

December 16, 2022

Tasman Geosciences

Andy Sagen

6855 West 119th Avenue

Broomfield CO 80020

Project Name - KMG - Miller 23-24 Reclamation Project Number - [none]

Attached are your analytical results for KMG - Miller 23-24 Reclamation received by Origins Laboratory, Inc. December 08, 2022. This project is associated with Origins project number Y212196-01.

The analytical results in the following report were analyzed under the guidelines of EPA Methods. These methods are identified as follows; "SW" are defined in SW-846, "EPA" are defined in 40CFR part 136 and "SM" are defined in the most current revision of Standard Methods For the Examination of Water and Wastewater.

The analytical results apply specifically to the samples and analyses specified per the attached Chain of Custody. As such, this report shall not be reproduced except in full, without the written approval of Origin's laboratory.

Unless otherwise noted, the analytical results for all soil samples are reported on a wet weight basis. All analytical analyses were performed under NELAP guidelines unless noted by a data qualifier.

Any holding time exceedances, deviations from the method specifications or deviations from Origins Laboratory's Standard Operating Procedures are outlined in the case narrative.

Thank you for selecting Origins for your analytical needs. Please contact us with any questions concerning this report, or if we can help with anything at all.

Origins Laboratory, Inc.
303.433.1322
o-squad@oelabinc.com



Tasman Geosciences
6855 West 119th Avenue
Broomfield CO 80020

Andy Sagen
Project Number: [none]
Project: KMG - Miller 23-24 Reclamation

CROSS REFERENCE REPORT

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
REC-SS01@3"	Y212196-01	Soil	December 8, 2022 11:30	12/08/2022 16:30
REC-SS02@3"	Y212196-02	Soil	December 8, 2022 11:32	12/08/2022 16:30
REC-SS03@3"	Y212196-03	Soil	December 8, 2022 11:34	12/08/2022 16:30
REC-BG01@1'	Y212196-04	Soil	December 8, 2022 11:36	12/08/2022 16:30
REC-BG02@1'	Y212196-05	Soil	December 8, 2022 11:38	12/08/2022 16:30
REC-BG03@1'	Y212196-06	Soil	December 8, 2022 11:40	12/08/2022 16:30
REC-BG04@3"	Y212196-07	Soil	December 8, 2022 11:42	12/08/2022 16:30

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Origins Laboratory

F-012207-01-R1
 Effective Date: 01/09/12

Sample Receipt Checklist

Origins Work Order: 4212196

Client: Tasman

Client Project ID: Miller 23-24 Reclamation

Checklist Completed by: EHS DE

Shipped Via: HD

(UPS, FedEx, Hand Delivered, Pick-up, etc.)

Date/time completed: 12/18/12

Airbill #: NA

Matrix(s) Received: (Check all that apply): Soil/Solid Water Other: _____

Cooler Number/Temperature: 1/3 °C 1 °C 1 °C (Describe) °C

Thermometer ID: 7004

Requirement Description	Yes	No	N/A	Comments (if any)
If samples require cooling, was the temperature between 0°C to ≤ 6°C ⁽¹⁾ ?	X			
Is there ice present (document if blue ice is used)	X			
Are custody seals present on cooler? (if so, document in comments if they are signed and dated, broken or intact)		X		
Are custody seals present on each sample container? (if so, document in comments if they are signed and dated, broken or intact)		X		
Were all samples received intact ⁽¹⁾ ?	X			
Was adequate sample volume provided ⁽¹⁾ ?	X			
Are short holding time analytes or samples with HTs due within 48 hours present ⁽¹⁾ ?		X		
Is a chain-of-custody (COC) present and filled out completely ⁽¹⁾ ?	X			
Does the COC agree with the number and type of sample bottles received ⁽¹⁾ ?	X			
Do the sample IDs on the bottle labels match the COC ⁽¹⁾ ?	X			
Is the COC properly relinquished by the client with date and time recorded ⁽¹⁾ ?	X			
For volatiles in water – is there headspace (> ¼ inch bubble) present? If yes, contact client and note in narrative.			X	
Are samples preserved that require preservation and was it checked ⁽¹⁾ ? (note ID of confirmation instrument used in comments) / (preservation is not confirmed for subcontracted analyses in order to insure sample integrity)/(pH < 2 for samples preserved with HNO ₃ , HCL, H ₂ SO ₄) / (pH > 10 for samples preserved with NaAsO ₂ +NaOH, ZnAc+NaOH)			X	
Additional Comments (if any):				

⁽¹⁾ If NO, then contact the client before proceeding with analysis and note date/time and person contacted as well as the corrective action to in the additional comments (above) and the case narrative.

[Signature]
 Reviewed by (Project Manager)

12/08/2012
 Date/Time Reviewed

Origins Laboratory, Inc.

