, PEST, + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-29R

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayer

Equipment Used: Dedicated bladder, cord, pump, & tubing

Date: 12/16/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 21.4
Top of Screen (ft from TOC): 11.4
Bottom of Screen (ft from TOC): 21.4
Pump Intake Level (ft from TOC): ~17
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 7.16 / 15:35
Measured DTB (ft from TOC)/Time: 21.4 /
Headspace Reading (ppm): 0.1
Time @ Start Purging: 15:39 / 16:15
Time @ Stop Purging: 16:38
Time @ Stop Sampling: 17:01
Purge Volume (gallons): 1.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
15:42	Pump stopped	valve needs to	be replaced					
16:18	7.25	32.29	865	1.24	6.68	-44.5	2.46	300
16:23	7.24	32.55	858	0.72	6.63	-54.3	3.16	150
16:28	7.24	32.52	856	0.59	6.63	-55.9	1.92	100
16:33	7.23	32.53	856	0.49	6.62	-56.2	1.88	150
16:38	7.23	32.51	855	0.46	6.62	-57.5	1.82	200
		Ready to Sample						

Comments:

Sample Time: 17:01 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear / colorless

Sample Analysis: All below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-31R(2)

Site Name, Location: BMS Humacao PR **Personnel:** N. Rivera H. Royer

Equipment Used: Dedicated tubing, cord, & bladder pump. **Date:** 12/16/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 15.80
Top of Screen (ft from TOC): 5.6
Bottom of Screen (ft from TOC): 15.6
Pump Intake Level (ft from TOC): ~10
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 6.59 / 11:09
Measured DTB (ft from TOC)/Time: (15.6) /
Headspace Reading (ppm): 9.3
Time @ Start Purging: 11:17
Time @ Stop Purging: 11:38
Time @ Stop Sampling: 12:43
Purge Volume (gallons): 2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:12	6.56	After	lifting	pump				
11:18	6.68	33.25	790	0.54	6.42	32.9	13.7	100
11:23	6.69	33.08	755	0.43	6.46	-66.2	15.0	150
11:28	6.70	33.12	739	0.36	6.44	-68.9	13.8	150
11:33	6.72	33.08	733	0.33	6.43	-67.1	8.44	150
11:38	6.71	33.14	731	0.33	6.42	-65.0	7.10	150
			Ready	to	Sample			

Comments:
Sample Time: 12:03 DUP / MS 12:25 MSD 12:43 Water Quality/Appearance: colorless/clear
Sample Analysis: See below DUP / MS See below MSD See below

Additional Comments: VOC, SVOC, SVOC SIM, 2MP, VOH, PEST, EDH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-30

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Royer

Equipment Used: Dedicated bladder, cord, & tubing decontaminated pump

Date: 12/16/16

Monitoring Well Information:

Diameter/Material:	2 / PVC
Depth to Bottom (ft from TOC):	22.6
Top of Screen (ft from TOC):	12.6
Bottom of Screen (ft from TOC):	22.6
Pump Intake Level (ft from TOC):	~17
Desired Pumping Rate (Lpm):	0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time:	8.25 / ~~12~~ 13:32
Measured DTB (ft from TOC)/Time:	(22.6) /
Headspace Reading (ppm):	0.0
Time @ Start Purging:	13:55
Time @ Stop Purging:	2:19
Time @ Stop Sampling:	14:48
Purge Volume (gallons):	~3

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
13:45	8.24	After	installing	pump				
13:55	8.35	30.78	639	1.15	6.82	-10.7	12.4	350 ↓
14:00	8.36	30.62	782	0.47	6.69	-27.9	5.21	200
14:05	8.33	30.56	844	0.46	6.72	-33.7	3.67	250
14:10	8.34	30.49	860	0.33	6.73	-33.0	2.59	200
14:15	8.34	30.46	865	0.29	6.73	-31.4	1.99	175
		Ready to Sample						

Comments:

Sample Time: 14:48 DUP / MS / MSD /

Water Quality/Appearance: colorless & clear w/ brown flakes

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: VOC, SVOC, SVOC SIM, RMA, VPH, PEST, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-11

