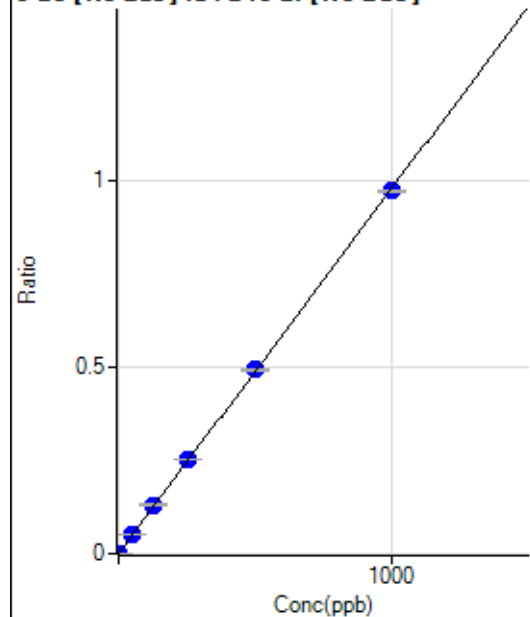


Batch Folder: D:\ICP-MS Data\P7111518-MS.b\
Analysis File: P7111518-MS.batch.bin
DA Date-Time: 2018-11-15 19:04:10
Calibration Title:
Calibration Method: External Calibration
VIS Interpolation Fit:

Level	Standard Data File	Sample Name	Acq. Date-Time
1	003CALB.d	S00	2018-11-15 12:31:52
2			
3	005CAL.S.d	S02	2018-11-15 12:40:05
4	006CAL.S.d	S03	2018-11-15 12:43:59
5	007CAL.S.d	S04	2018-11-15 12:48:09
6	008CAL.S.d	S05	2018-11-15 12:51:56
7	009CAL.S.d	S06	2018-11-15 12:55:40
8	010CAL.S.d	S07	2018-11-15 12:59:24
9	011CAL.S.d	S08	2018-11-15 13:03:10

9 Be [No Gas] ISTD:6 Li [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	38.89	0.0000	P	57.2
2	☐	0.100					
3	☐	1.000	1.045	4348.87	0.0010	P	0.2
4	☐	50.000	53.823	224609.88	0.0527	P	0.9
5	☐	125.000	134.022	544753.59	0.1312	P	0.7
6	☐	250.000	257.609	989997.79	0.2521	P	0.8
7	☐	500.000	504.537	1893225.55	0.4938	P	1.3
8	☐	1000.000	994.510	3617288.36	0.9734	P	0.2
9	☐			783.37	0.0002	P	5.2

$$y = 9.7872\text{E-}004 * x + 9.2041\text{E-}006$$

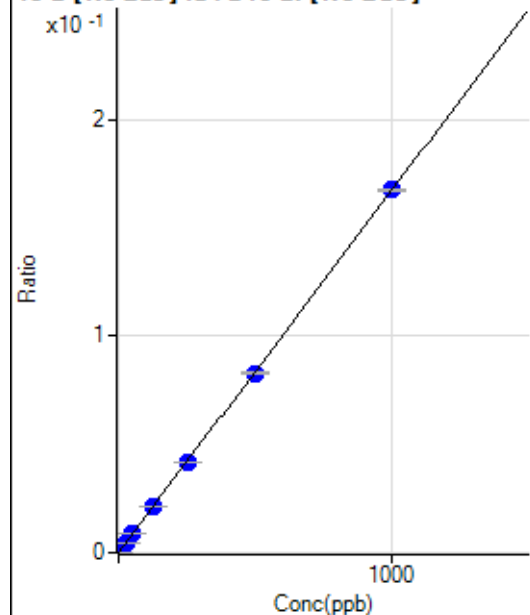
$$R = 0.9999$$

$$DL = 0.01615$$

Weight: <None>

Min Conc: 0

10 B [No Gas] ISTD:6 Li [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	266.68	0.0001	P	24.6
2	☐	2.500					
3	☐	25.000	26.550	18948.74	0.0045	P	0.5
4	☐	50.000	52.104	37355.54	0.0088	P	0.4
5	☐	125.000	127.572	88716.07	0.0214	P	0.4
6	☐	250.000	248.097	162893.83	0.0415	P	0.8
7	☐	500.000	496.011	317779.96	0.0829	P	0.3
8	☐	1000.000	1002.005	621983.11	0.1674	P	0.9
9	☐			9125.35	0.0024	P	10.2

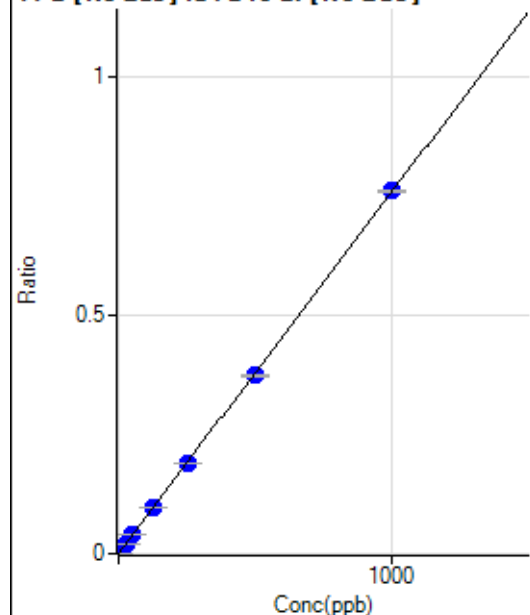
$$y = 1.6696\text{E-}004 * x + 6.3009\text{E-}005$$

$$R = 1.0000$$

$$DL = 0.2786$$

Weight: <None>

Min Conc: 0

11 B [No Gas] ISTD:6 Li [No Gas]

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1433.45	0.0003	P	4.3
2	☐	2.500					
3	☐	25.000	25.573	83134.37	0.0197	P	1.0
4	☐	50.000	51.675	168451.02	0.0395	P	1.7
5	☐	125.000	126.429	399420.06	0.0962	P	0.9
6	☐	250.000	247.955	739395.29	0.1883	P	0.2
7	☐	500.000	492.426	1432609.08	0.3736	P	0.8
8	☐	1000.000	1004.022	2829894.92	0.7615	P	0.5
9	☐			42154.30	0.0111	P	5.6

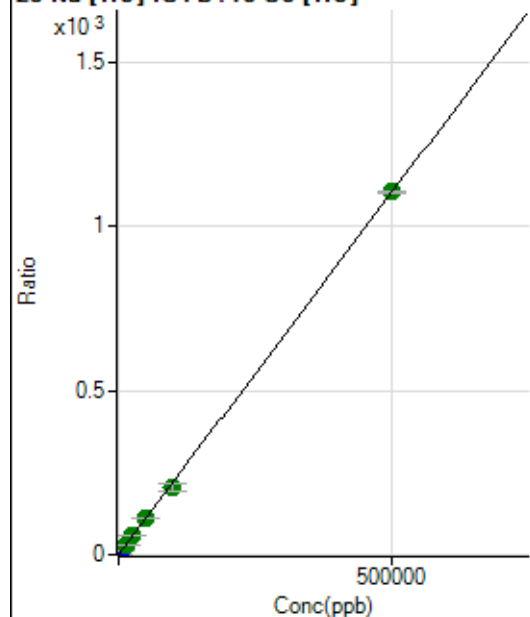
$$y = 7.5809\text{E-}004 * x + 3.3893\text{E-}004$$

$$R = 0.9999$$

$$DL = 0.05822$$

Weight: <None>

Min Conc: 0

23 Na [He] ISTD:45 Sc [He]

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	10262.25	0.0313	P	1.0
2	☐	50.000					
3	☐	500.000	505.400	380537.75	1.1461	P	0.9
4	☐	5000.000	5026.146	3582444.39	11.1185	P	0.2
5	☐	12500.000	12418.966	8309408.00	27.4265	A	1.7
6	☐	25000.000	25827.833	15362465.97	57.0055	A	1.9
7	☐	50000.000	50703.951	30331780.54	111.8803	A	0.0
8	☐	100000.00	93375.063	61611497.21	206.0095	A	10.7
9	☐	500000.00	501214.96	357073491.3	1,105.672	A	0.4

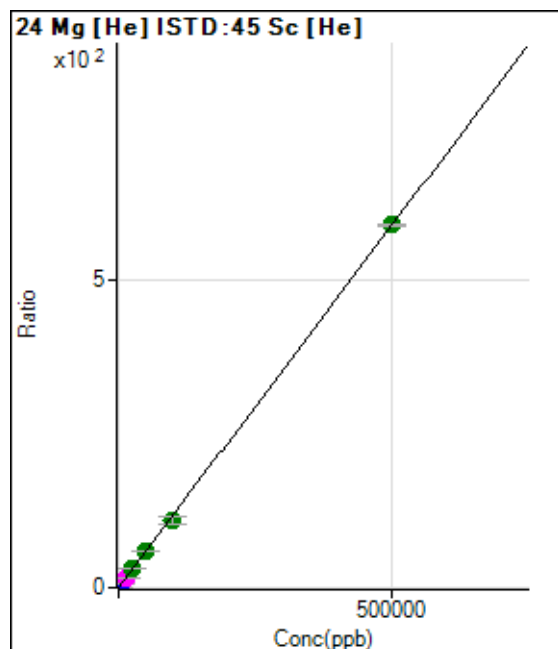
$$y = 0.0022 * x + 0.0313$$

$$R = 0.9999$$

$$DL = 0.4233$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	77.78	0.0002	P	15.4
2	☐	50.000					
3	☐	500.000	506.874	198478.15	0.5978	P	0.9
4	☐	5000.000	5096.402	1935906.07	6.0084	P	0.3
5	☐	12500.000	12597.093	4499279.74	14.8510	M	2.2
6	☐	25000.000	25994.326	8258581.52	30.6451	A	2.0
7	☐	50000.000	50831.799	16246486.30	59.9261	A	0.4
8	☐	100000.00	93149.832	32840992.75	109.8150	A	10.8
9	☐	500000.00	501233.73	190824525.1	590.9071	A	0.3