Jefe Pellegrini

Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS01@3"
12/8/2022 11:30:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-01 (Soil)

Boron (DTPA Sorbitol)

Boron	0.504		0.0992	mg/L	1	B2L0907	12/09/2022	12/12/2022	
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DRO/ORO by EPA 8015D

Diesel (C10-C28)	117		25.0	mg/kg	1	B2L0831	12/08/2022	12/08/2022	
Residual Range Organics (C28-C40)	ND		100	"	"	"	"	"	U

Surrogate: o-Terphenyl	90.9 %		50-150			"	"	"	
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GBTEX+TMBs by 8260D

1,2,4-Trimethylbenzene	0.00648		0.00200	mg/kg	1	B2L0848	12/08/2022	12/08/2022	
1,3,5-Trimethylbenzene	0.00344		0.00200	"	"	"	"	"	
Benzene	ND		0.00200	"	"	"	"	"	U
Ethylbenzene	ND		0.00200	"	"	"	"	"	U
Toluene	ND		0.00200	"	"	"	"	"	U
Xylenes, total	0.00654		0.00200	"	"	"	"	"	
Gasoline Range Hydrocarbons	0.255		0.200	"	"	"	"	"	

Surrogate: 1,2-Dichloroethane-d4	108 %		70-130			"	"	"	
Surrogate: Toluene-d8	100 %		70-130			"	"	"	

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS01@3"
12/8/2022 11:30:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-01 (Soil)

GBTEX+TMBs by 8260D

Surrogate: 4-Bromofluorobenzene	108 %		70-130			B2L08 48	12/08/2022	12/08/2022	
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Metals by Saturated Paste by EPA 6010

Calcium	5.82		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	2.75		0.823	"	"	"	"	"	
Sodium	33.7		0.435	"	"	"	"	"	

PAH by 8270D SIM

1-Methylnaphthalene	0.154	0.0101	0.0101	mg/Kg	5	L653294	12/12/2022	12/13/2022	
2-Methylnaphthalene	0.285	0.0101	0.0101	"	"	"	"	"	
Acenaphthene	0.0343	0.00335	0.00335	"	"	"	"	"	
Anthracene	ND	0.00335	0.00335	"	"	"	"	"	
Benzo(a)anthracene	0.0116	0.00335	0.00335	"	"	"	"	"	
Benzo(a)pyrene	0.00766	0.00335	0.00335	"	"	"	"	"	
Benzo(b)fluoranthene	0.0122	0.00335	0.00335	"	"	"	"	"	
Benzo(k)fluoranthene	0.0036	0.00335	0.00335	"	"	"	"	"	
Chrysene	0.0293	0.00335	0.00335	"	"	"	"	"	
Dibenz(a,h)anthracene	0.0049	0.00335	0.00335	"	"	"	"	"	
Fluoranthene	0.0096	0.00335	0.00335	"	"	"	"	"	
Fluorene	0.0638	0.00335	0.00335	"	"	"	"	"	
Indeno(1,2,3-cd)pyrene	0.00582	0.00335	0.00335	"	"	"	"	"	
Naphthalene	0.0834	0.0101	0.0101	"	"	"	"	"	

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REC-SS01@3"
12/8/2022 11:30:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Waypoint Analytical, LLC.
Y212196-01 (Soil)

PAH by 8270D SIM

Pyrene	0.0241	0.00335	0.00335	mg/Kg	5	L653294	12/12/2022	12/13/2022	
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Surrogate: 2-Fluorobiphenyl	44.4 %		33-115			"	"	"	
Surrogate: 4-Terphenyl-d14	48 %		33-122			"	"	"	
Surrogate: Nitrobenzene-d5	44.4 %		29-110			"	"	"	

pH in Soil by 9045D

pH	8.31			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	16.3			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	4.12		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Table 915 metals by EPA 6020B

Arsenic	6.42		0.0878	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Barium	2780		8.78	"	"	"	"	"	
Cadmium	0.533		0.0878	"	"	"	"	"	
Copper	15.7		8.78	"	"	"	"	"	

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 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS01@3"
12/8/2022 11:30:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-01 (Soil)

Table 915 metals by EPA 6020B

Lead	11.9		8.78	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Nickel	18.0		8.78	"	"	"	"	"	
Selenium	1.14		0.0878	"	"	"	"	"	
Silver	0.125		0.0878	"	"	"	"	"	
Zinc	ND		87.8	"	"	"	"	"	U

Total Metals by 7196A

Chromium, Hexavalent	ND	1.22	2.51	mg/Kg	5	L653733	12/08/2022	12/14/2022	
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 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS02@3"
12/8/2022 11:32:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-02 (Soil)

Boron (DTPA Sorbitol)

Boron	ND		0.993	mg/L	10	B2L0907	12/09/2022	12/13/2022	U
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DRO/ORO by EPA 8015D

Diesel (C10-C28)	ND		25.0	mg/kg	1	B2L0831	12/08/2022	12/08/2022	U
Residual Range Organics (C28-C40)	ND		100	"	"	"	"	"	U

Surrogate: *o*-Terphenyl 84.2 % 50-150 " " "

GBTEX+TMBs by 8260D

1,2,4-Trimethylbenzene	ND		0.00200	mg/kg	1	B2L0848	12/08/2022	12/08/2022	U
1,3,5-Trimethylbenzene	ND		0.00200	"	"	"	"	"	U
Benzene	ND		0.00200	"	"	"	"	"	U
Ethylbenzene	ND		0.00200	"	"	"	"	"	U
Naphthalene	ND		0.00380	"	"	"	"	"	U
Toluene	ND		0.00200	"	"	"	"	"	U
Xylenes, total	ND		0.00200	"	"	"	"	"	U
Gasoline Range Hydrocarbons	ND		0.200	"	"	"	"	"	U

Origins Laboratory, Inc.