Site Name, Location: BMS

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubbing

Date: December 16, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 20.5
Top of Screen (ft from TOC): 10.5
Bottom of Screen (ft from TOC): 20.5
Pump Intake Level (ft from TOC): 15
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 10.82 / 1420
Measured DTB (ft from TOC)/Time: (20.5) / ____
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1446
Time @ Stop Purging: 1516
Time @ Stop Sampling: 1542
Purge Volume (gallons): 2.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1444	10.86		with pump inside					
1446	10.89	28.97	445.0	3.35	7.08	48.5	4.9	300
1451	10.90	27.29	439.0	0.69	6.62	28.4	-0.7	200
1456	10.88	26.89	435.0	0.60	6.60	31.9	-1.7	200
1501	10.88	26.87	432.0	0.52	6.62	35.8	-2.3	200
1506	10.86	26.94	430.0	1.88	6.65	39.5	5.9	200
1511	10.88	26.92	429.0	1.53	6.68	44.4	5.7	200
1516	10.88	26.87	427.0	1.76	6.69	47.3	3.2	200
			Ready to sample					

Comments:
Sample Time: 1542 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear
Sample Analysis: all below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, VPH, LMA, SVOC, EPH, Pest, SWOC SIM

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-38

Site Name, Location: BMS Building 6
Equipment Used: Dedicated pump + tubing

Personnel: J. Del Valle / R. Stuart
Date: December 16, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 14.00
Top of Screen (ft from TOC): 4.0
Bottom of Screen (ft from TOC): 14.0
Pump Intake Level (ft from TOC): ~9
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 5.10 / 1053
Measured DTB (ft from TOC)/Time: 14.00 /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1055
Time @ Stop Purging: 1138
Time @ Stop Sampling: 1207
Purge Volume (gallons): 3.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1055				Start				
1058	5.18	29.80	590.0	1.69	6.39	170.8	89.1	400
1103	5.18	29.85	584.0	0.52	6.47	183.7	72.4	200
1108	5.18	29.88	585.0	0.45	6.50	195.4	26.7	200
1113	5.18	30.13	589.0	0.44	6.51	202.4	19.0	200
1118	5.18	30.17	590.0	0.55	6.52	208.9	15.8	200
1123	5.18	30.13	588.0	0.50	6.51	214.1	12.3	200
1128	5.18	30.11	590.0	0.47	6.51	224.0	8.2	200
1133	5.18	30.13	591.0	0.64	6.51	235.4	3.7	200
1138	5.18	30.18	593.0	0.47	6.51	236.4	3.0	200
			Ready to sample					

Comments:
Sample Time: 1207 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear
Sample Analysis: DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, VPH, LMA, SVOC, EPH, Pest and geochemical samples with methane

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-23

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayo

Equipment Used: Dedicated tubing, bladder & cord decontaminated pump

Date: 12/19/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 13.87
Top of Screen (ft from TOC): 3.57
Bottom of Screen (ft from TOC): 13.57
Pump Intake Level (ft from TOC): ~9
Desired Pumping Rate (Lpm): 0.1 ~ 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.74 / 14:07
Measured DTB (ft from TOC)/Time: 13.87 / ____
Headspace Reading (ppm): 0.2
Time @ Start Purging: 14:18
Time @ Stop Purging: 14:45
Time @ Stop Sampling: 15:32
Purge Volume (gallons): 2.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
14:16	3.71	After installing pump						
14:20	3.88	29.35	614	1.60	7.11	99.4	15.0	250
14:25	3.82	28.82	619	0.35	6.72	89.4	8.46	175
14:30	3.78	28.96	611	0.39	6.69	78.5	5.8	150
14:35	3.79	29.20	607	0.30	6.69	70.5	4.76	150
14:40	3.77	29.30	606	0.29	6.68	65.7	4.17	150
14:45	3.78	29.42	605	0.28	6.68	62.4	4.86	150
		Ready to Sample						

Comments:

Sample Time: 15:32 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear & colorless

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, PEST, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-9

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Reyes

Equipment Used: Dedicated tubing, cord, and bladder. decontaminated pump

Date: 12/19/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 20.6
Top of Screen (ft from TOC): 10.6
Bottom of Screen (ft from TOC): 20.6
Pump Intake Level (ft from TOC): ~16
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 6.26 / 11:16
Measured DTB (ft from TOC)/Time: 20.6 /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 11:29
Time @ Stop Purging: 12:14
Time @ Stop Sampling: 12:49
Purge Volume (gallons): 3.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
11:29	6.31	After	Installing	Pump				
11:34	6.47	27.38	936	1.84	6.46	155.3	17	175
11:39	6.49	27.05	928	0.74	6.44	31.9	9.6	175
11:44	6.45	26.95	922	0.49	6.45	16.0	-25	175
11:49	6.45	26.96	918	0.43	6.45	10.7	79.1	175
11:54	6.45	27.03	917	0.40	6.46	9.0	62.3	175
11:59	6.43	27.07	915	0.36	6.45	8.3	51.6	175
12:04	6.45	27.07	912	0.34	6.45	7.9	39.0	200
12:09	6.45	27.07	908	0.34	6.44	7.2	32.0	200
12:14	6.45	27.13	903	0.32	6.44	6.6	32.2	200
		Ready	to	Sample				