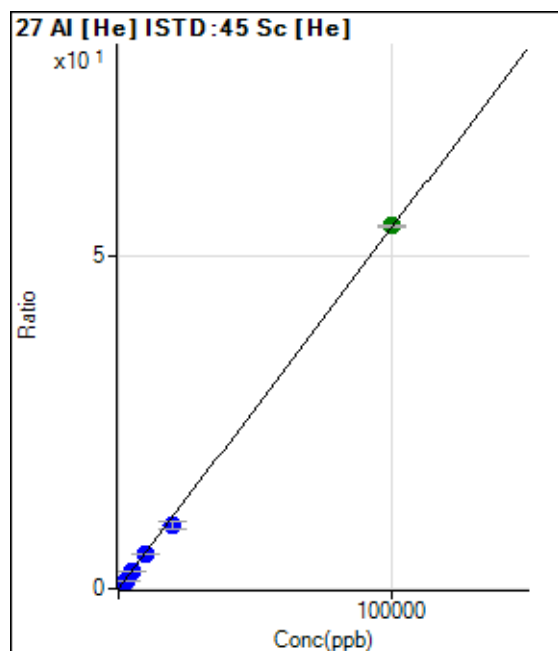
$$y = 0.0012 * x + 2.3664E-004$$

$$R = 0.9999$$

$$DL = 0.09293$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	83.34	0.0003	P	35.2
2	☐	2.000					
3	☐	20.000	19.233	3547.77	0.0107	P	4.5
4	☐	1000.000	966.159	168882.41	0.5242	P	0.4
5	☐	2500.000	2368.540	389194.22	1.2846	P	1.7
6	☐	5000.000	4901.529	716393.99	2.6581	P	1.6
7	☐	10000.000	9571.715	1407177.92	5.1905	P	0.8
8	☐	20000.000	17546.830	2845892.18	9.5150	P	10.6
9	☐	100000.00	100542.01	17605908.38	54.5188	A	0.3

$$y = 5.4225E-004 * x + 2.5426E-004$$

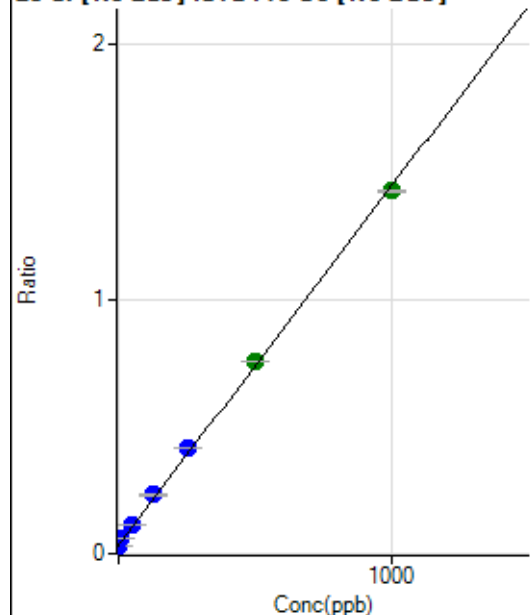
$$R = 0.9997$$

$$DL = 0.4954$$

Weight: <None>

Min Conc: 0

28 Si [No Gas] ISTD :45 Sc [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	246561.29	0.0336	P	0.7
2	☐	1.000					
3	☐	10.000	16.463	415201.35	0.0568	P	0.1
4	☐	50.000	57.429	829282.50	0.1146	P	0.7
5	☐	125.000	140.294	1592488.87	0.2313	P	1.0
6	☐	250.000	269.830	2612350.58	0.4139	P	0.9
7	☐	500.000	512.015	4652142.81	0.7551	A	0.4
8	☐	1000.000	986.687	8793176.59	1.4240	A	0.5
9	☐			773188.70	0.1129	P	1.9

$$y = 0.0014 * x + 0.0336$$

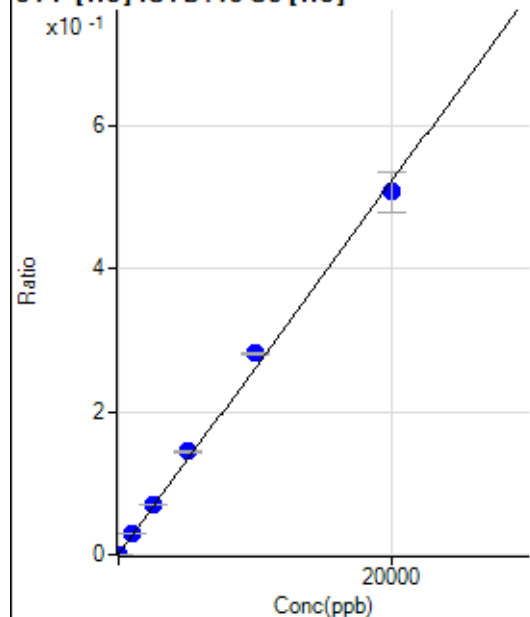
$$R = 0.9997$$

$$DL = 0.4681$$

Weight: <None>

Min Conc: 0

31 P [He] ISTD :45 Sc [He]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	-4.105	144.45	0.0004	P	21.0
2	☐	0.000					
3	☐	0.000	4.105	216.68	0.0007	P	23.7
4	☐	1000.000	1086.818	9297.68	0.0289	P	0.6
5	☐	2500.000	2673.437	21265.82	0.0702	P	2.5
6	☐	5000.000	5517.791	38890.58	0.1443	P	1.2
7	☐	10000.000	10796.349	76393.28	0.2818	P	0.9
8	☐	20000.000	19446.357	151632.68	0.5071	P	11.0
9	☐			261.13	0.0008	P	20.3

$$y = 2.6049E-005 * x + 5.4626E-004$$

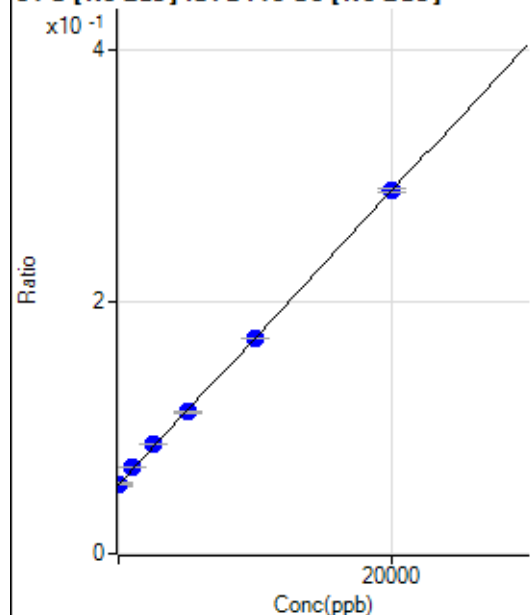
$$R = 0.9984$$

$$DL = 14.24$$

Weight: <None>

Min Conc: 0

34 S [No Gas] ISTD:45 Sc [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	-47.195	398063.85	0.0543	P	0.7
2	☐	0.000					
3	☐	0.000	47.195	404712.99	0.0554	P	1.3
4	☐	1000.000	1233.889	501174.41	0.0692	P	0.5
5	☐	2500.000	2762.558	599319.79	0.0871	P	0.3
6	☐	5000.000	4919.947	708259.21	0.1122	P	0.8
7	☐	10000.000	9975.761	1054356.92	0.1711	P	0.4
8	☐	20000.000	19987.618	1777440.27	0.2879	P	0.9
9	☐			334886.70	0.0489	P	1.5

$$y = 1.1658\text{E-}005 * x + 0.0548$$

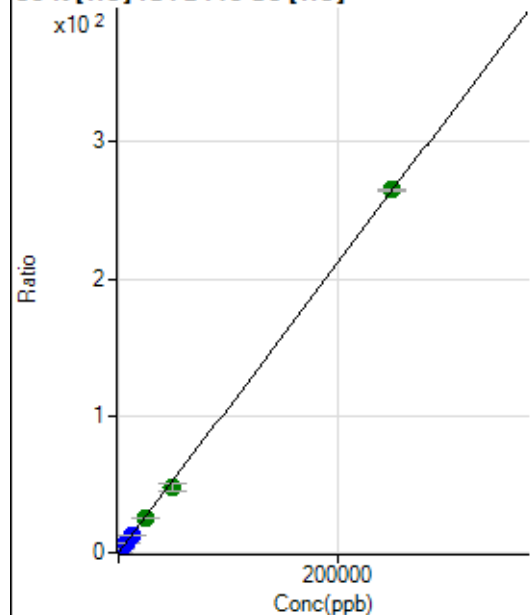
$$R = 0.9998$$

$$DL = 145.8$$

Weight: <None>

Min Conc: 0

39 K [He] ISTD:45 Sc [He]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	21449.66	0.0653	P	2.8
2	☐	50.000					
3	☐	500.000	509.706	200221.34	0.6030	P	0.7
4	☐	2500.000	2478.204	863385.08	2.6796	P	0.2
5	☐	6250.000	6001.934	1938032.42	6.3969	P	1.8
6	☐	12500.000	12296.502	3513401.12	13.0371	P	1.9
7	☐	25000.000	24152.051	6925089.48	25.5437	A	0.7
8	☐	50000.000	44874.802	14176659.69	47.4044	A	10.8
9	☐	250000.00	251126.41	85573144.27	264.9822	A	0.4