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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS02@3"
12/8/2022 11:32:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-02 (Soil)

GBTEX+TMBs by 8260D

Surrogate: 1,2-Dichloroethane-d4	107 %		70-130			B2L08 48	12/08/2022	12/08/2022	
Surrogate: Toluene-d8	103 %		70-130			"	"	"	
Surrogate: 4-Bromofluorobenzene	105 %		70-130			"	"	"	

Metals by Saturated Paste by EPA 6010

Calcium	25.9		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	12.2		0.823	"	"	"	"	"	
Sodium	36.1		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	8.12			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	8.26			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	6.05		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS03@3"
12/8/2022 11:34:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-03 (Soil)

Boron (DTPA Sorbitol)

Boron	0.541		0.0984	mg/L	1	B2L0907	12/09/2022	12/12/2022	
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DRO/ORO by EPA 8015D

Diesel (C10-C28)	54.4		25.0	mg/kg	1	B2L0831	12/08/2022	12/08/2022	
Residual Range Organics (C28-C40)	104		100	"	"	"	"	"	

Surrogate: o-Terphenyl	86.7 %		50-150			"	"	"	
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GBTEX+TMBs by 8260D

1,2,4-Trimethylbenzene	0.00250		0.00200	mg/kg	1	B2L0848	12/08/2022	12/08/2022	
1,3,5-Trimethylbenzene	0.00286		0.00200	"	"	"	"	"	
Benzene	ND		0.00200	"	"	"	"	"	U
Ethylbenzene	ND		0.00200	"	"	"	"	"	U
Naphthalene	ND		0.00380	"	"	"	"	"	U
Toluene	ND		0.00200	"	"	"	"	"	U
Xylenes, total	ND		0.00200	"	"	"	"	"	U
Gasoline Range Hydrocarbons	ND		0.200	"	"	"	"	"	U

Surrogate: 1,2-Dichloroethane-d4	105 %		70-130			"	"	"	
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Tasman Geosciences
 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-SS03@3"
12/8/2022 11:34:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-03 (Soil)

GBTEX+TMBs by 8260D

Surrogate: Toluene-d8	100 %		70-130			B2L08 48	12/08/2022	12/08/2022	
Surrogate: 4-Bromofluorobenzene	112 %		70-130			"	"	"	

Metals by Saturated Paste by EPA 6010

Calcium	2.91		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	1.62		0.823	"	"	"	"	"	
Sodium	24.0		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	8.42			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	15.9			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	2.95		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG01@1'
 12/8/2022 11:36:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-04 (Soil)

Boron (DTPA Sorbitol)

Boron	0.171		0.100	mg/L	1	B2L0907	12/09/2022	12/12/2022	
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Metals by Saturated Paste by EPA 6010

Calcium	27.6		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	11.6		0.823	"	"	"	"	"	
Sodium	27.3		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	8.03			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	6.17			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	4.94		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Table 915 metals by EPA 6020B

Arsenic	4.45		0.0986	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Barium	1630		9.86	"	"	"	"	"	
Cadmium	0.112		0.0986	"	"	"	"	"	
Copper	ND		9.86	"	"	"	"	"	U

Origins Laboratory, Inc.



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Tasman Geosciences
 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG01@1'
12/8/2022 11:36:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-04 (Soil)

Table 915 metals by EPA 6020B

Lead	ND		9.86	mg/kg	10	B2L0844	12/08/2022	12/08/2022	U
Nickel	ND		9.86	"	"	"	"	"	U
Selenium	0.351		0.0986	"	"	"	"	"	
Silver	ND		0.0986	"	"	"	"	"	U
Zinc	ND		98.6	"	"	"	"	"	U

Total Metals by 7196A

Chromium, Hexavalent	ND	0.502	1.03	mg/Kg	2	L653733	12/08/2022	12/14/2022	
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 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG02@1'

12/8/2022 11:38:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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**Origins Laboratory, Inc.
 Y212196-05 (Soil)**

Boron (DTPA Sorbitol)

Boron	0.513		0.0983	mg/L	1	B2L0908	12/09/2022	12/12/2022	
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Metals by Saturated Paste by EPA 6010

Calcium	26.3		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	11.5		0.823	"	"	"	"	"	
Sodium	22.0		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	8.05			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	5.06			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	4.79		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Table 915 metals by EPA 6020B