Comments:

Sample Time: 12:49 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: brown & turbid

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-5

Site Name, Location: BMS Tank Farm **Personnel:** J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + intake + bladder, cord **Date:** December 19, 2006.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 15.3
Top of Screen (ft from TOC): 5.3
Bottom of Screen (ft from TOC): 15.3
Pump Intake Level (ft from TOC): ~8
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 0930 / 1012
Measured DTB (ft from TOC)/Time: (15.3) / ____
Headspace Reading (ppm): 0.5
Time @ Start Purging: 1038
Time @ Stop Purging: 1125
Time @ Stop Sampling: 1320
Purge Volume (gallons): 1.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1038				Start				
1040	1042	29.07	1,788	2.68	6.41	94.6	4.3	100
1045	1051	29.20	1,991	2.30	6.41	18.5	-1.0	150
1050	1051	29.23	1,841	2.12	6.43	-2.3	-2.7	100
1055	1051	29.19	1,660	2.07	6.45	-14.8	-3.7	100
1100	1051	29.15	1,436	1.97	6.47	-25.8	-4.5	100
1105	1051	29.26	1,295	1.82	6.49	-33.3	-5.0	100
1110	1051	29.35	1,181	1.68	6.49	-38.7	-5.1	100
1115	1051	29.40	1,110	1.72	6.50	-42.5	-5.3	100
1120	1051	29.49	1,057	1.64	6.51	-45.0	-5.4	100
1125	1051	29.51	1,078	1.58	6.51	-47.0	-5.4	100
			Ready to sample					

Comments:

Sample Time: 1320 DUP ____ MS ____ MSD ____ Water Quality/Appearance: turbid to clear

Sample Analysis: See below DUP ____ MS ____ MSD ____

Additional Comments: VOC, VPH, LMA, SVOC, EPH, Pesticides, methane, geochemical analysis

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-3

Site Name, Location: BMS Tank Farm

Personnel: I Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubbing

Date: December 19, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 16.8
Top of Screen (ft from TOC): 6.8
Bottom of Screen (ft from TOC): 16.8
Pump Intake Level (ft from TOC): ~10
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 8.60 / 1450
Measured DTB (ft from TOC)/Time: (16.8) / ____
Headspace Reading (ppm): 2.2
Time @ Start Purging: 1458
Time @ Stop Purging: 1526
Time @ Stop Sampling: 1607
Purge Volume (gallons): 1.00

Time	DTW (ft TOC)	Temp (C)	S.Cond. (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1458				Start				
1501	8.78	28.98	760.0	3.02	6.61	131.2	145.0	100
1506	8.88	28.73	990.0	1.31	6.24	124.3	295.0	100
1511	8.88	28.21	1,036.0	0.75	6.20	75.0	136.1	100
1516	8.88	28.12	1,009.0	0.54	6.21	39.5	138.5	100
1521	8.88	28.30	992.0	0.48	6.22	22.3	114.2	100
1526	8.88	28.39	983.0	0.41	6.23	14.8	114.4	100
		28.35	976.0	0.40	6.22	13.1	110.3	
			Ready to sample					

Comments:

Sample Time: 1607 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear
Sample Analysis: See below DUP ____ MS ✓ MSD ✓

Additional Comments: Flakes were observed while sampling. According to the YSI, the turbidity stabilized at 114.4 NTU, but water is clear.
VOC, SVOC, SVOC SIM, DMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-15

Site Name, Location: BMS, Tank Farm
Equipment Used: Dedicated pump + tubing

Personnel: J. Del Valle / R. Stuart
Date: December 20, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 17.50
Top of Screen (ft from TOC): 7.5
Bottom of Screen (ft from TOC): 17.5
Pump Intake Level (ft from TOC): -12
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.51 / 1041
Measured DTB (ft from TOC)/Time: (17.5) /
Headspace Reading (ppm): 0.2
Time @ Start Purging: 1050
Time @ Stop Purging: 1118
Time @ Stop Sampling: 1205
Purge Volume (gallons): 1.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1050	4.51		Start					
1052			Stop					
1056			Resume					
1058	4.55	29.65	473.0	2.11	6.78	22.7	33.9	100
1103	4.55	30.02	488.0	0.86	6.82	-66.4	7.6	200
1108	4.55	30.01	488.0	0.74	6.89	-81.6	3.7	100
1113	4.55	29.95	490.0	0.68	6.91	-87.9	0.3	100
1118	4.55	30.00	486.0	0.53	6.93	-91.4	-2.4	100
			Ready to sample					

Comments:
Sample Time: 1134 DUP 1150 MS 1205 MSD 1205 Water Quality/Appearance: clear
Sample Analysis: See below DUP – MS See below MSD see below

Additional Comments: Purging was stopped due to unclog the pump.