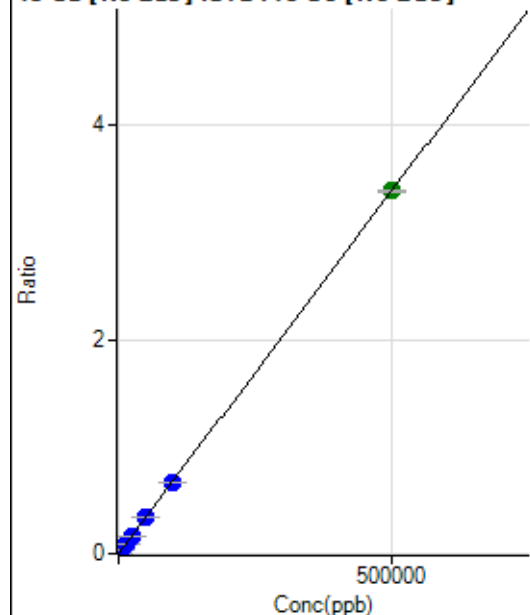
$$y = 0.0011 * x + 0.0653$$

$$R = 0.9998$$

$$DL = 5.292$$

Weight: <None>

Min Conc: 0

43 Ca [No Gas] ISTD:45 Sc [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	197.23	0.0000	P	6.0
2	☐	50.000					
3	☐	500.000	490.468	24454.38	0.0033	P	0.4
4	☐	5000.000	4944.491	242498.57	0.0335	P	0.5
5	☐	12500.000	12409.731	578525.95	0.0840	P	0.7
6	☐	25000.000	24634.682	1052830.61	0.1668	P	0.7
7	☐	50000.000	49491.815	2064227.28	0.3351	P	0.2
8	☐	100000.00	98091.514	4100499.22	0.6641	P	0.5
9	☐	500000.00	500453.60	23202812.50	3.3878	A	0.8

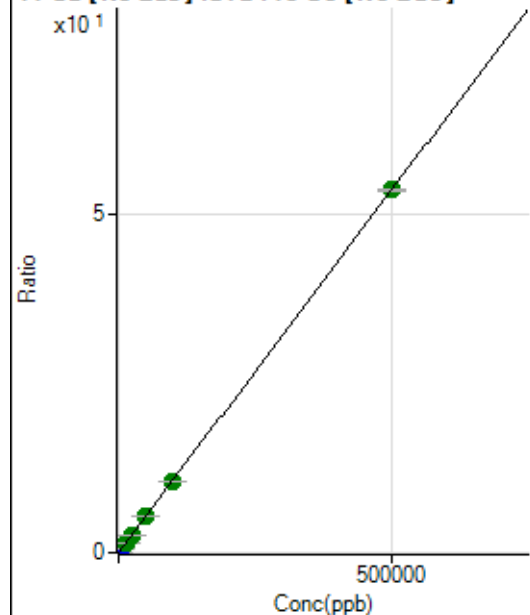
$$y = 6.7694\text{E-}006 * x + 2.6897\text{E-}005$$

$$R = 1.0000$$

$$DL = 0.719$$

Weight: <None>

Min Conc: 0

44 Ca [No Gas] ISTD:45 Sc [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	7038.18	0.0010	P	0.7
2	☐	50.000					
3	☐	500.000	500.702	399565.85	0.0547	P	1.2
4	☐	5000.000	4968.243	3866502.34	0.5341	P	0.3
5	☐	12500.000	12385.883	9156826.24	1.3301	A	0.8
6	☐	25000.000	24674.266	16719765.65	2.6488	A	0.9
7	☐	50000.000	49599.091	32796101.08	5.3234	A	0.9
8	☐	100000.00	98898.284	65540002.85	10.6137	A	0.2
9	☐	500000.00	500279.89	367692191.5	53.6860	A	0.7

$$y = 1.0731\text{E-}004 * x + 9.5991\text{E-}004$$

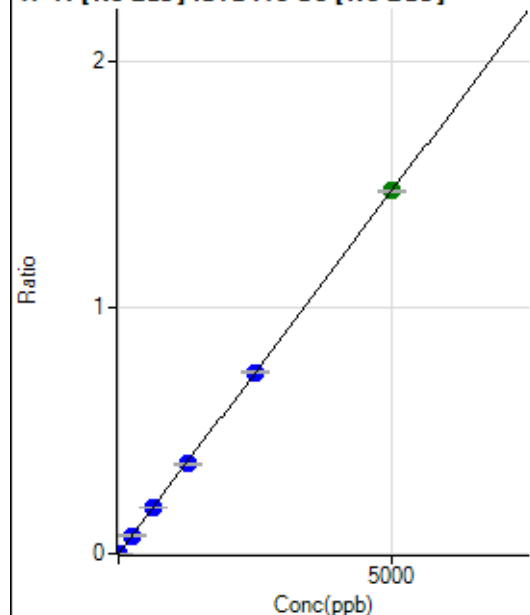
$$R = 1.0000$$

$$DL = 0.1842$$

Weight: <None>

Min Conc: 0

47 Ti [No Gas] ISTD:45 Sc [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	102.78	0.0000	P	5.5
2	☐	0.500					
3	☐	5.000	5.297	11518.88	0.0016	P	4.5
4	☐	250.000	251.480	537174.09	0.0742	P	0.5
5	☐	625.000	627.072	1273689.59	0.1850	P	0.7
6	☐	1250.000	1236.827	2303382.76	0.3649	P	0.8
7	☐	2500.000	2496.745	4537865.64	0.7366	P	1.0
8	☐	5000.000	5004.587	9116952.81	1.4764	A	0.4
9	☐			5053.83	0.0007	P	3.6

$$y = 2.9502\text{E-}004 * x + 1.4023\text{E-}005$$

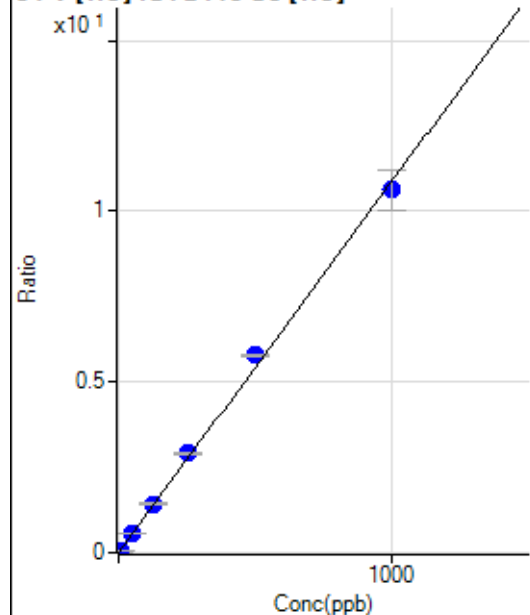
$$R = 1.0000$$

$$DL = 0.007879$$

Weight: <None>

Min Conc: 0

51 V [He] ISTD:45 Sc [He]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	10.00	0.0000	P	57.6
2	☐	0.500					
3	☐	5.000	5.446	19636.61	0.0591	P	1.1
4	☐	50.000	53.435	186887.85	0.5800	P	0.2
5	☐	125.000	130.982	430738.76	1.4218	P	2.2
6	☐	250.000	268.298	784866.93	2.9122	P	1.6
7	☐	500.000	531.803	1564955.50	5.7724	P	0.3
8	☐	1000.000	978.602	3175974.78	10.6222	P	11.1
9	☐			2290.22	0.0071	P	4.0

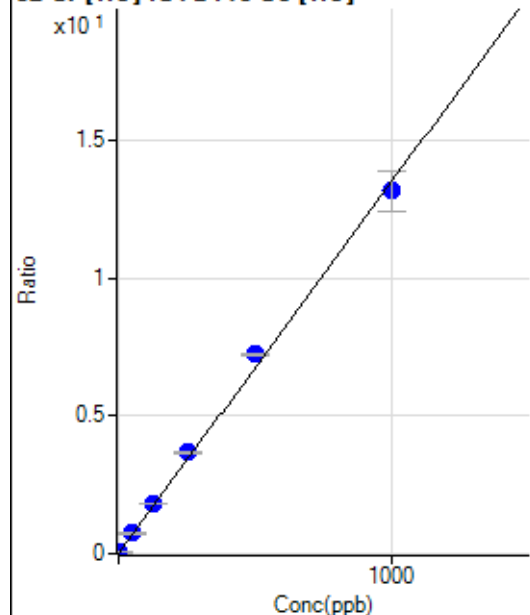
$$y = 0.0109 * x + 3.0454\text{E-}005$$

$$R = 0.9990$$

$$DL = 0.00485$$

Weight: <None>

Min Conc: 0

52 Cr [He] ISTD:45 Sc [He]

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1147.84	0.0035	P	9.5
2	☐	0.200					
3	☐	2.000	2.378	11820.45	0.0356	P	1.7
4	☐	50.000	54.058	236277.77	0.7333	P	0.1
5	☐	125.000	133.308	546314.69	1.8033	P	2.1
6	☐	250.000	272.305	991676.36	3.6798	P	2.0
7	☐	500.000	535.298	1960224.36	7.2304	P	0.7
8	☐	1000.000	975.533	3938398.83	13.1739	P	11.2
9	☐			209045.23	0.6473	P	0.3

