SDG COVER PAGE

Lab Name: Alliance Technical Group, LLC Contract: 68HERH20D0011

Lab Code: ACE Case No.: 51879 MA No.: SDG No.: MBHM98

SOW No. : SFAM01.1

EPA Sample No.	Lab Sample Id	Analysis Method ICP-AES	ICP-MS	Mercury	Cyanide
MBHM98	P5126-01	X			
MBHM99	P5126-02	X			
MBHMA0	P5126-03	X			
MBHMA0D	P5126-04	X			
MBHMA0S	P5126-05	X			
MBHMA1	P5126-06	X			
MBHMA2	P5126-07	X			
MBHMA3	P5126-08	X			
MBHMA4	P5126-09	X			
MBHMA5	P5126-10	X			
MBHMA6	P5126-11	X			
MBHMA7	P5126-12	X			
MBHMF2	P5126-13	X			
MBHMF3	P5126-14	X			
MBHMM8	P5126-15	X			
MBHMM9	P5126-16	X			

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the SDG Narrative. All edits and manual integrations have been peer-reviewed. Release of the data contained in this hardcopy Complete SDG File and in the electronic data submitted has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature: Name:

Date: Title:

68HERH20D0011

SDG # MBHM98

USEPA CLP COC (LAB COPY)

DateShipped: 12/4/2024

CarrierName: FedEx

AirbillNo: 7704 9476 4765

CHAIN OF CUSTODY RECORD

Case #: 51879

Cooler #: 3

No: 2-120424-124345-0048

Lab: Alliance Technical Group LLC

Lab Contact: Mohammad Ahmed

Lab Phone: 908-789-8900

Sample Identifier	CLP Sample No.	Matrix/Sampler	Coll. Method	Analysis/Turnaround (Days)	Tag/Preservative/Bottles	Location	Collection Date/Time	For Lab Use Only
P133-SB-11-Z00-02	MBHM98	Soil/		ICP-AES(35)	1955 (Wet ice < 6 C) (1)	P133-SB-11	11/26/2024 12:20	
P133-SB-11-Z02-06	MBHM99	Soil/		ICP-AES(35)	1956 (Wet ice < 6 C) (1)	P133-SB-11	11/26/2024 12:20	
P133-SB-11-Z06-12	MBHMA0	Soil/		ICP-AES(35)	1957 (Wet ice < 6 C) (1)	P133-SB-11	11/26/2024 12:20	✓
P133-SB-11-Z12-18	MBHMA1	Soil/		ICP-AES(35)	1958 (Wet ice < 6 C) (1)	P133-SB-11	11/26/2024 12:20	
P133-SB-11-Z18-24	MBHMA2	Soil/		ICP-AES(35)	1959 (Wet ice < 6 C) (1)	P133-SB-11	11/26/2024 12:20	
P142-SB-10-Z00-02	MBHMA3	Soil/		ICP-AES(35)	1491 (Wet ice < 6 C) (1)	P142-SB-10	11/19/2024 11:10	
P142-SB-10-Z02-06	MBHMA4	Soil/		ICP-AES(35)	1492 (Wet ice < 6 C) (1)	P142-SB-10	11/19/2024 11:10	
P133-SB-04-Z00-02	MBHMA5	Soil/		ICP-AES(35)	1866 (Wet ice < 6 C) (1)	P133-SB-04	11/26/2024 11:35	
P133-SB-04-Z02-06	MBHMA6	Soil/		ICP-AES(35)	1867 (Wet ice < 6 C) (1)	P133-SB-04	11/26/2024 11:35	
P133-SB-04-Z06-12	MBHMA7	Soil/		ICP-AES(35)	1868 (Wet ice < 6 C) (1)	P133-SB-04	11/26/2024 11:35	

Sample(s) to be used for Lab QC: P133-SB-11-Z06-12 Tag 1957 - Special Instructions: Samples MBHMA0 and MBHMB1 are MS/MSDs. Samples MBHMB9 and MBHMC3 have limited sample mass.	**Shipment for Case Complete? N**
	Samples Transferred From Chain of Custody #
Analysis Key: ICP-AES=CLP Routine - SFAM01.1/LSASD SOP C-109 Metals	