VOC, SVOC, SVOC SIM, LMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-14

Site Name, Location: BMS Tank Farm **Personnel:** J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubing + cord **Date:** December 20, 2016

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 15.8
Top of Screen (ft from TOC): 5.8
Bottom of Screen (ft from TOC): 15.8
Pump Intake Level (ft from TOC): ~11
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.55 / 1250
Measured DTB (ft from TOC)/Time: 15.8 / ____
Headspace Reading (ppm): 0.6
Time @ Start Purging: ~~1052~~ 1252
Time @ Stop Purging: 1353
Time @ Stop Sampling: 1411
Purge Volume (gallons): 2.00

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1052			Start					
1054			Stop					
1307			Resume					
1308	3.68	31.27	376.0	2.33	6.66	11.7	78.8	50 ↑
1313	3.68	31.18	381.0	2.33	6.59	1.4	75.9	125
1318	3.68	30.42	405.0	3.17	6.52	-3.8	69.8	100
1323	3.68	30.41	411.0	2.07	6.51	-10.4	64.3	100
1328	3.68	30.54	412.0	1.08	6.52	-20.4	62.3	100
1333	3.68	30.60	414.0	0.96	6.52	-24.9	36.5	100
1338	3.68	30.87	416.0	0.86	6.52	-27.9	31.1	100
1343	3.68	30.80	419.0	0.74	6.52	-31.0	26.8	100
1348	3.68	30.68	419.0	0.67	6.52	-32.1	24.7	100
1353	3.68	30.60	419.0	0.61	6.52	-33.0	25.3	100
			Ready to sample					

Comments:

Sample Time: 1411 DUP / MS / MSD / Water Quality/Appearance: Cloudy

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: Stop at 1054 due to pump complication
Flakes were observed during sampling
VOC, SVOC, SVOC SIM, VPH, LMA, EDB

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-18

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Rayes

Equipment Used: Dedicated Pump, bladder, cord, & tubing

Date: 12/20/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 14.0
Top of Screen (ft from TOC): 4.0
Bottom of Screen (ft from TOC): 14.0
Pump Intake Level (ft from TOC): ~9
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 3.64 / 12:51
Measured DTB (ft from TOC)/Time: 14 / ____
Headspace Reading (ppm): 0.2
Time @ Start Purging: 13:01
Time @ Stop Purging: 13:28
Time @ Stop Sampling: ____
Purge Volume (gallons): 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
12:59	3.62	After	lifting	pump				
13:03	3.75	29.27	664	0.75	6.63	-57.5	-41	200
13:08	3.73	29.21	506	0.98	6.93	-64.4	42.6	180
13:13	3.74	29.16	530	0.99	6.88	-57.7	31.8	180
13:18	3.73	29.16	525	0.99	6.90	-58.6	21.7	200
13:23	3.73	29.15	515	0.97	6.94	-57.2	20.6	156
13:28	3.74	29.20	506	0.84	6.96	-53.8	19.7	200
		Ready to Sample						

Comments:
Sample Time: 14:13 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: cloudy & brown
Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments:
VOC, SVOC, SVOCSIM, LMA, VPH, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW -17

Site Name, Location: BMS Humacao PR

Personnel: N. Rivera H. Reyes

Equipment Used: Dedicated pump, cord, tubing, & bladder

Date: 12/20/16

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 13.7
Top of Screen (ft from TOC): 3.7'
Bottom of Screen (ft from TOC): 13.7
Pump Intake Level (ft from TOC): ~8
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.18 / 10:47
Measured DTB (ft from TOC)/Time: 4.1 /
Headspace Reading (ppm): 13.7
Time @ Start Purging: 10:55
Time @ Stop Purging: 11:19
Time @ Stop Sampling:
Purge Volume (gallons): 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
10:54	4.04	After	raising	pump				
10:57	4.07	29.20	322	0.70	6.75	13.0	8.50	150
11:02	4.08	29.23	317	0.21	6.71	-49.4	4.24	100 ↑
11:07	4.09	29.30	318	0.11	6.70	-57.6	4.24	200
11:12	4.08	29.37	316	0.08	6.70	-62.1	3.75	200
11:17	4.08	29.36	313	0.10	6.72	-65.5	3.58	200

Comments:

Sample Time: 11:49 DUP 12:05 MS / MSD / Water Quality/Appearance: clear/colorless