Arsenic	3.84		0.0912	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Barium	2740		9.12	"	"	"	"	"	
Cadmium	0.434		0.0912	"	"	"	"	"	
Copper	10.3		9.12	"	"	"	"	"	

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG02@1'
12/8/2022 11:38:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-05 (Soil)

Table 915 metals by EPA 6020B

Lead	9.48		9.12	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Nickel	11.7		9.12	"	"	"	"	"	
Selenium	0.742		0.0912	"	"	"	"	"	
Silver	ND		0.0912	"	"	"	"	"	U
Zinc	ND		91.2	"	"	"	"	"	U

Total Metals by 7196A

Chromium, Hexavalent	ND	1.26	2.58	mg/Kg	5	L653733	12/08/2022	12/14/2022	
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Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG03@1'

12/8/2022 11:40:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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**Origins Laboratory, Inc.
 Y212196-06 (Soil)**

Boron (DTPA Sorbitol)

Boron	0.363		0.0989	mg/L	1	B2L0908	12/09/2022	12/12/2022	
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Metals by Saturated Paste by EPA 6010

Calcium	17.1		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	6.02		0.823	"	"	"	"	"	
Sodium	8.99		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	7.91			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	2.65			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	2.75		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Table 915 metals by EPA 6020B

Arsenic	4.96		0.0929	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Barium	2980		9.29	"	"	"	"	"	
Cadmium	0.290		0.0929	"	"	"	"	"	
Copper	ND		9.29	"	"	"	"	"	U

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG03@1'

12/8/2022 11:40:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
 Y212196-06 (Soil)

Table 915 metals by EPA 6020B

Lead	ND		9.29	mg/kg	10	B2L0844	12/08/2022	12/08/2022	U
Nickel	10.1		9.29	"	"	"	"	"	
Selenium	0.646		0.0929	"	"	"	"	"	
Silver	ND		0.0929	"	"	"	"	"	U
Zinc	ND		92.9	"	"	"	"	"	U

Total Metals by 7196A

Chromium, Hexavalent	ND	0.488	1	mg/Kg	5	L653733	12/08/2022	12/14/2022	
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Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG04@3"

12/8/2022 11:42:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
 Y212196-07 (Soil)

Boron (DTPA Sorbitol)

Boron	0.321		0.101	mg/L	1	B2L0908	12/09/2022	12/12/2022	
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Metals by Saturated Paste by EPA 6010

Calcium	4.78		0.499	meq/L	10	[CALC]	12/09/2022	12/12/2022	
Magnesium	1.32		0.823	"	"	"	"	"	
Sodium	ND		0.435	"	"	"	"	"	

pH in Soil by 9045D

pH	8.13			pH Units	1	B2L0911	12/09/2022	12/10/2022	
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SAR by 20B Saturated Paste

SAR	0.227			SAR	1	B2L0903	12/09/2022	12/12/2022	
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	0.967		0.00500	mmhos/cm	1	B2L0911	12/09/2022	12/10/2022	
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Table 915 metals by EPA 6020B

Arsenic	2.26		0.0942	mg/kg	10	B2L0844	12/08/2022	12/08/2022	
Barium	1360		9.42	"	"	"	"	"	
Cadmium	0.199		0.0942	"	"	"	"	"	
Copper	ND		9.42	"	"	"	"	"	U

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

REC-BG04@3"

12/8/2022 11:42:00AM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc.
Y212196-07 (Soil)

Table 915 metals by EPA 6020B

Lead	ND		9.42	mg/kg	10	B2L0844	12/08/2022	12/08/2022	U
Nickel	ND		9.42	"	"	"	"	"	U
Selenium	0.318		0.0942	"	"	"	"	"	
Silver	ND		0.0942	"	"	"	"	"	U
Zinc	ND		94.2	"	"	"	"	"	U

Total Metals by 7196A

Chromium, Hexavalent	ND	1.23	2.53	mg/Kg	5	L653733	12/08/2022	12/14/2022	
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Tasman Geosciences
 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B2L0831 - EPA 3580										
Blank (B2L0831-BLK1)										
					Prepared: 12/08/2022 Analyzed: 12/08/2022					
Diesel (C10-C28)	ND	25.0	mg/kg							U
Residual Range Organics (C28-C40)	ND	100	"							U
Surrogate: o-Terphenyl	21		"	24.9		83.5	50-150			

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0831 - EPA 3580

LCS (B2L0831-BS1)

Prepared: 12/08/2022 Analyzed: 12/08/2022

Diesel (C10-C28)	972	50.0	mg/kg	1000		97.2	70-130			
Residual Range Organics (C28-C40)	826	200	"	1000		82.6	70-130			
Surrogate: o-Terphenyl	40		"	49.8		80.9	50-150			

Origins Laboratory, Inc.



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Tasman Geosciences
 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0831 - EPA 3580

Matrix Spike (B2L0831-MS1)	Source: Y212188-01			Prepared: 12/08/2022 Analyzed: 12/08/2022						
Diesel (C10-C28)	1010	50.0	mg/kg	1000	ND	101	70-130			
Residual Range Organics (C28-C40)	816	200	"	1000	ND	81.6	70-130			
Surrogate: o-Terphenyl	37		"	49.8		73.6	50-150			

Origins Laboratory, Inc.