Items/Reason	Relinquished by (Signature and Organization)	Date/Time	Received by (Signature and Organization)	Date/Time	Sample Condition Upon Receipt
1 Cooler	WSP	12/04/24 16:10		1010 12-5-24	IR Gun # 1 2.0 °C
	N/A	12/04/24			Custody Seal Intact
					Temp Blank present

68HERH20D0011

SDG # MBHM98

USEPA CLP COC (LAB COPY)

DateShipped: 12/4/2024

CarrierName: FedEx

AirbillNo: 7704 9476 4765

CHAIN OF CUSTODY RECORD

Case #: 51879

Cooler #: 3

No: 2-120424-124345-0048

Lab: Alliance Technical Group LLC

Lab Contact: Mohammad Ahmed

Lab Phone: 908-789-8900

Sample Identifier	CLP Sample No.	Matrix/Sampler	Coll. Method	Analysis/Turnaround (Days)	Tag/Preservative/Bottles	Location	Collection Date/Time	For Lab Use Only
P142-SB-09-Z24-30	MBHMF2	Soil/		ICP-AES(35)	5552 (Wet ice < 6 C) (1)	P142-SB-09	11/19/2024 10:39	
P142-SB-09-Z30-36	MBHMF3	Soil/		ICP-AES(35)	5553 (Wet ice < 6 C) (1)	P142-SB-09	11/19/2024 10:39	
P133-SB-05-Z18-24-FD	MBHMM8	Soil/		ICP-AES(35)	5558 (Wet ice < 6 C) (1)	P133-SB-05	11/26/2024 11:40	
P142-SB-09-Z24-30-FD	MBHMM9	Soil/		ICP-AES(35)	5559 (Wet ice < 6 C) (1)	P142-SB-09	11/19/2024 10:39	
				N/A				
				12/04/24				

Special Instructions: Samples MBHMA0 and MBHMB1 are MS/MSDs. Samples MBHMB9 and MBHMC3 have limited sample mass.

Shipment for Case Complete? N

Samples Transferred From Chain of Custody #

Analysis Key: ICP-AES=CLP Routine - SFAM01.1/LSASD SOP C-109 Metals

Items/Reason	Relinquished by (Signature and Organization)	Date/Time	Received by (Signature and Organization)	Date/Time	Sample Condition Upon Receipt
1 Cooler	CLP	12/04/24 16:10		1010 12-5-24	IR-Gun #1 2.0° C
			N/A		Custody Seal Intact
			16:10		Temp Blank present

FORM DC-1

SAMPLE LOG-IN SHEET

Lab Name : Alliance Technical Group, LLC		Page 1 of 1
Received By (Print Name) Cassandra Pena		Log-in Date **12/5/2024**
Received By (Signature)		
Case Number 51879	SDG No. MBHM98	MA No. N/A

Remarks:	
1. Custody Seal (s)	Present, Intact
2. Custody Seal Nos.	n/a
3. Traffic Reports/Chain Of Custody Records	Present
4. Airbill	Present
5. Airbill No. and Shipping Container ID No.	770494764765 1
6. Shipping Container Temperature Indicator Bottle	Present
7. Shipping Container Temperature	2.0 Degree C
8. Sample Condition	Intact
9. Sample Tags Sample Tag Numbers	Absent Listed on Traffic Report
10. Does information on Traffic Reports/Chain of Custody Records and Sample Tags agree ?	Yes
11. Date Received at Lab	12/05/2024
12.Time Received	10:10

	EPA Sample #	Aqueous/ Water Sample pH	Corresponding Sample Tag #	Corresponding Assigned Lab #	Remarks: Condition of Sample Shipment, etc.
1	MBHM98	N/A	1955	P5126-01	Intact
2	MBHM99	N/A	1956	P5126-02	Intact
3	MBHMA0	N/A	1957	P5126-03	Intact
4	MBHMA0D	N/A	1957	P5126-04	Intact
5	MBHMA0S	N/A	1957	P5126-05	Intact
6	MBHMA1	N/A	1958	P5126-06	Intact
7	MBHMA2	N/A	1959	P5126-07	Intact
8	MBHMA3	N/A	1491	P5126-08	Intact
9	MBHMA4	N/A	1492	P5126-09	Intact
10	MBHMA5	N/A	1866	P5126-10	Intact
11	MBHMA6	N/A	1867	P5126-11	Intact
12	MBHMA7	N/A	1868	P5126-12	Intact
13	MBHMF2	N/A	5552	P5126-13	Intact
14	MBHMF3	N/A	5553	P5126-14	Intact
15	MBHMM8	N/A	5558	P5126-15	Intact
16	MBHMM9	N/A	5559	P5126-16	Intact
17	N/A	N/A	N/A	N/A	N/A
18	N/A	N/A	N/A	N/A	N/A
19	N/A	N/A	N/A	N/A	N/A
20	N/A	N/A	N/A	N/A	N/A
21	N/A	N/A	N/A	N/A	N/A
22	N/A	N/A	N/A	N/A	N/A
23	N/A	N/A	N/A	N/A	N/A