Sample Analysis: see below DUP / MS / MSD /

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: BR-1

Site Name, Location: BMS, Hurmaceo

Personnel: N. Risen

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 21, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 12.8

Top of Screen (ft from TOC): 2.8

Bottom of Screen (ft from TOC): 12.8

Pump Intake Level (ft from TOC): 17

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.96 / 1147

Measured DTB (ft from TOC)/Time: 12.8 /

Headspace Reading (ppm): 62.1

Time @ Start Purging: 1151

Time @ Stop Purging: 1220

Time @ Stop Sampling: 1334

Purge Volume (gallons): 1.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1150	5.06	After installing pump						
1151	start							
1200	5.13	30.43	757	1.26	6.99	-71.1	8.10	100
1205	5.14	30.70	756	0.96	7.00	-82.7	6.68	100
1210	5.15	30.96	759	0.95	7.00	-86.9	6.48	100
1215	5.15	31.11	759	0.76	7.01	-91.5	5.07	100
1220	5.15	31.15	759	0.68	7.01	-91.4	4.46	150
1225								
			Ready to sample					

Comments:

Sample Time: 1254 DUP 1336 MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP see below MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: BR-2

Site Name, Location: BMS

Personnel: J. Del Valle / R. Strait

Equipment Used: Dedicated pump + tubing + cont decontaminates pump

Date: December 21, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 12.80
Top of Screen (ft from TOC): 2.8
Bottom of Screen (ft from TOC): 12.8
Pump Intake Level (ft from TOC): ~9
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 5.90 / 1120
Measured DTB (ft from TOC)/Time: (12.80) / 0.0
Headspace Reading (ppm):
Time @ Start Purging: 1128
Time @ Stop Purging: 1158
Time @ Stop Sampling: 1250
Purge Volume (gallons): ~~1.8~~ 1.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1120	5.90		with the pump inside					
1128			Start					
1133	5.97	28.58	1,171.0	2.66	6.92	-7.2	-23.6	100
1138	5.99	28.61	1,179.0	1.54	6.95	-50.1	-24.8	150
1143	5.99	28.63	1,155.0	1.41	6.97	-62.4	-25.1	150
1148	6.02	28.62	1,115.0	1.29	6.98	-66.8	-25.4	150
1153	6.02	28.56	1,067.0	1.12	6.98	-69.7	-25.5	150
1158	6.02	28.60	1,051.0	1.20	6.98	-71.9	-25.8	150
			Ready to sample					

Comments:

Sample Time: 1250 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, SVOC, SVOC SIM, LMA, VPH, EPH + geochem

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: BR - 3

Site Name, Location: BMS Bayle

Personnel: J. Del Valle / R. Stuart

Equipment Used: dedicated bladder pump + tubing + cont decontaminated pump

Date: December 21, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC
Depth to Bottom (ft from TOC): 12.6
Top of Screen (ft from TOC): 2.6
Bottom of Screen (ft from TOC): 12.6
Pump Intake Level (ft from TOC): ~10
Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.93 / 1319
Measured DTB (ft from TOC)/Time: (12.6) / ____
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1327
Time @ Stop Purging: 1407
Time @ Stop Sampling: 1454
Purge Volume (gallons): 0.75

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1327	4.75			Start				
1332	5.12	29.32	947.0	3.46	7.14	101.7	-16.0	75
1337	5.13	29.27	945.0	2.17	7.04	108.3	-16.2	75
1342	5.55	29.25	940.0	1.25	6.98	123.0	-18.5	75
1347	5.58	29.27	937.0	1.20	6.97	138.2	-20.7	75
1352	5.62	29.30	934.0	1.25	6.96	147.5	-20.7	50
1357	5.65	29.30	935.0	1.61	6.95	160.2	-19.8	100
1403	5.70	29.30	938.0	1.70	6.96	159.1	-19.8	100
1407	5.70	29.32	939.0	1.70	6.96	156.3	-19.3	100
			Ready to sample					

Comments:

Sample Time: 1454 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: Clear

Sample Analysis: See below DUP ____ MS ____ MSD ____

Additional Comments: VOC, SVOC, SVOC SIM, 1-MA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: BR-4

Site Name, Location: BMS Humacao

Personnel: N Rivera

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 21, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 16.25