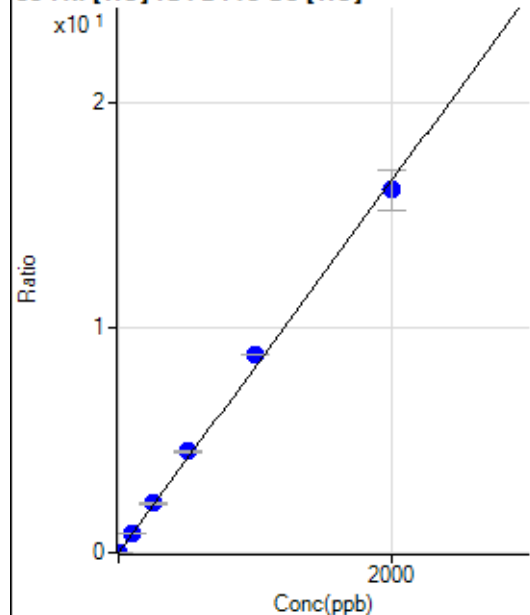
$$y = 0.0135 * x + 0.0035$$

$$R = 0.9988$$

$$DL = 0.0741$$

Weight: <None>

Min Conc: 0

55 Mn [He] ISTD:45 Sc [He]

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	41.11	0.0001	P	5.6
2	☐	0.100					
3	☐	1.000	1.180	3284.87	0.0099	P	3.4
4	☐	100.000	107.423	286540.99	0.8893	P	0.3
5	☐	250.000	263.871	661769.94	2.1843	P	2.2
6	☐	500.000	544.734	1215182.09	4.5092	P	2.0
7	☐	1000.000	1069.102	2399228.92	8.8497	P	0.2
8	☐	2000.000	1952.160	4830717.01	16.1593	P	11.3
9	☐			39262.40	0.1216	P	0.6

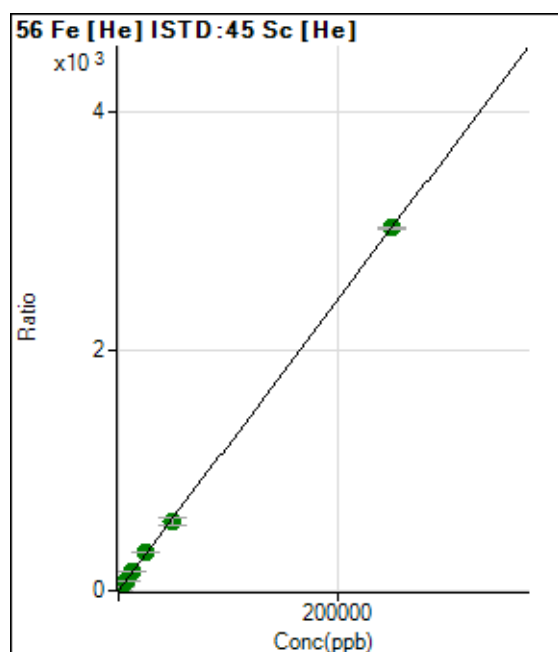
$$y = 0.0083 * x + 1.2523E-004$$

$$R = 0.9988$$

$$DL = 0.002535$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	5045.46	0.0154	P	3.0
2	☐	5.000					
3	☐	50.000	54.373	223514.19	0.6732	P	0.2
4	☐	2500.000	2625.997	10241682.64	31.7864	A	0.1
5	☐	6250.000	6495.689	23813856.09	78.6046	A	2.3
6	☐	12500.000	13401.683	43701088.01	162.1579	A	1.8
7	☐	25000.000	26352.583	86442157.49	318.8466	A	0.4
8	☐	50000.000	48044.150	173786607.5	581.2857	A	11.2
9	☐	250000.00	250203.42	977573525.5	3,027.144	A	0.2

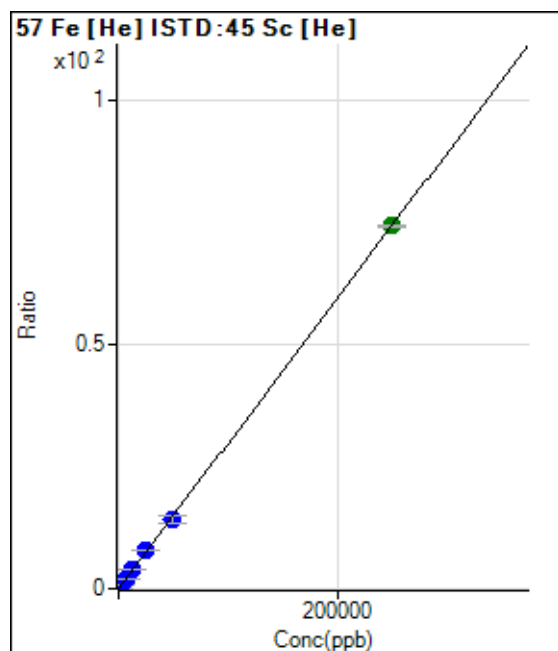
$$y = 0.0121 * x + 0.0154$$

$$R = 0.9999$$

$$DL = 0.1148$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	157.41	0.0005	P	1.4
2	☐	5.000					
3	☐	50.000	54.604	5551.19	0.0167	P	3.2
4	☐	2500.000	2639.837	253079.25	0.7855	P	0.4
5	☐	6250.000	6480.418	583989.43	1.9275	P	1.7
6	☐	12500.000	13388.118	1073065.25	3.9817	P	1.7
7	☐	25000.000	26150.784	2108368.91	7.7768	P	0.2
8	☐	50000.000	47791.166	4249718.56	14.2120	P	10.9
9	☐	250000.00	250275.12	24034060.96	74.4239	A	0.2

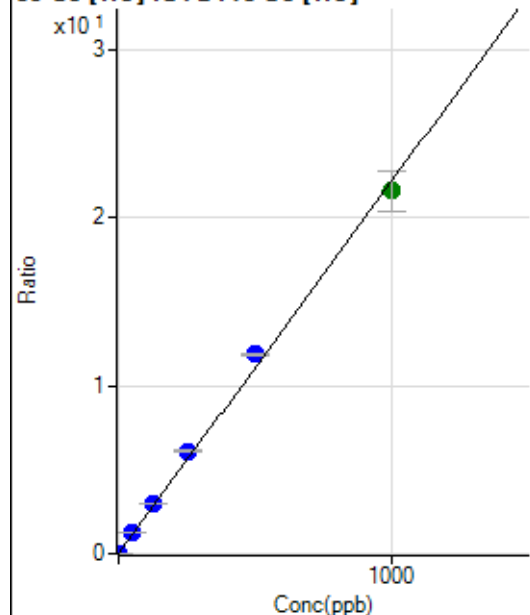
$$y = 2.9737E-004 * x + 4.7934E-004$$

$$R = 0.9999$$

$$DL = 0.06568$$

Weight: <None>

Min Conc: 0

59 Co [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	73.33	0.0002	P	16.8
2	☐	0.100					
3	☐	1.000	1.161	8610.43	0.0259	P	1.4
4	☐	50.000	55.314	394631.89	1.2248	P	0.6
5	☐	125.000	134.533	902378.56	2.9786	P	2.2
6	☐	250.000	274.778	1639445.65	6.0833	P	1.8
7	☐	500.000	535.818	3215951.86	11.8623	P	0.9
8	☐	1000.000	974.439	6450246.99	21.5726	A	11.0
9	☐			92755.21	0.2872	P	0.1

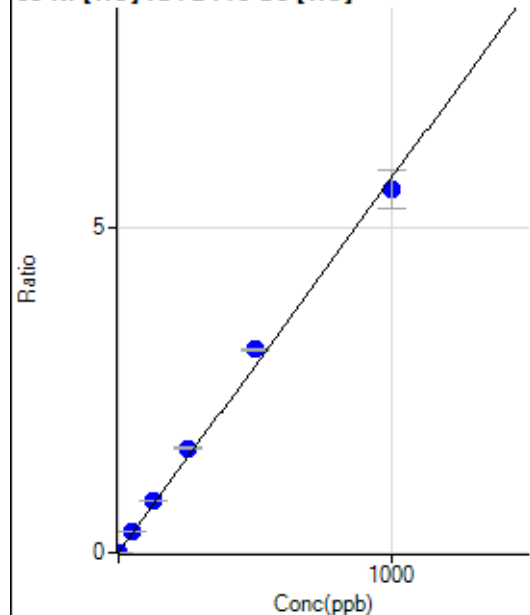
$$y = 0.0221 * x + 2.2342E-004$$

$$R = 0.9987$$

$$DL = 0.005086$$

Weight: <None>

Min Conc: 0

60 Ni [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	103.34	0.0003	P	18.2
2	☐	0.100					
3	☐	1.000	1.261	2522.48	0.0076	P	2.3
4	☐	50.000	56.863	105921.19	0.3287	P	0.6
5	☐	125.000	137.479	240669.82	0.7944	P	1.8
6	☐	250.000	279.118	434569.63	1.6125	P	1.5
7	☐	500.000	543.205	850681.43	3.1378	P	0.6
8	☐	1000.000	969.215	1674556.50	5.5984	P	10.5
9	☐			71411.80	0.2211	P	0.9