* Contact SMO and attach record of resolution

Reviewed By		Logbook No.	N/A
Date	12/5/24	Logbook Page No.	N/A

FORM DC-2
COMPLETE SDG FILE (CSF) INVENTORY SHEET

LAB NAME	**Alliance Technical Group, LLC**		
LAB CODE	**ACE**		
CONTRACT NO.	**68HERH20D0011**		
CASE NO.	**51879**	SDG NO.	**MBHM98**
MA NO.		SOW NO.	**SFAM01.1**

All documents delivered in the Complete SDG File must be original documents where possible. (Reference - Exhibit B Section 2.4)

	PAGE NOs: FROM	PAGE NOs: TO	CHECK LAB	CHECK REGION
1 . SDG Cover Page	1	1	✓	
2 . Traffic Report/Chain of Custody Record(s)	2	3	✓	
3 . Sample Log-In Sheet (DC-1)	4	4	✓	
4 . CSF Inventory Sheet (DC-2)	5	7	✓	
5 . SDG Narrative	8	10	✓	
6 . Communication Logs	NA	NA	✓	
7 . Percent Solids Log	11	12	✓	
Analysis Forms and Data (ICP-AES)				
8 . Sample Analysis Data Forms (1A-OR, 1B-OR, and 1-IN) for each sample or sample analysis, laboratory QC as applicable	13	26	✓	
9 . Instrument raw data by instrument in analysis order	27	285	✓	
Other Data				
10 . Standard and Reagent Preparation Logs	286	423	✓	
11 . Original Preparation and Cleanup forms or copies of Preparation and Cleanup Logbooks	424	425	✓	
12 . Original Analysis or Instrument Run forms or copies of Analysis or Instrument Logbooks	426	433	✓	
13 . Performance Evaluation (PE)/Proficiency Testing (PT) Sample Instructions	NA	NA	✓	
14 . Extraction Logs for TCLP and SPLP	NA	NA	✓	
15 . Raw GPC Data	NA	NA	✓	
16 . Raw Florisil Data	NA	NA	✓	
Analysis Forms and Data (ICP-MS)				
17 . Sample Analysis Data Forms (1A-OR, 1B-OR, and 1-IN) for each sample or sample analysis, laboratory QC as applicable	NA	NA	✓	
18 . Instrument raw data by instrument in analysis order	NA	NA	✓	
Other Data				
19 . Standard and Reagent Preparation Logs	NA	NA	✓	
20 . Original Preparation and Cleanup forms or copies of Preparation and Cleanup Logbooks	NA	NA	✓	
21 . Original Analysis or Instrument Run forms or copies of Analysis or Instrument Logbooks	NA	NA	✓	
22 . Performance Evaluation (PE)/Proficiency Testing (PT) Sample Instructions	NA	NA	✓	