Top of Screen (ft from TOC): 5.95

Bottom of Screen (ft from TOC): 15.95

Pump Intake Level (ft from TOC): ~10

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 5.97 / 1337

Measured DTB (ft from TOC)/Time: 16.25 / ____

Headspace Reading (ppm): 0.0

Time @ Start Purging: 1356

Time @ Stop Purging: 1421

Time @ Stop Sampling: 1512

Purge Volume (gallons): 1

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1356	4.60	After	installing	the	pump	START		
1401	5.86	29.96	522	2.14	8.79	29.1	22.2	150
1406	6.25	29.99	521	0.92	8.83	20.3	22.8	100
1411	6.81	29.96	520	0.79	8.84	18.2	23.1	100
1416	7.42	30.09	521	0.60	8.85	17.4	22.4	100
1421	7.82	30.14	521	0.58	8.85	15.4	24.2	100
			Ready	to	Sample			

Comments:

Sample Time: 1512 DUP / MS / MSD /

Sample Analysis: See below DUP / MS / MSD /

Water Quality/Appearance: turbid

Additional Comments: After collecting VOCs & SVOC & SVOC SIM, needed to lower the pump since the WL WAS getting lower

VOC, SVOC, SVOC SIM, LMA, VPH, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-16

Site Name, Location: BMS.

Personnel: D. Lindstrand / R. Stuart

Equipment Used: Dedicated pump + tubing + cord

Date: December 22, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC

Depth to Bottom (ft from TOC): 16.4

Top of Screen (ft from TOC): 6.4

Bottom of Screen (ft from TOC): 16.4

Pump Intake Level (ft from TOC): ~1

Desired Pumping Rate (Lpm): 0.1 - 0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 6.20 / 1406

Measured DTB (ft from TOC)/Time: 16.4 / ____

Headspace Reading (ppm): 0.0

Time @ Start Purging: 1410

Time @ Stop Purging: 1456

Time @ Stop Sampling: 1522

Purge Volume (gallons): 2.25

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1410	6.23			Start				
1411	6.23	30.60	553.0	4.38	6.87	132.9	212.4	200
1416	6.34	30.97	726.0	1.47	7.45	138.9	81.2	400 ↓
1421	6.19	30.84	717.0	1.34	7.32	161.4	29.7	200
1426	6.26	30.69	708.0	1.27	7.23	172.4	11.0	150
1431	6.24	30.59	704.0	1.38	7.19	176.1	9.6	125
1436	6.24	30.69	699.0	1.33	7.15	175.9	12.2	150
1441	6.24	30.62	693.0	1.35	7.10	169.8	15.4	150
1446	6.24	30.75	685.0	1.19	7.05	152.8	15.5	100
1451	6.24	30.70	683.0	1.34	7.04	143.9	15.3	100
1456	6.24	30.66	681.0	1.34	7.03	143.9	15.2	100
			Ready to sample					

Comments:

Sample Time: 1504 DUP ✓ MS 1513 MSD 1522 Water Quality/Appearance: clear

Sample Analysis: see below DUP ✓ MS See below MSD See below

Additional Comments: VOC, VPH, LMA, SVOC, EPH, SVOC SIM

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-20D

Site Name, Location: BMS ~~bldg~~

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated pump + tubing + cord decontaminated pump

Date: December 22, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC / SS

Depth to Bottom (ft from TOC): 22.09

Top of Screen (ft from TOC): 11.79

Bottom of Screen (ft from TOC): 21.79

Pump Intake Level (ft from TOC): ~17

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.38 / 1138

Measured DTB (ft from TOC)/Time: (22.09) / ____

Headspace Reading (ppm): 0.3

Time @ Start Purging: 1345

Time @ Stop Purging: 1458

Time @ Stop Sampling: 1522

Purge Volume (gallons): 2.50

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1153	4.38		with pump inside					
1345				Start				
1348	4.40	30.03	696.0	10.48	6.95	60.0	64.6	175
1353	4.40	29.57	724.0	8.81	6.85	-32.4	85.2	200
1358	4.41	30.31	721.0	8.27	6.88	-45.1	84.1	100
1403	4.41	30.05	716.0	8.05	6.87	-44.9	81.1	100
1408	4.41	29.49	708.0	7.70	6.85	-41.1	79.2	100
1413	4.41	29.47	703.0	7.50	6.85	-39.2	70.8	100
1418	4.41	29.58	697.0	7.21	6.84	-36.1	55.3	100
1423	4.40	29.73	693.0	6.99	6.84	-35.0	50.2	100
1428	4.40	29.83	690.0	6.75	6.81	-34.0	34.3	100
1433	4.39	29.58	687.0	6.69	6.80	-32.5	26.7	100
1438	4.39	29.44	683.0	6.52	6.78	-30.2	20.9	100
1443	4.39	29.56	685.0	6.35	6.77	-30.1	18.1	100
1448	4.39	29.31	687.0	6.22	6.76	-29.6	11.2	100
1453	4.39	28.92	688.0	6.12	6.75	-29.5	10.7	100
1458	4.39	29.30	692.0	6.08	6.75	-30.4	10.3	100
				Ready	to sample			

Comments:

Sample Time: 1522 DUP ✓ MS ✓ MSD ✓

Water Quality/Appearance: Clear

Sample Analysis: See below DUP ✓ MS ✓ MSD ✓

Additional Comments: VOC, VPH, LMA, SVOC, EPH, PEST

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-20S

Site Name, Location: BMS

Personnel: J. Del Valle / R. Stuart

Equipment Used: Dedicated bladder pump + tubbing + cord decontaminated pump

Date: December 22, 2016.