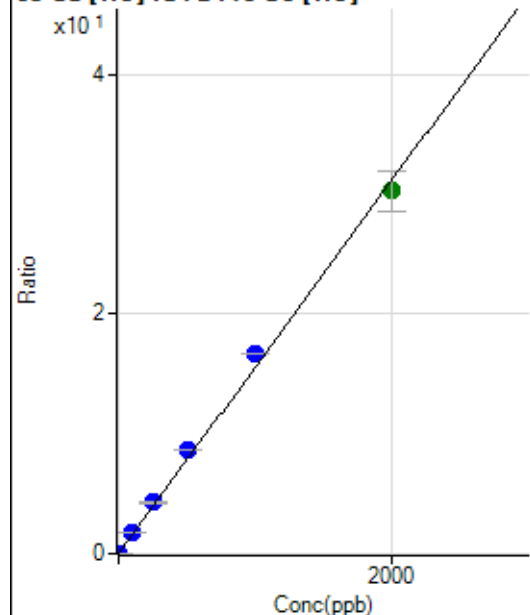
$$y = 0.0058 * x + 3.1481E-004$$

$$R = 0.9981$$

$$DL = 0.02971$$

Weight: <None>

Min Conc: 0

⁶³Cu [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	385.57	0.0012	P	2.8
2	☐	0.200					
3	☐	2.000	2.378	12678.97	0.0382	P	0.1
4	☐	100.000	112.988	566968.78	1.7597	P	0.4
5	☐	250.000	274.578	1295076.01	4.2746	P	1.7
6	☐	500.000	556.118	2332978.51	8.6564	P	1.4
7	☐	1000.000	1073.652	4530503.16	16.7110	P	0.5
8	☐	2000.000	1945.422	9054801.11	30.2789	A	10.8
9	☐			25913.07	0.0802	P	1.8

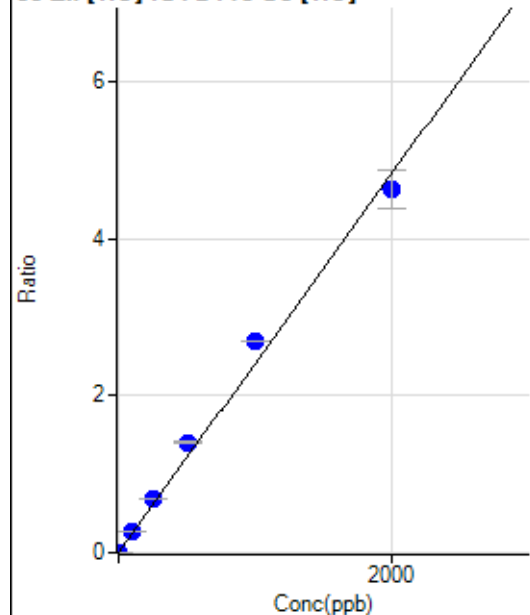
$$y = 0.0156 * x + 0.0012$$

$$R = 0.9985$$

$$DL = 0.006433$$

Weight: <None>

Min Conc: 0

⁶⁶Zn [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	484.46	0.0015	P	1.8
2	☐	0.200					
3	☐	2.000	2.593	2563.60	0.0077	P	3.2
4	☐	100.000	114.840	89619.54	0.2781	P	0.7
5	☐	250.000	282.012	206280.35	0.6809	P	2.2
6	☐	500.000	581.170	377742.73	1.4016	P	1.5
7	☐	1000.000	1117.266	730129.06	2.6931	P	0.7
8	☐	2000.000	1916.331	1381321.00	4.6182	P	10.6
9	☐			13479.74	0.0417	P	2.0

$$y = 0.0024 * x + 0.0015$$

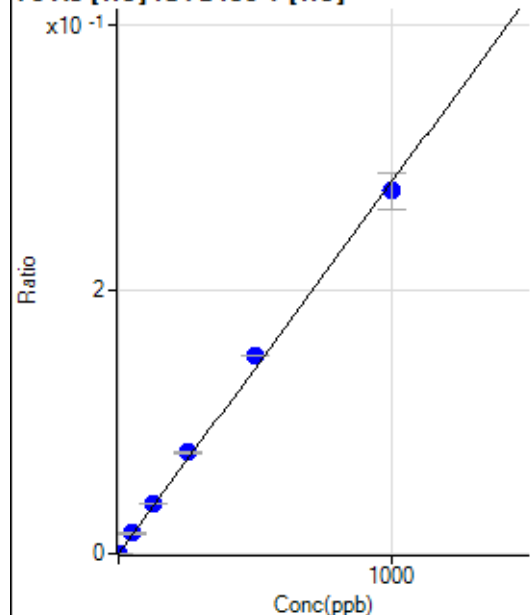
$$R = 0.9963$$

$$DL = 0.03354$$

Weight: <None>

Min Conc: 0

75 As [He] ISTD:89 Y [He]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	6.17	0.0000	P	69.6
2	☐	0.100					
3	☐	1.000	1.137	557.42	0.0003	P	5.3
4	☐	50.000	54.515	25856.99	0.0153	P	1.1
5	☐	125.000	134.220	60083.85	0.0377	P	2.0
6	☐	250.000	272.156	110432.92	0.0765	P	1.8
7	☐	500.000	532.224	216520.23	0.1496	P	0.5
8	☐	1000.000	976.970	426521.79	0.2746	P	9.9
9	☐			790.15	0.0005	P	8.2

$$y = 2.8108\text{E-}004 * x + 3.5822\text{E-}006$$

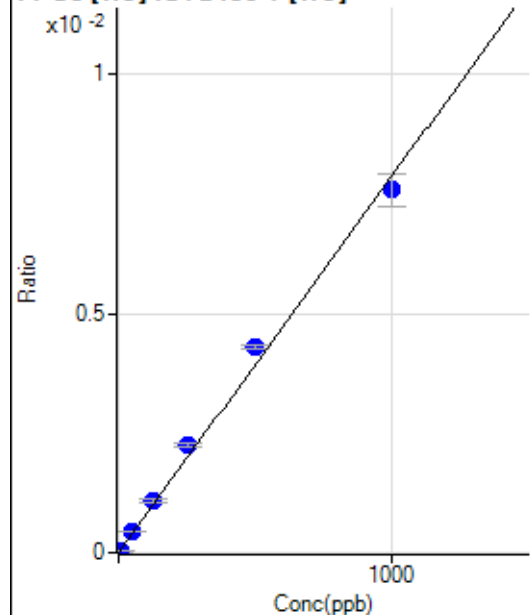
$$R = 0.9989$$

$$DL = 0.02662$$

Weight: <None>

Min Conc: 0

77 Se [He] ISTD:89 Y [He]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	1.11	0.0000	P	173.2
2	☐	0.500					
3	☐	5.000	6.553	90.00	0.0001	P	25.6
4	☐	50.000	56.200	746.70	0.0004	P	2.4
5	☐	125.000	138.667	1739.02	0.0011	P	6.7
6	☐	250.000	285.101	3237.09	0.0022	P	4.1
7	☐	500.000	548.751	6247.00	0.0043	P	1.9
8	☐	1000.000	964.823	11792.73	0.0076	P	9.2
9	☐			12.22	0.0000	P	42.4

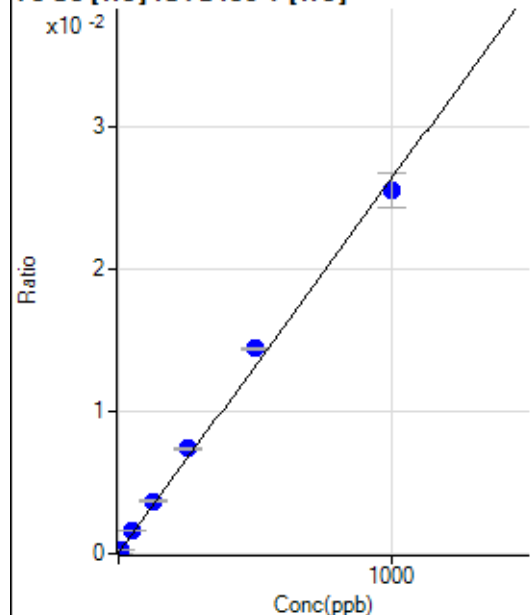
$$y = 7.8644\text{E-}006 * x + 6.4564\text{E-}007$$

$$R = 0.9974$$

$$DL = 0.4266$$

Weight: <None>

Min Conc: 0

78 Se [He] ISTD:89 Y [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	90.74	0.0001	P	12.8
2	☐	0.500					
3	☐	5.000	6.105	367.29	0.0002	P	8.4
4	☐	50.000	59.042	2706.45	0.0016	P	1.5
5	☐	125.000	138.279	5872.84	0.0037	P	1.5
6	☐	250.000	278.211	10630.51	0.0074	P	1.7
7	☐	500.000	546.337	20857.06	0.0144	P	0.4
8	☐	1000.000	967.661	39593.42	0.0255	P	9.5
9	☐			98.15	0.0001	P	15.2