	PAGE NOs: FROM	TO	CHECK LAB	REGION
23. Extraction Logs for TCLP and SPLP	NA	NA	✓	
24. Raw GPC Data	NA	NA	✓	
25. Raw Florisil Data	NA	NA	✓	
Analysis Forms and Data (Mercury)				
26. Sample Analysis Data Forms (1A-OR, 1B-OR, and 1-IN) for each sample or sample analysis, laboratory QC as applicable	NA	NA	✓	
27. Instrument raw data by instrument in analysis order	NA	NA	✓	
Other Data				
28. Standard and Reagent Preparation Logs	NA	NA	✓	
29. Original Preparation and Cleanup forms or copies of Preparation and Cleanup Logbooks	NA	NA	✓	
30. Original Analysis or Instrument Run forms or copies of Analysis or Instrument Logbooks	NA	NA	✓	
31. Performance Evaluation (PE)/Proficiency Testing (PT) Sample Instructions	NA	NA	✓	
32. Extraction Logs for TCLP and SPLP	NA	NA	✓	
33. Raw GPC Data	NA	NA	✓	
34. Raw Florisil Data	NA	NA	✓	
Analysis Forms and Data (Cyanide)				
35. Sample Analysis Data Forms (1A-OR, 1B-OR, and 1-IN) for each sample or sample analysis, laboratory QC as applicable	NA	NA	✓	
36. Instrument raw data by instrument in analysis order	NA	NA	✓	
Other Data				
37. Standard and Reagent Preparation Logs	NA	NA	✓	
38. Original Preparation and Cleanup forms or copies of Preparation and Cleanup Logbooks	NA	NA	✓	
39. Original Analysis or Instrument Run forms or copies of Analysis or Instrument Logbooks	NA	NA	✓	
40. Performance Evaluation (PE)/Proficiency Testing (PT) Sample Instructions	NA	NA	✓	
41. Extraction Logs for TCLP and SPLP	NA	NA	✓	
42. Raw GPC Data	NA	NA	✓	
43. Raw Florisil Data	NA	NA	✓	

	PAGE NOs: FROM	TO	CHECK LAB	REGION
Additional				
44. EPA Shipping/Receiving Documents				
Airbill (No. of Shipments 1)	434	434	✓	
Sample Tags	NA	NA	✓	
Sample Log-In Sheet (Lab)	435	436	✓	
45. Misc. Shipping/Receiving Records (list all individual records)				
	NA	NA	✓	
46. Internal Lab Sample Transfer Records and Tracking Sheets (describe or list)				
	437	437	✓	
47. Other Records and related Communication Logs (describe or list)				
	NA	NA	✓	

48. Comments:

Completed by:
(CLP Lab)

(Signature)	Nimisha Pandya, Document Control Officer (Print Name & Title)	(Date)

Audited by:
(EPA)

(Signature)	(Print Name & Title)	(Date)

284 Sheffield Street
Mountainside, NJ 07092

SDG NARRATIVE

USEPA
SDG # MBHM98
CASE # 51879
CONTRACT # 68HERH20D0011
SOW# SFAM01.1
LAB NAME: Alliance Technical Group, LLC
LAB CODE: ACE
LAB ORDER ID # P5126

A. Number of Samples and Date of Receipt

14 Soil sample were delivered to the laboratory intact on 12/05/2024.

B. Parameters

Test requested for Metals CLP FULL = Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc.

C. Cooler Temp

Indicator Bottle**: Presence/**Absence

Cooler: 2.0^{o}C

D. Detail Documentation (related to Sample Handling Shipping, Analytical Problem, Temp of Cooler etc):

Issue: A "P" or "M" prefix was listed at the beginning of a CLP sample ID.

E. Corrective Action taken for above:

Resolution: To maintain COC integrity, ASB requests no changes to the Sample IDs. The laboratory will note the issue in the SDG Narrative and proceed with the analysis of the samples.

F. Analytical Techniques:

All analyses were based on CLP Methodology by method SFAM01.1.

Inter Element correction factors (IECs) are determined annually and correction factor are applied during ICP-AES analysis.

284 Sheffield Street
Mountainside, NJ 07092

G. Calculation:

Calculation for ICP-AES Soil Sample:

Conversion of Results from mg/L or ppm to mg/kg (Dry Weight Basis):

$$\text{Concentration (mg/kg)} = C \times \frac{Vf}{W \times S} \times DF$$

Where,

C = Instrument value in ppm (The average of all replicate exposures)
Vf = Final digestion volume (mL)
W = Initial aliquot amount (g) (Sample amount taken in prep)
S = % Solids / 100 (Fraction of Percent Solids)
DF = Dilution Factor

Example Calculation For Sample MBHM98 For Antimony:

If C = 0.0398664 ppm
Vf = 100 ml
W = 1.10 g
S = 0.648(64.8/100)
DF = 1

$$\text{Concentration (mg/kg)} = 0.0398664 \times \frac{100}{1.10 \times 0.648} \times 1$$

= 5.59292 mg/kg

= 5.6 mg/kg (Reported Result with Signification

H. QA/ QC

Calibrations met requirements. Interference check met requirements. Blank analyses did not indicate any presence of contamination. Laboratory Control sample was within control limits. Spike sample did meet requirements except for Silver, Thallium. Duplicate sample did meet requirements. Serial Dilution did meet requirements except for Cobalt.