Monitoring Well Information:

Diameter/Material: 2" / PVC

Depth to Bottom (ft from TOC): 16.09

Top of Screen (ft from TOC): 5.80

Bottom of Screen (ft from TOC): 15.80

Pump Intake Level (ft from TOC): ~ 11

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 4.50 / 1120

Measured DTB (ft from TOC)/Time: (16.10) / ____

Headspace Reading (ppm): 0.2

Time @ Start Purging: 1134

Time @ Stop Purging: 1223

Time @ Stop Sampling: 1311

Purge Volume (gallons): 2.0

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1134	4.53			Start				
1143	4.55	29.63	544.0	10.81	6.46	211.6	5.7	150
1148	4.58	29.32	536.0	9.01	6.39	269.3	31.4	150
1153	4.58	29.22	546.0	8.40	6.40	279.1	15.1	150
1158	4.56	29.18	545.0	8.01	6.42	276.7	1.0	150
1203	4.56	29.06	541.0	7.73	6.43	273.0	-6.3	150
1208	4.56	29.15	539.0	7.36	6.44	267.3	-8.8	150
1213	4.56	29.26	538.0	7.04	6.45	259.8	-9.6	150
1218	4.56	29.18	538.0	6.85	6.45	256.3	-9.9	150
1223	4.54	29.10	540.0	6.81	6.45	254.1	-9.9	150
			Ready to sample					

Comments:

Sample Time: 1311 DUP ____ MS ____ MSD ____ Water Quality/Appearance: turbided

Sample Analysis: see below DUP ____ MS ____ MSD ____

Additional Comments: VOC, VPH, LMA, SVOC, EPH, Pest, methane, geochemicals samples.

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: RA-10/11S

Site Name, Location: BMS

Personnel: N. Rivera / H. Rogers

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 22, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 14.42

Top of Screen (ft from TOC): 4.12

Bottom of Screen (ft from TOC): 14.12

Pump Intake Level (ft from TOC): ~8

Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 5.54 / 1451

Measured DTB (ft from TOC)/Time: (14.42) /

Headspace Reading (ppm): 0.1

Time @ Start Purging: 15.00

Time @ Stop Purging: 1523

Time @ Stop Sampling: 1604

Purge Volume (gallons): 2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1455 ~~5.5~~	5.55	After installing		pump / hosing				
1500	Start							
1503	5.65	28.79	681	1.14	6.80	70.3	20.8	350 +
1508	5.63	28.65	676	0.48	6.70	57.8	4.78	250 +
1513	5.63	28.54	6.71	0.42	6.68	48.3	2.04	200
1518	5.63	28.61	6.71	0.42	6.68	44.9	1.82	200
1523	5.63	28.53	672	0.37	6.68	42.6	1.34	200
			READY	to sample				

Comments:

Sample Time: 1604 DUP / MS / MSD /

Water Quality/Appearance: clear

Sample Analysis: See below DUP / MS / MSD /

Additional Comments: Collected Geo-Chem sample

VOC, SVOC, SVOC SIM, LMA, VPH, PEDI, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: RA-10D

Site Name, Location: BMS

Personnel: N. Rivera / H. Rogers

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 22, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC

Depth to Bottom (ft from TOC): 22.25

Top of Screen (ft from TOC): 11.95

Bottom of Screen (ft from TOC): 21.95

Pump Intake Level (ft from TOC): ~17

Desired Pumping Rate (Lpm): 0.1-0.7

Well Purging Information:

Measured DTW (ft from TOC)/Time: 5.39 / 1121

Measured DTB (ft from TOC)/Time: (22.25) /

Headspace Reading (ppm): 0.2

Time @ Start Purging: 1134

Time @ Stop Purging: 1201

Time @ Stop Sampling: 1445

Purge Volume (gallons): 2

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1130	5.39	After installing the pump/tubing						
1134	START							
1141	5.48	28.94	721	1.62	6.64	23.9	45.8	200 +
1146	5.48	28.59	708	0.66	6.65	-27.7	60.2	100
1151	5.48	28.47	686	0.53	6.65	-33.2	68.1	150
1156	5.48	28.39	671	0.50	6.65	-35.7	62.0	150
1201	5.48	28.43	667	0.49	6.65	-37.7	61.6	150
			Ready to sample					