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Tasman Geosciences
 6855 West 119th Avenue
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0831 - EPA 3580

Matrix Spike Dup (B2L0831-MSD1)	Source: Y212188-01			Prepared: 12/08/2022 Analyzed: 12/08/2022						
Diesel (C10-C28)	1070	50.0	mg/kg	1000	ND	107	70-130	5.70	35	
Residual Range Organics (C28-C40)	840	200	"	1000	ND	84.0	70-130	2.86	35	
<i>Surrogate: o-Terphenyl</i>	38		"	49.8		75.5	50-150			

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0848 - EPA 5030 (soil)

Blank (B2L0848-BLK1)

Prepared: 12/08/2022 Analyzed: 12/08/2022

1,2,4-Trimethylbenzene	ND	0.00200	mg/kg							U
1,3,5-Trimethylbenzene	ND	0.00200	"							U
Benzene	ND	0.00200	"							U
Ethylbenzene	ND	0.00200	"							U
Naphthalene	ND	0.00380	"							U
Toluene	ND	0.00200	"							U
Xylenes, total	ND	0.00200	"							U
Gasoline Range Hydrocarbons	ND	0.200	"							U
Surrogate: 1,2-Dichloroethane-d4	0.12		"	0.125	97.4		70-130			
Surrogate: Toluene-d8	0.13		"	0.125	102		70-130			
Surrogate: 4-Bromofluorobenzene	0.13		"	0.125	104		70-130			

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0848 - EPA 5030 (soil)

LCS (B2L0848-BS1)

Prepared: 12/08/2022 Analyzed: 12/08/2022

1,2,4-Trimethylbenzene	0.110	0.00200	mg/kg	0.100		110	70-130			
1,3,5-Trimethylbenzene	0.112	0.00200	"	0.100		112	70-130			
Benzene	0.106	0.00200	"	0.100		106	70-130			
Ethylbenzene	0.118	0.00200	"	0.100		118	70-130			
Naphthalene	0.0983	0.00380	"	0.100		98.3	70-130			
Toluene	0.107	0.00200	"	0.100		107	70-130			
o-Xylene	0.115	0.00200	"	0.100		115	70-130			
m,p-Xylene	0.225	0.00400	"	0.200		113	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.12		"	0.125		97.8	70-130			
Surrogate: Toluene-d8	0.13		"	0.125		103	70-130			
Surrogate: 4-Bromofluorobenzene	0.15		"	0.125		116	70-130			

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0848 - EPA 5030 (soil)

Matrix Spike (B2L0848-MS1)	Source: Y212188-01			Prepared: 12/08/2022 Analyzed: 12/08/2022						
1,2,4-Trimethylbenzene	0.0897	0.00200	mg/kg	0.100	ND	89.7	70-130			
1,3,5-Trimethylbenzene	0.0904	0.00200	"	0.100	ND	90.4	70-130			
Benzene	0.0893	0.00200	"	0.100	ND	89.3	70-130			
Ethylbenzene	0.0970	0.00200	"	0.100	ND	97.0	70-130			
Naphthalene	0.0836	0.00380	"	0.100	ND	83.6	70-130			
Toluene	0.0877	0.00200	"	0.100	ND	87.7	70-130			
o-Xylene	0.0934	0.00200	"	0.100	ND	93.4	70-130			
m,p-Xylene	0.186	0.00400	"	0.200	ND	93.1	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.13		"	0.125		106	70-130			
Surrogate: Toluene-d8	0.13		"	0.125		101	70-130			
Surrogate: 4-Bromofluorobenzene	0.14		"	0.125		115	70-130			

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0848 - EPA 5030 (soil)

Matrix Spike Dup (B2L0848-MSD1)	Source: Y212188-01		Prepared: 12/08/2022 Analyzed: 12/08/2022							
1,2,4-Trimethylbenzene	0.103	0.00200	mg/kg	0.100	ND	103	70-130	14.0	20	
1,3,5-Trimethylbenzene	0.105	0.00200	"	0.100	ND	105	70-130	15.1	20	
Benzene	0.101	0.00200	"	0.100	ND	101	70-130	12.6	20	
Ethylbenzene	0.110	0.00200	"	0.100	ND	110	70-130	12.5	20	
Naphthalene	0.101	0.00380	"	0.100	ND	101	70-130	18.7	20	
Toluene	0.0983	0.00200	"	0.100	ND	98.3	70-130	11.5	20	
o-Xylene	0.108	0.00200	"	0.100	ND	108	70-130	14.3	20	
m,p-Xylene	0.210	0.00400	"	0.200	ND	105	70-130	12.1	20	
Surrogate: 1,2-Dichloroethane-d4	0.13		"	0.125		105	70-130			
Surrogate: Toluene-d8	0.13		"	0.125		100	70-130			
Surrogate: 4-Bromofluorobenzene	0.14		"	0.125		114	70-130			