Chemical or physical interference effect was suspected and the data for all affected analytes in the sample received and associated with this serial dilution were flagged.

284 Sheffield Street
Mountainside, NJ 07092

I certify that the data package is in compliance with the terms and conditions of the contract both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Director or his designee, as verified by the following signature.

Signature_____ Name: Nimisha Pandya

Date _____ Title: Document Control Officer

PERCENT SOLID

Supervisor: Iwona
Analyst: jignesh
Date: 12/9/2024

OVENTEMP IN Celsius(°C): 107
Time IN: 13:55
In Date: 12/07/2024
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
OvenID: M OVEN#1

OVENTEMP OUT Celsius(°C): 103
Time OUT: 07:30
Out Date: 12/08/2024
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
BalanceID: M SC-4
Thermometer ID: % SOLID- OVEN

QC: LB133813

Lab ID	Client SampleID	Dish #	Dish Wt(g) (A)	Sample Wt(g)	Dish + Sample Wt(g) (B)	Dish+Dry Sample Wt(g) (C)	% Solid	Comments
P5126-01	MBHM98	1	1.14	8.81	9.95	6.85	64.8	
P5126-02	MBHM99	2	1.16	8.83	9.99	7.49	71.7	
P5126-03	MBHMA0	3	1.12	8.76	9.88	7.79	76.1	
P5126-04	MBHMA0D	4	1.12	8.76	9.88	7.79	76.1	
P5126-05	MBHMA0S	5	1.12	8.76	9.88	7.79	76.1	
P5126-06	MBHMA1	6	1.19	8.57	9.76	7.5	73.6	
P5126-07	MBHMA2	7	1.17	8.39	9.56	7.26	72.6	
P5126-08	MBHMA3	8	1.12	8.53	9.65	7.18	71.0	
P5126-09	MBHMA4	9	1.14	8.44	9.58	7.83	79.3	
P5126-10	MBHMA5	10	1.14	8.84	9.98	7.75	74.8	
P5126-11	MBHMA6	11	1.16	8.37	9.53	7.62	77.2	
P5126-12	MBHMA7	12	1.18	8.73	9.91	8.04	78.6	
P5126-13	MBHMF2	13	1.14	8.48	9.62	8.48	86.6	
P5126-14	MBHMF3	14	1.15	8.83	9.98	8.78	86.4	
P5126-15	MBHMM8	15	1.15	8.74	9.89	8.11	79.6	
P5126-16	MBHMM9	16	1.15	8.50	9.65	8.55	87.1	

$$\% \text{ Solid} = \frac{(C-A) * 100}{(B-A)}$$

WORKLIST(Hardcopy Internal Chain)

WorkList Name : %1-P5126 **WorkList ID :** 186094 **Department :** Wet-Chemistry **Date :** 12-07-2024 10:15:52

1138813

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P5126-01	MBHM98	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-02	MBHM99	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-03	MBHMA0	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-04	MBHMA0D	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-05	MBHMA0S	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-06	MBHMA1	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-07	MBHMA2	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-08	MBHMA3	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-09	MBHMA4	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/19/2024	Chemtech -SO
P5126-10	MBHMA5	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/19/2024	Chemtech -SO
P5126-11	MBHMA6	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-12	MBHMA7	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-13	MBHMF2	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/26/2024	Chemtech -SO
P5126-14	MBHMF3	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/19/2024	Chemtech -SO
P5126-15	MBHMM8	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/19/2024	Chemtech -SO
P5126-16	MBHMM9	Solid	Percent Solids	Cool 4 deg C	USEP01	C53	11/19/2024	Chemtech -SO

Date/Time 12/7/24 13:15

Raw Sample Received by: [signature]

Raw Sample Relinquished by: TD CSM

Date/Time 12/7/24 14:00

Raw Sample Received by: TD CSM

Raw Sample Relinquished by: [signature]