

SDG NARRATIVE

LAB NAME: Alliance Technical Group, LLC CASE: 51860 SDG: YE624 CONTRACT: 68HERH20D0011 LAB CODE: ACE LAB ORDER ID: P5368 MODIFICATION REF. NUMBER: NA

Sample ID	EPA Sample ID	pН
P5368-01	YE624	
P5368-02	YE625	
P5368-03	YE626	
P5368-03DL	YE626DL	
P5368-03DL2	YE626DL2	
P5368-04MS	YE626MS	
P5368-05MSD	YE626MSD	
P5368-06	YE627	
P5368-07	YE628	
P5368-08	YE629	

08 Soil samples were delivered to the laboratory intact on 12/20/2024.

Test requested on the Chain of Custody was Aroclor by Method SFAM01.1.

The temperature of the samples was measured using an I R Gun. The samples temperature was 1.9 degree Celsius for the samples received on 12/20/2024.

Aroclors:

The analyses were performed on instrument GC ECD_R The front column is ZB-MR1 which is 30 meters, 0.32 mm ID, 0.5 um df, Catalogue # 7HM-G016-17. The rear column is ZB-MR2 which is 30 meters, 0.32 mm ID, 0.25 μ m; Catalogue # 7HM-G017-11.

The sample was analyzed on a single injection dual column system. To distinguish the second column analysis from the first column a -2 suffix was added to the file id on the form 1. These refer to forms were both columns are reported. Form 1s for the IBLK and ALCS are referenced as IBLK(1)/IBLK(2), MS(1)/MS(2), MSD(1)/MSD(2) and ALCS01(1)/ALCS01(2) respectively.



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Aroclor sample was extracted by Method SFAM01.1 on 12/23 and 12/26/2024 and analyzed on 12/23 and 12/26/2024, All the samples were subjected to a Sulfuric acid cleanup. The sample was extracted and analyzed within contractual holding time.

The Surrogate recoveries met the acceptable criteria except for YE625 [Decachlorobiphenyl(1) - 29%, Decachlorobiphenyl(2) - 23%], YE626 [Tetrachloro-m-xylene(1) - 162%, Tetrachloro-m-xylene(2) - 1907], YE626DL [Tetrachloro-m-xylene(1) - 179%, Tetrachloro-m-xylene(2) - 1654], YE626DL2 [[Tetrachloro-m-xylene(1) - 0%, Tetrachloro-m-xylene(2) - 0, Decachlorobiphenyl(1) - 0%, Decachlorobiphenyl(2) - 0%], YE626MS [Tetrachloro-m-xylene(2) - 1841%], YE626MSD [Tetrachloro-m-xylene(2) - 1809%], YE627 [Tetrachloro-m-xylene(1) - 258%, Tetrachloro-m-xylene(2) - 4459], YE628 [Tetrachloro-m-xylene(1) - 187%, Tetrachloro-m-xylene(2) - 5264], YE629 [Tetrachloro-m-xylene(1) - 714%, Tetrachloro-m-xylene(2) - 20271], The SOW allows one surrogate to fail to meet the criteria per column. ((Please See Section 11.3.6 of Exhibit D Aroclor Analysis).

YE626MS met the requirements. YE626MSD met the requirements. The RPD met the requirements.

The Laboratory Control Sample met requirements. The Blank analysis did not indicate the presence of lab contamination. The Initial Calibration met the requirements. The Continuing Calibrations met the requirements. The Retention Times were acceptable for all samples.

Samples YE624, YE626, YE626DL, YE626DL2, YE626MS, YE626MSD, YE627, YE628 and YE629 failed to meet the %D for the results between the two columns Criteria.

Sample YE626, YE626DL were diluted due to high concentration.

Samples YE626 GC/MS confirmation run performed and raw data reported in hard copy.

Sample YE627 failed for surrogate from PB165816. Therefore sample was Re-extracted and reanalyzed from PB165849.

See Manual Integration report for the manual integration information at the end of the Case narrative.

Calculation for Concentration in Soil samples:

Concentration ug/Kg (Dry weight basis) = (Ax) (Vt) (DF) (GPC)(CF) (Vi) (Ws) (D)



Where,

Ax = Response (peak area or height) of the compound to be measured. CF = Mean Calibration Factor from the initial calibration (area/ng). Vt = Volume of the concentrated extract in uL Vi = Volume of extract injected (uL). (If a single injection is made onto two columns, use ½ the volume in the syringe as the volume injected onto each column). Ws = Weight of sample extracted (g). D = % dry weight or $\frac{100 - \% \text{Moisture}}{100}$

GPC = Vin = GPC factor (If no GPC is performed, GPC=1) Vout DF = Dilution Factor

Example of AR1260 calculation for Peak 1

Calibration factor Peak 1 100ppb ISTD=	<u>peak area</u>
Column2	Mass injected ng

 $=\frac{28057044}{0.100}$

= 280570440 calibration factor for Peak 1 100ppb

Average of 5 peaks = 235212482

Sample **YE624** Ax = 15527601CF = 235212482Vt = 10000Vi = 1.0Ws = 30.1D = 0.937GPC = 1.0DF = 1.0

Concentration ug/Kg (Dry weight basis) = (Ax) (Vt) (DF) (GPC)(CF) (Vi) (Ws) (D)

 $= \frac{(15527601) (10000) (1.0) (1.0)}{(235212482) (1.0) (30.1) (0.937)}$

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Average of 5 peaks = 19.98

Reported results = 20 ug/kg

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. The laboratory manager or his designee, as verified by the following signature has authorized release of the data contained in this hard copy data package.

Signature _____ Name: Nimisha Pandya.

Date: _____ Title: Document Control Officer.