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Metals by EPA 6000/7000 Series Methods - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0844 - EPA 3050B

Blank (B2L0844-BLK1)

Prepared: 12/08/2022 Analyzed: 12/08/2022

Arsenic	ND	0.000100	mg/kg							U
Barium	ND	0.0100	"							U
Cadmium	ND	0.000100	"							U
Copper	ND	0.0100	"							U
Lead	ND	0.0100	"							U
Nickel	ND	0.0100	"							U
Selenium	ND	0.000100	"							U
Silver	ND	0.000100	"							U
Zinc	ND	0.100	"							U

LCS (B2L0844-BS1)

Prepared: 12/08/2022 Analyzed: 12/08/2022

Arsenic	0.0528	0.000100	mg/kg	0.0500		106	80-120			
Barium	5.43	0.0100	"	5.00		109	80-120			
Cadmium	0.0524	0.000100	"	0.0500		105	80-120			
Copper	0.543	0.0100	"	0.500		109	80-120			
Lead	0.0528	0.0100	"	0.0500		106	80-120			
Nickel	0.0548	0.0100	"	0.0500		110	80-120			
Selenium	0.0505	0.000100	"	0.0500		101	80-120			
Silver	0.0531	0.000100	"	0.0500		106	80-120			
Zinc	0.540	0.100	"	0.500		108	80-120			

Matrix Spike (B2L0844-MS1)

Source: Y212194-01

Prepared: 12/08/2022 Analyzed: 12/08/2022

Origins Laboratory, Inc.



Jen Pellegrini, Project Manager

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Tasman Geosciences
 6855 West 119th Avenue
 Broomfield CO 80020

Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Metals by EPA 6000/7000 Series Methods - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0844 - EPA 3050B

Matrix Spike (B2L0844-MS1)		Source: Y212194-01			Prepared: 12/08/2022 Analyzed: 12/08/2022					
Arsenic	10.4	0.0989	mg/kg	4.94	5.20	105	75-125			
Barium	730	9.89	"	494	179	112	75-125			
Cadmium	5.39	0.0989	"	4.94	0.203	105	75-125			
Copper	53.4	9.89	"	49.4	8.39	91.0	75-125			
Lead	15.1	9.89	"	4.94	9.33	117	75-125			
Nickel	18.6	9.89	"	4.94	13.2	110	75-125			
Selenium	5.11	0.0989	"	4.94	0.249	98.3	75-125			
Silver	5.31	0.0989	"	4.94	0.0461	106	75-125			
Zinc	95.5	98.9	"	49.4	44.8	102	75-125			U

Matrix Spike Dup (B2L0844-MSD1)		Source: Y212194-01			Prepared: 12/08/2022 Analyzed: 12/08/2022					
Arsenic	9.57	0.0857	mg/kg	4.28	5.20	102	75-125	8.21	20	
Barium	619	8.57	"	428	179	103	75-125	16.5	20	
Cadmium	4.65	0.0857	"	4.28	0.203	104	75-125	14.6	20	
Copper	44.7	8.57	"	42.8	8.39	84.9	75-125	17.6	20	
Lead	13.9	8.57	"	4.28	9.33	107	75-125	8.29	20	
Nickel	17.5	8.57	"	4.28	13.2	101	75-125	6.21	20	
Selenium	4.46	0.0857	"	4.28	0.249	98.3	75-125	13.6	20	
Silver	4.52	0.0857	"	4.28	0.0461	105	75-125	16.0	20	
Zinc	87.4	85.7	"	42.8	44.8	99.4	75-125	8.85	20	

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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

Classical Chemistry Parameters - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2L0903 - Saturated Paste Metals

Blank (B2L0903-BLK1)

Prepared: 12/09/2022 Analyzed: 12/12/2022

SAR	0.00		SAR							U
Calcium PPM	ND	10.0	mg/L							U
Magnesium PPM	ND	10.0	"							U
Sodium PPM	ND	10.0	"							U

Duplicate (B2L0903-DUP1)

Source: Y212189-01

Prepared: 12/09/2022 Analyzed: 12/12/2022

Calcium PPM	18.2	10.0	mg/L		26.0			35.3	50	
SAR	0.00		SAR		5.42			200	200	U
Magnesium PPM	9.68	10.0	mg/L		12.2			23.2	50	U
Sodium PPM	127	10.0	"		134			4.97	50	

Batch B2L0907 - DTPA Sorbitol Preparation

Blank (B2L0907-BLK1)

Prepared: 12/09/2022 Analyzed: 12/12/2022

Boron	ND	0.100	mg/L							U
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Duplicate (B2L0907-DUP1)

Source: Y212188-01

Prepared: 12/09/2022 Analyzed: 12/13/2022

Boron	25.6	1.00	mg/L		24.4			4.77	50	
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Batch B2L0908 - DTPA Sorbitol Preparation

Blank (B2L0908-BLK1)