Comments:

Sample Time: 1239 DUP ✓ MS 1409 MSD 1445 Water Quality/Appearance: Cloudy

Sample Analysis: see below DUP see below MS see below MSD

Additional Comments: NC odor

VOC, SVOC, SVOC SIM, LMP, VPH, PEST, EPH

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: MW-19

Site Name, Location: BMS

Personnel: N. Rivera

Equipment Used: dedicated bladder, tubing, cord decontaminated pump

Date: Dec 23, 2016

Monitoring Well Information:

Diameter/Material: 2 / PVC
Depth to Bottom (ft from TOC): 14.31
Top of Screen (ft from TOC): 4.01
Bottom of Screen (ft from TOC): 14.01
Pump Intake Level (ft from TOC): ~9
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 1.56 / 1324
Measured DTB (ft from TOC)/Time: (14.31) /
Headspace Reading (ppm): 1587
Time @ Start Purging: 1339
Time @ Stop Purging: 1413
Time @ Stop Sampling: 1458
Purge Volume (gallons): 3

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1324	1.56	After installing pump/tubing						
1339	START							
1343	1.64	29.60	437	0.56	6.88	-66.2	49.9	150
1348	1.64	29.55	441	0.41	6.88	-69.1	43.6	150
1353	1.64	29.55	444	0.35	6.87	-70.5	26.7	175
1358	1.64	29.51	447	0.27	6.87	-71.3	11.4	200
1403	1.64	29.49	449	0.26	6.86	-73.9	8.14	200
1408	1.64	29.46	449	0.24	6.86	-74.6	7.31	200
1413	1.64	29.54	450	0.22	6.85	-70.9	4.78	200
1418								

Comments:

Sample Time: 1458 DUP / MS / MSD / Water Quality/Appearance: clear

Sample Analysis: All below DUP / MS / MSD /

Additional Comments: VOC, SVOC, SVOC, SIM, EPH, LMA, VPH + GeoChem
Has VOC odor

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**

AMAI Well Purging and Low Flow Sampling Form

Well Number: S-40D

Site Name, Location: BMS

Personnel: N. Rivers

Equipment Used: dedicated bladder, tubing, 1

Date: Dec 23, 2016

Monitoring Well Information:

Diameter/Material: 2, PVC/SS
Depth to Bottom (ft from TOC): 35.40
Top of Screen (ft from TOC): 25.10
Bottom of Screen (ft from TOC): 35.10
Pump Intake Level (ft from TOC): -30
Desired Pumping Rate (Lpm): 0.1-0.4

Well Purging Information:

Measured DTW (ft from TOC)/Time: 11.92 / 1109
Measured DTB (ft from TOC)/Time: (35.40) /
Headspace Reading (ppm): 0.0
Time @ Start Purging: 1118
Time @ Stop Purging: 1203
Time @ Stop Sampling: 1210
Purge Volume (gallons): 1.5

Time	DTW (ft TOC)	Temp (C)	S.Cond (µS/cm)	DO (mg/l)	pH	ORP (mV)	Turbidity (NTU)	Flow (mL/min)
1116	11.62	After	installing	pump /	hosing			
1118	START							
1138	12.26	27.95	902	2.45	7.27	167.7	4.04	200
1143	12.26	27.57	917	1.04	7.22	156.2	5.41	200
1148	12.26	27.43	920	0.70	7.23	144.2	5.91	150
1153	12.23	27.50	919	0.55	7.24	135.1	5.60	150
1158	12.23	27.48	920	0.52	7.24	130.2	5.36	150
1203	12.24	27.44	919	0.50	7.24	125.7	5.87	150
			Ready to sample					

Comments:
Sample Time: 1210 DUP ✓ MS ✓ MSD ✓ Water Quality/Appearance: clear
Sample Analysis: VOC, only DUP ✓ MS ✓ MSD ✓

Additional Comments:

Well Stabilization : is considered to be achieved when three consecutive readings, taken at 5 minute intervals are within the following limits: **DO +/- 0.3 mg/L; Spec. Cond. +/-3%; Temp. +/-3%; pH +/- 0.1 unit; ORP +/-10 mV; Addn'l Guidelines: Drawdown <= 0.33 feet; Pumping rates = 100 to 400 ml/min; Turbidity +/-10% or < 10 NTU.**