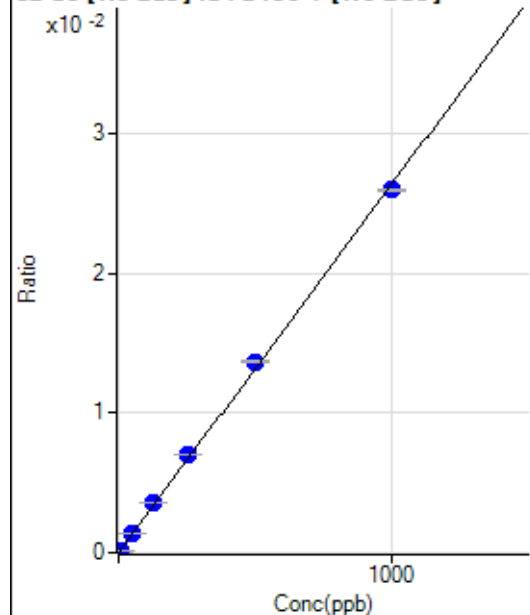
$$y = 2.6281\text{E-}005 * x + 5.2590\text{E-}005$$

$$R = 0.9979$$

$$DL = 0.769$$

Weight: <None>

Min Conc: 0

82 Se [No Gas] ISTD:89 Y [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	-37.71	0.0000	P	-299.
2	☐	0.500					
3	☐	5.000	5.800	1719.50	0.0001	P	6.3
4	☐	50.000	53.927	16200.03	0.0014	P	0.7
5	☐	125.000	134.537	38531.50	0.0035	P	1.1
6	☐	250.000	264.506	70802.44	0.0070	P	0.5
7	☐	500.000	518.964	137132.87	0.0137	P	0.6
8	☐	1000.000	985.499	258248.91	0.0260	P	0.5
9	☐			218.36	0.0000	P	42.3

$$y = 2.6383\text{E-}005 * x - 3.2505\text{E-}006$$

$$R = 0.9996$$

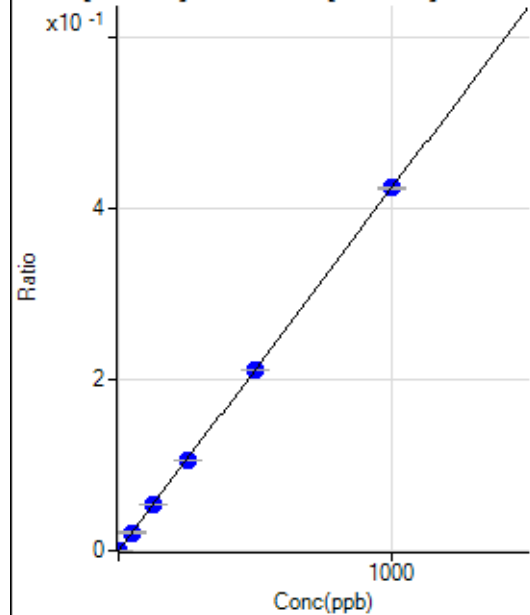
$$DL = 1.106$$

Weight: <None>

Min Conc: 0

83 Kr [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			875.60		P	10.1
2	☐						
3	☐			803.37		P	8.8
4	☐			880.04		P	3.3
5	☐			780.04		P	6.3
6	☐			722.25		P	4.0
7	☐			696.70		P	9.3
8	☐			770.04		P	3.1
9	☐			835.60		P	5.3

86 Sr [No Gas] ISTD : 89 Y [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	1341.78	0.0001	P	1.7
2	☐	0.100					
3	☐	1.000	1.010	6226.61	0.0005	P	5.9
4	☐	50.000	50.018	242862.92	0.0213	P	0.9
5	☐	125.000	126.332	582146.10	0.0536	P	0.3
6	☐	250.000	249.067	1071034.97	0.1055	P	0.5
7	☐	500.000	498.144	2113034.58	0.2109	P	0.1
8	☐	1000.000	1000.994	4209095.01	0.4237	P	0.4
9	☐			22977.56	0.0021	P	1.0

$$y = 4.2319E-004 * x + 1.1498E-004$$

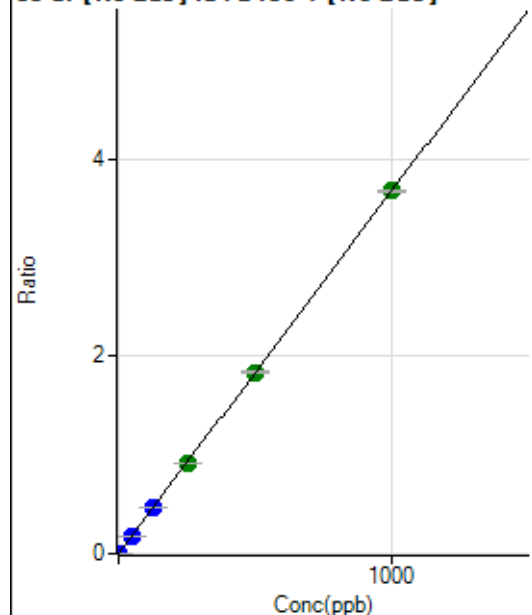
$$R = 1.0000$$

$$DL = 0.01378$$

Weight: <None>

Min Conc: 0

88 Sr [No Gas] ISTD:89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	244.46	0.0000	P	25.9
2	☐	0.100					
3	☐	1.000	1.029	43695.29	0.0038	P	1.2
4	☐	50.000	50.240	2109048.31	0.1848	P	0.4
5	☐	125.000	125.507	5015951.93	0.4616	P	0.1
6	☐	250.000	248.336	9271455.50	0.9134	A	0.8
7	☐	500.000	499.159	18392071.94	1.8359	A	0.9
8	☐	1000.000	1000.761	36563896.65	3.6808	A	0.3
9	☐			192400.35	0.0176	P	1.3

$$y = 0.0037 * x + 2.0942E-005$$

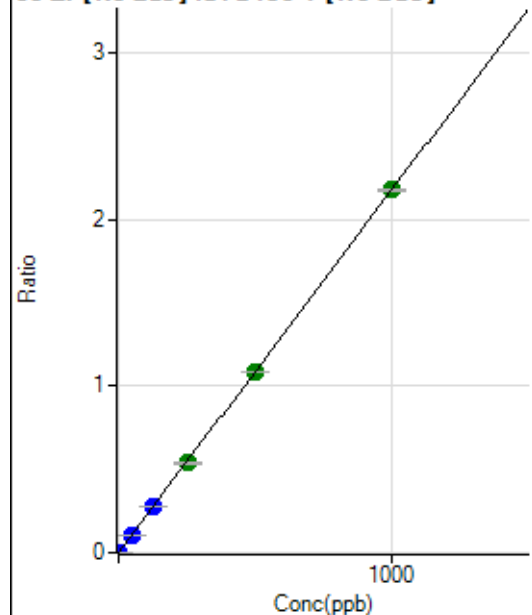
$$R = 1.0000$$

$$DL = 0.004429$$

Weight: <None>

Min Conc: 0

90 Zr [No Gas] ISTD:89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	625.04	0.0001	P	7.3
2	☐	0.100					
3	☐	1.000	1.068	27304.74	0.0024	P	1.5
4	☐	50.000	49.674	1234148.94	0.1081	P	0.6
5	☐	125.000	125.167	2959958.03	0.2724	P	0.6
6	☐	250.000	247.009	5456401.43	0.5376	A	0.5
7	☐	500.000	499.429	10887908.66	1.0868	A	0.1
8	☐	1000.000	1001.029	21638158.65	2.1783	A	0.4
9	☐			13237.16	0.0012	P	3.1

$$y = 0.0022 * x + 5.3570E-005$$

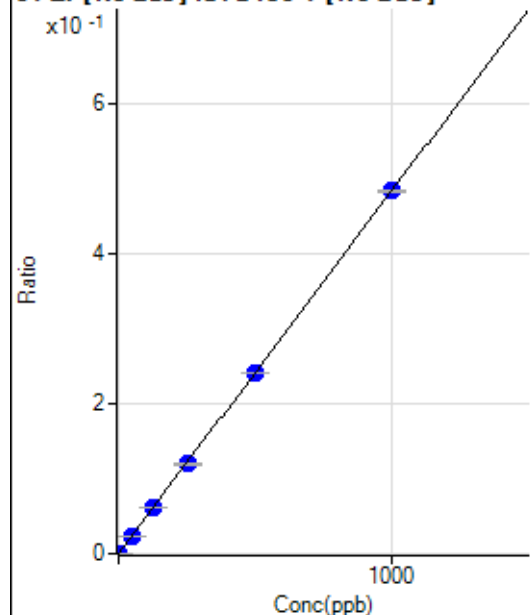
$$R = 1.0000$$

$$DL = 0.005422$$

Weight: <None>

Min Conc: 0

91 Zr [No Gas] ISTD: 89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	147.23	0.0000	P	36.3
2	☐	0.100					
3	☐	1.000	1.052	5984.82	0.0005	P	1.6
4	☐	50.000	49.720	274444.84	0.0241	P	1.3
5	☐	125.000	125.897	661447.33	0.0609	P	1.3
6	☐	250.000	246.845	1211480.19	0.1194	P	0.3
7	☐	500.000	499.897	2421292.11	0.2417	P	0.2
8	☐	1000.000	1000.742	4806083.66	0.4838	P	0.3
9	☐			2836.52	0.0003	P	4.0