Prepared: 12/09/2022 Analyzed: 12/12/2022

Boron	ND	0.100	mg/L							U
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Duplicate (B2L0908-DUP1)

Source: Y212134-01

Prepared: 12/09/2022 Analyzed: 12/12/2022

Boron	0.397	0.0999	mg/L		0.340			15.2	50	
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 Project: KMG - Miller 23-24 Reclamation

Saturated Paste - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B2L0911 - Saturated Paste pH/EC										
Blank (B2L0911-BLK1)					Prepared: 12/09/2022 Analyzed: 12/10/2022					
Specific Conductance (EC)	ND	0.00500	mmhos/cm							U
Duplicate (B2L0911-DUP1)					Source: Y212189-01 Prepared: 12/09/2022 Analyzed: 12/10/2022					
pH	8.79		pH Units		9.45		7.24		25	
Specific Conductance (EC)	0.761	0.00500	mmhos/cm		0.920		18.8		25	

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Andy Sagen
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 Project: KMG - Miller 23-24 Reclamation

PAH by 8270D SIM - Quality Control
Waypoint Analytical, LLC.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch L653294 - 3550B

MSD (L 81331-MSD-L653294)		Source: 81331			Prepared: 12/12/2022 Analyzed: 12/13/2022					
Dibenz(a,h)anthracene	0.153	0.00067	mg/Kg	0.165	<0.000614	92.7	30-130	12.8	30	
Pyrene	0.0886	0.00067	"	0.165	<0.000643	53.6	30-130	8.8	30	
Naphthalene	0.0749	0.00201	"	0.165	<0.00145	45.3	30-130	10.7	30	
Indeno(1,2,3-cd)pyrene	0.172	0.00067	"	0.165	<0.000627	104	30-130	8.8	30	
Fluorene	0.0868	0.00067	"	0.165	<0.000286	52.6	30-130	11.7	30	
Fluoranthene	0.0935	0.00067	"	0.165	<0.000394	56.6	30-130	7.7	30	
Chrysene	0.0979	0.00067	"	0.165	<0.000624	59.3	30-130	8.8	30	
Benzo(k)fluoranthene	0.0854	0.00067	"	0.165	<0.000437	51.7	30-130	16.7	30	
Benzo(b)fluoranthene	0.132	0.00067	"	0.165	<0.000585	80	30-130	9.5	30	
Benzo(a)pyrene	0.103	0.00067	"	0.165	<0.000468	62.4	30-130	5.6	30	
Benzo(a)anthracene	0.104	0.00067	"	0.165	<0.000493	63	30-130	4.6	30	
Acenaphthene	0.0835	0.00067	"	0.165	<0.000304	50.6	30-130	11.2	30	
2-Methylnaphthalene	0.0784	0.00201	"	0.165	<0.00194	47.5	30-130	10.3	30	
1-Methylnaphthalene	0.0749	0.00201	"	0.165	<0.00109	45.3	30-130	11	30	
Anthracene	0.0909	0.00067	"	0.165	<0.000334	55	30-130	8.1	30	
Surrogate: Nitrobenzene-d5	40.3		"	0.33	157	40.3	29-110			
Surrogate: 4-Terphenyl-d14	46.3		"	0.33	164	46.3	33-122			
Surrogate: 2-Fluorobiphenyl	41.2		"	0.33	155	41.2	33-115			

MS (L 81331-MS-L653294)		Source: 81331			Prepared: 12/12/2022 Analyzed: 12/13/2022					
Chrysene	0.107	0.00067	mg/Kg	0.166	<0.000624	64.4	30-130			
Benzo(k)fluoranthene	0.101	0.00067	"	0.166	<0.000437	60.8	30-130			
1-Methylnaphthalene	0.0837	0.00201	"	0.166	<0.00109	50.4	30-130			
Acenaphthene	0.0935	0.00067	"	0.166	<0.000304	56.3	30-130			
Anthracene	0.0986	0.00067	"	0.166	<0.000334	59.3	30-130			
Benzo(a)anthracene	0.109	0.00067	"	0.166	<0.000493	65.6	30-130			
Fluoranthene	0.101	0.00067	"	0.166	<0.000394	60.8	30-130			

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Tasman Geosciences
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Andy Sagen
 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

PAH by 8270D SIM - Quality Control
Waypoint Analytical, LLC.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch L653294 - 3550B

MS (L 81331-MS-L653294)	Source: 81331			Prepared: 12/12/2022 Analyzed: 12/13/2022						
Benzo(b)fluoranthene	0.12	0.00067	mg/Kg	0.166	<0.000585	72.2	30-130			
2-Methylnaphthalene	0.087	0.00201	"	0.166	<0.00194	52.4	30-130			
Dibenz(a,h)anthracene	0.174	0.00067	"	0.166	<0.000614	105	30-130			
Fluorene	0.0976	0.00067	"	0.166	<0.000286	58.7	30-130			
Indeno(1,2,3-cd)pyrene	0.188	0.00067	"	0.166	<0.000627	113	30-130			
Naphthalene	0.0834	0.00201	"	0.166	<0.00145	50.2	30-130			
Pyrene	0.0968	0.00067	"	0.166	<0.000643	58.3	30-130			
Benzo(a)pyrene	0.109	0.00067	"	0.166	<0.000468	65.6	30-130			
Surrogate: 2-Fluorobiphenyl	42.7		"	0.332	155	42.7	33-115			
Surrogate: 4-Terphenyl-d14	50.3		"	0.332	164	50.3	33-122			
Surrogate: Nitrobenzene-d5	41.5		"	0.332	157	41.5	29-110			

LCS (LCS-L653294)	Prepared: 12/12/2022 Analyzed: 12/13/2022									
Benzo(b)fluoranthene	0.139	0.00067	mg/Kg	0.167		83.2	30-130			
1-Methylnaphthalene	0.089	0.00201	"	0.167		53.2	30-130			
Chrysene	0.117	0.00067	"	0.167		70	30-130			
2-Methylnaphthalene	0.0929	0.00201	"	0.167		55.6	30-130			
Acenaphthene	0.0988	0.00067	"	0.167		59.1	30-130			
Anthracene	0.106	0.00067	"	0.167		63.4	30-130			
Benzo(a)anthracene	0.115	0.00067	"	0.167		68.8	30-130			
Benzo(a)pyrene	0.121	0.00067	"	0.167		72.4	30-130			
Benzo(k)fluoranthene	0.115	0.00067	"	0.167		68.8	30-130			
Dibenz(a,h)anthracene	0.181	0.00067	"	0.167		108	30-130			
Fluoranthene	0.112	0.00067	"	0.167		67	30-130			
Fluorene	0.105	0.00067	"	0.167		62.8	30-130			
Indeno(1,2,3-cd)pyrene	0.209	0.00067	"	0.167		125	30-130			
Naphthalene	0.089	0.00201	"	0.167		53.2	30-130			

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 Project Number: [none]
 Project: KMG - Miller 23-24 Reclamation

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Waypoint Analytical, LLC.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch L653294 - 3550B

LCS (LCS-L653294)

Prepared: 12/12/2022 Analyzed: 12/13/2022

Pyrene	0.11	0.00067	mg/Kg	0.167		65.8	30-130			
Surrogate: 4-Terphenyl-d14	57.3		"	0.333		57.3	33-122			
Surrogate: Nitrobenzene-d5	49.8		"	0.333		49.8	29-110			
Surrogate: 2-Fluorobiphenyl	51.3		"	0.333		51.3	33-115			

LRB (LRB-L653294)

Prepared: 12/12/2022 Analyzed: 12/13/2022

Fluoranthene	ND	0.00067	mg/Kg				-			
Dibenz(a,h)anthracene	ND	0.00067	"				-			
Chrysene	ND	0.00067	"				-			
Benzo(k)fluoranthene	ND	0.00067	"				-			
Benzo(b)fluoranthene	ND	0.00067	"				-			
Benzo(a)pyrene	ND	0.00067	"				-			
Benzo(a)anthracene	ND	0.00067	"				-			
Pyrene	ND	0.00067	"				-			
Indeno(1,2,3-cd)pyrene	ND	0.00067	"				-			
Fluorene	ND	0.00067	"				-			
Acenaphthene	ND	0.00067	"				-			
2-Methylnaphthalene	ND	0.00201	"				-			
Anthracene	ND	0.00067	"				-			
1-Methylnaphthalene	ND	0.00201	"				-			
Naphthalene	ND	0.00201	"				-			
Surrogate: 4-Terphenyl-d14	58.2		"	0.333		58.2	33-122			
Surrogate: 2-Fluorobiphenyl	48.9		"	0.333		48.9	33-115			
Surrogate: Nitrobenzene-d5	49.2		"	0.333		49.2	29-110			

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**Total Metals by 7196A - Quality Control
 Waypoint Analytical, LLC.**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch L653733 -										
DUP (L 81411-DUP)		Source: 81411								Prepared: Analyzed: 12/14/2022
Chromium, Hexavalent	ND	0.506	mg/Kg		<0.506		-	0	20	
MS (L 81411-MS)		Source: 81411								Prepared: Analyzed: 12/14/2022
Chromium, Hexavalent	41.8	2.56	mg/Kg	41	< 0.244	102	75-125			
MSD (L 81411-MSD)		Source: 81411								Prepared: Analyzed: 12/14/2022
Chromium, Hexavalent	545	50	mg/Kg	592	<24.4	92	75-125			
LCS (LCS)										Prepared: Analyzed: 12/14/2022
Chromium, Hexavalent	7.51	0.5	mg/Kg	8		94	75-125			
LRB (LRB)										Prepared: Analyzed: 12/14/2022
Chromium, Hexavalent	ND	0.5	mg/Kg				-			

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Tasman Geosciences
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Andy Sagen
Project Number: [none]
Project: KMG - Miller 23-24 Reclamation

Notes and Definitions

U Sample is Non-Detect.

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

All soil results are reported on a wet weight basis.

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