$$y = 4.8346\text{E-}004 * x + 1.2601\text{E-}005$$

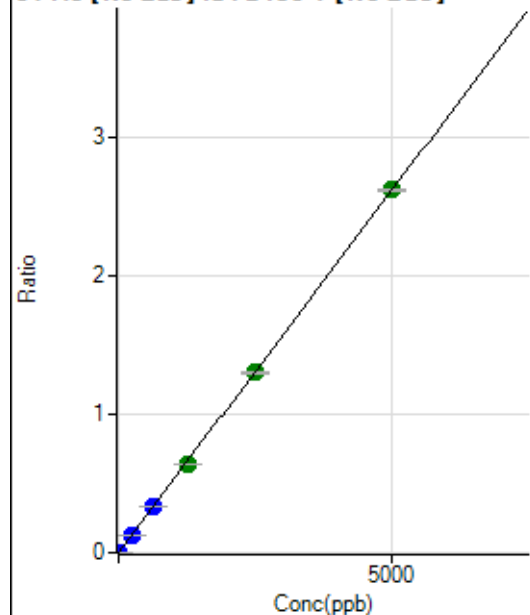
$$R = 1.0000$$

$$DL = 0.02842$$

Weight: <None>

Min Conc: 0

94 Mo [No Gas] ISTD: 89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	291.68	0.0000	P	11.0
2	☐	0.500					
3	☐	5.000	5.238	31691.60	0.0028	P	0.8
4	☐	250.000	249.884	1489189.86	0.1305	P	0.7
5	☐	625.000	626.903	3556604.55	0.3273	P	0.2
6	☐	1250.000	1233.045	6534822.06	0.6438	A	0.3
7	☐	2500.000	2486.318	13004596.73	1.2981	A	0.5
8	☐	5000.000	5010.847	25987773.50	2.6162	A	0.5
9	☐			37313.68	0.0034	P	2.3

$$y = 5.2210\text{E-}004 * x + 2.4988\text{E-}005$$

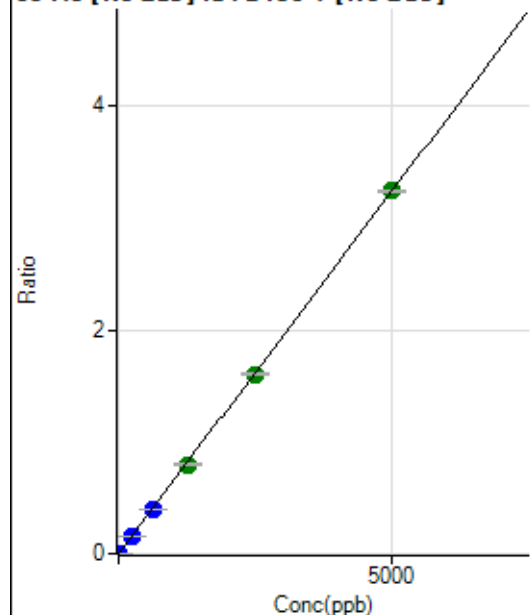
$$R = 1.0000$$

$$DL = 0.0158$$

Weight: <None>

Min Conc: 0

95 Mo [No Gas] ISTD:89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	38.89	0.0000	P	62.1
2	☐	0.500					
3	☐	5.000	5.149	38260.71	0.0033	P	0.5
4	☐	250.000	247.538	1826033.33	0.1600	P	0.9
5	☐	625.000	622.705	4373664.08	0.4025	P	0.4
6	☐	1250.000	1234.701	8101394.97	0.7981	A	0.5
7	☐	2500.000	2482.092	16073141.85	1.6045	A	0.9
8	☐	5000.000	5013.189	32190619.47	3.2406	A	0.4
9	☐			58093.97	0.0053	P	2.6

$$y = 6.4641\text{E-}004 * x + 3.3352\text{E-}006$$

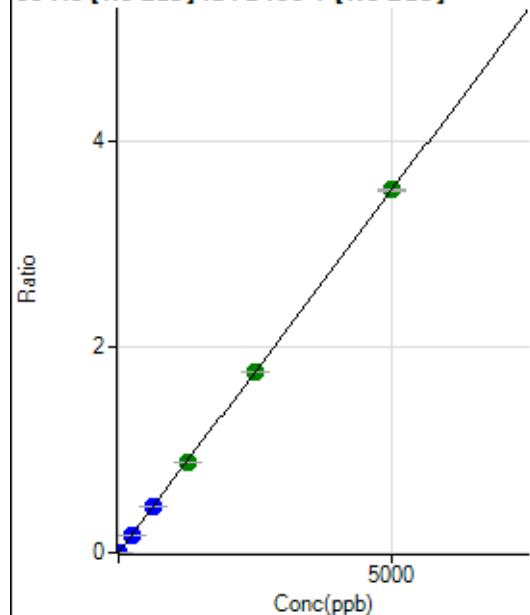
$$R = 1.0000$$

$$DL = 0.009606$$

Weight: <None>

Min Conc: 0

96 Mo [No Gas] ISTD:89 Y [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	111.12	0.0000	P	34.1
2	☐	0.500					
3	☐	5.000	5.160	41898.56	0.0036	P	0.6
4	☐	250.000	251.068	2020628.63	0.1771	P	0.8
5	☐	625.000	631.431	4838381.62	0.4453	P	0.4
6	☐	1250.000	1242.247	8892388.91	0.8761	A	0.6
7	☐	2500.000	2488.235	17578906.47	1.7547	A	0.5
8	☐	5000.000	5006.963	35075001.83	3.5310	A	0.5
9	☐			72074.43	0.0066	P	1.2

$$y = 7.0521\text{E-}004 * x + 9.5306\text{E-}006$$

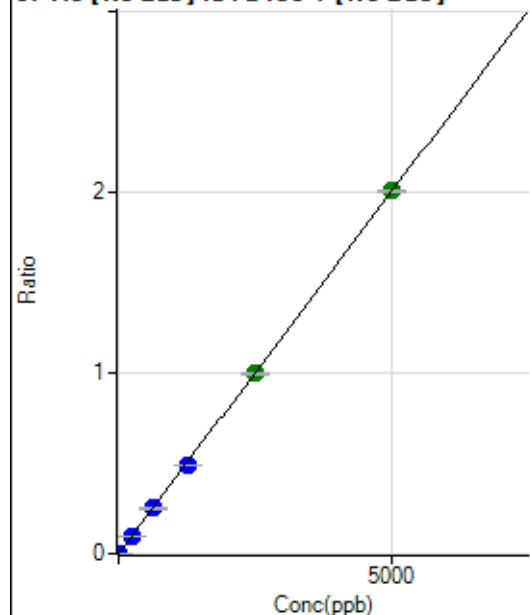
$$R = 1.0000$$

$$DL = 0.01384$$

Weight: <None>

Min Conc: 0

97 Mo [No Gas] ISTD:89 Y [No Gas]



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	30.56	0.0000	P	41.6
2	☐	0.500					
3	☐	5.000	5.081	23408.81	0.0020	P	2.3
4	☐	250.000	246.193	1125853.32	0.0987	P	0.5
5	☐	625.000	624.887	2720726.15	0.2504	P	0.4
6	☐	1250.000	1231.180	5007748.68	0.4934	P	0.5
7	☐	2500.000	2484.283	9972745.88	0.9955	A	0.3
8	☐	5000.000	5012.768	19953303.57	2.0087	A	0.5
9	☐			35885.18	0.0033	P	2.4

$$y = 4.0071\text{E-}004 * x + 2.6171\text{E-}006$$

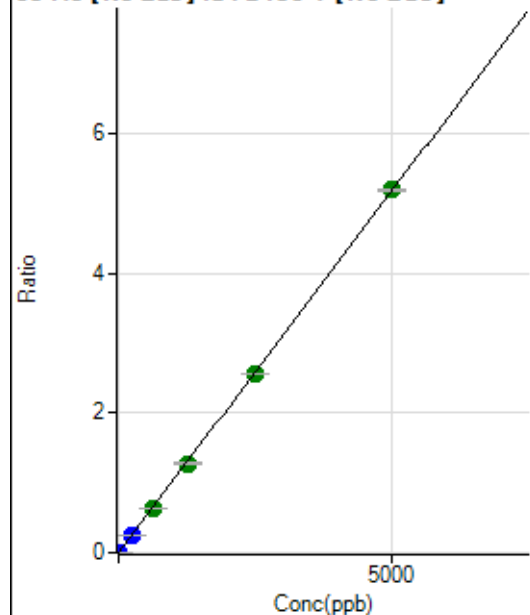
$$R = 1.0000$$

$$DL = 0.008153$$

Weight: <None>

Min Conc: 0

98 Mo [No Gas] ISTD:89 Y [No Gas]



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	83.34	0.0000	P	20.0
2	☐	0.500					
3	☐	5.000	5.034	59868.46	0.0052	P	0.5
4	☐	250.000	246.295	2907065.39	0.2548	P	1.2
5	☐	625.000	618.864	6955057.10	0.6401	A	0.1
6	☐	1250.000	1232.251	12937010.44	1.2745	A	0.8
7	☐	2500.000	2473.060	25625270.54	2.5579	A	0.3
8	☐	5000.000	5018.860	51564566.43	5.1910	A	0.8
9	☐			91875.88	0.0084	P	1.6

$$y = 0.0010 * x + 7.1409\text{E-}006$$

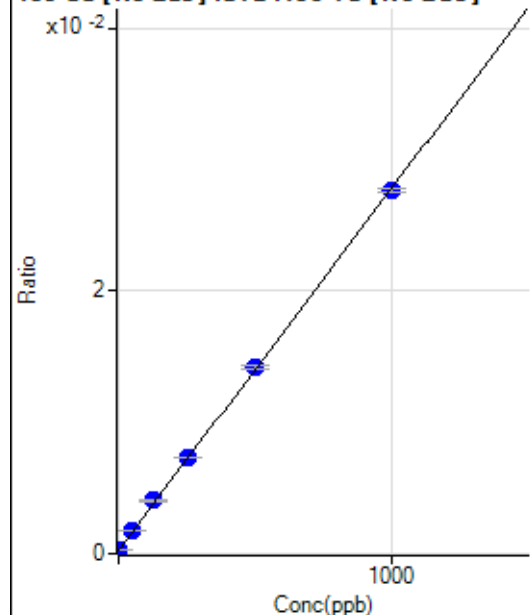
$$R = 1.0000$$

$$DL = 0.004136$$

Weight: <None>

Min Conc: 0

106 Cd [No Gas] ISTD :159 Tb [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	4022.97	0.0003	P	3.0
2	☐	0.100					
3	☐	1.000	1.719	4653.74	0.0003	P	1.6
4	☐	50.000	56.422	27461.03	0.0018	P	0.5
5	☐	125.000	137.013	59542.48	0.0040	P	1.0
6	☐	250.000	258.333	105373.57	0.0074	P	0.4
7	☐	500.000	504.554	201825.48	0.0141	P	2.0
8	☐	1000.000	993.816	388346.50	0.0276	P	1.1
9	☐			4011.84	0.0003	P	9.5

$$y = 2.7519\text{E-}005 * x + 2.5938\text{E-}004$$

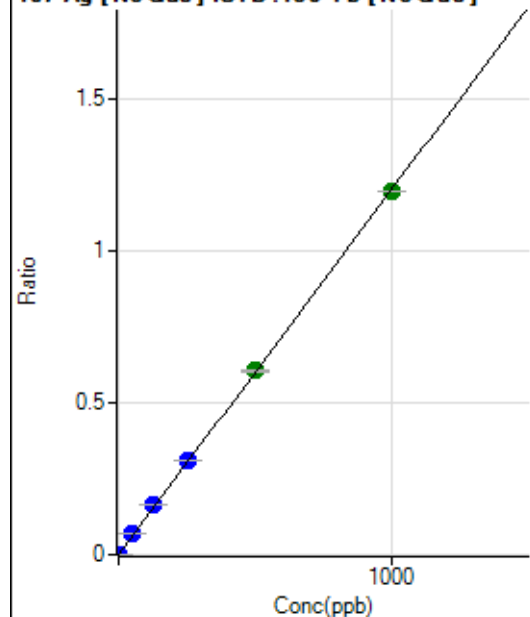
$$R = 0.9999$$

$$DL = 0.8372$$

Weight: <None>

Min Conc: 0

107 Ag [No Gas] ISTD :159 Tb [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	108.34	0.0000	P	28.0
2	☐	0.100					
3	☐	1.000	1.147	20971.86	0.0014	P	1.7
4	☐	50.000	55.917	1016505.78	0.0671	P	1.2
5	☐	125.000	136.717	2423034.77	0.1640	P	0.7
6	☐	250.000	257.953	4424557.78	0.3094	P	0.9
7	☐	500.000	504.196	8629886.65	0.6048	A	1.0
8	☐	1000.000	994.153	16774209.92	1.1924	A	0.1
9	☐			5073.34	0.0003	P	3.9

$$y = 0.0012 * x + 6.9907\text{E-}006$$

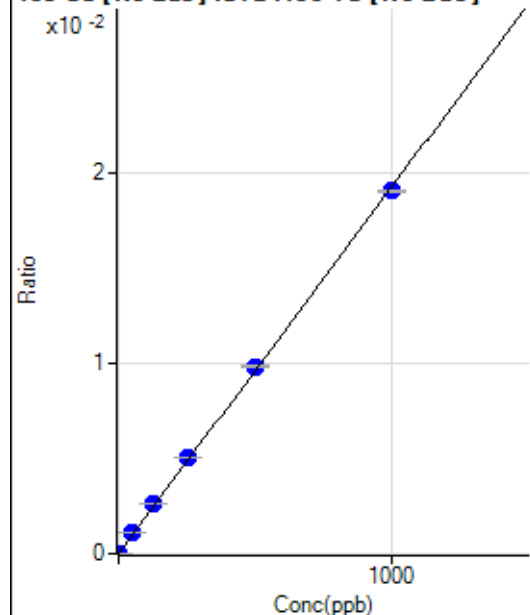
$$R = 0.9999$$

$$DL = 0.004902$$

Weight: <None>

Min Conc: 0

108 Cd [No Gas] ISTD :159 Tb [No Gas]



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	11.11	0.0000	P	43.3
2	☐	0.100					
3	☐	1.000	1.181	355.57	0.0000	P	15.1
4	☐	50.000	55.402	16174.76	0.0011	P	0.6
5	☐	125.000	136.709	38896.51	0.0026	P	0.6
6	☐	250.000	261.554	72013.90	0.0050	P	1.2
7	☐	500.000	510.305	140193.48	0.0098	P	1.4
8	☐	1000.000	990.225	268174.32	0.0191	P	0.4
9	☐			127.78	0.0000	P	11.9

$$y = 1.9251\text{E-}005 * x + 7.1636\text{E-}007$$

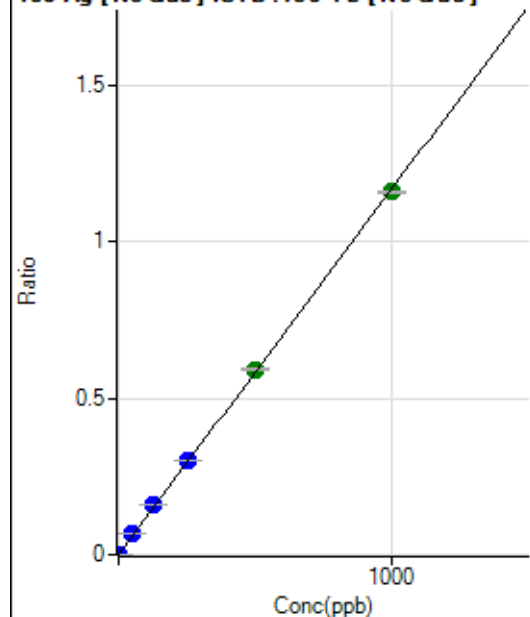
$$R = 0.9998$$

$$DL = 0.04839$$

Weight: <None>

Min Conc: 0

109 Ag [No Gas] ISTD :159 Tb [No Gas]



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	63.89	0.0000	P	26.6
2	☐	0.100					
3	☐	1.000	1.139	20240.22	0.0013	P	2.9
4	☐	50.000	55.643	984263.43	0.0649	P	1.0
5	☐	125.000	136.371	2351865.72	0.1592	P	0.7
6	☐	250.000	256.997	4289626.48	0.3000	P	0.5
7	☐	500.000	506.982	8444068.42	0.5917	A	1.0
8	☐	1000.000	993.056	16305095.50	1.1591	A	0.5
9	☐			4973.31	0.0003	P	3.1

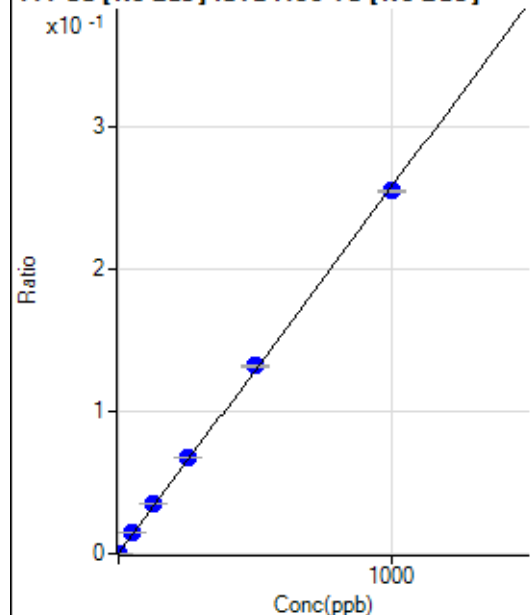
$$y = 0.0012 * x + 4.1155\text{E-}006$$

$$R = 0.9999$$

$$DL = 0.00281$$

Weight: <None>

Min Conc: 0

111 Cd [No Gas] ISTD :159 Tb [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	2816.63	0.0002	P	2.7
2	☐	0.100					
3	☐	1.000	1.167	7310.86	0.0005	P	3.1
4	☐	50.000	55.778	220191.87	0.0145	P	0.5
5	☐	125.000	137.487	525234.40	0.0355	P	0.8
6	☐	250.000	261.655	965099.55	0.0675	P	0.5
7	☐	500.000	511.984	1881993.12	0.1319	P	0.5
8	☐	1000.000	989.244	3582112.14	0.2546	P	0.5
9	☐			3807.80	0.0003	P	6.8

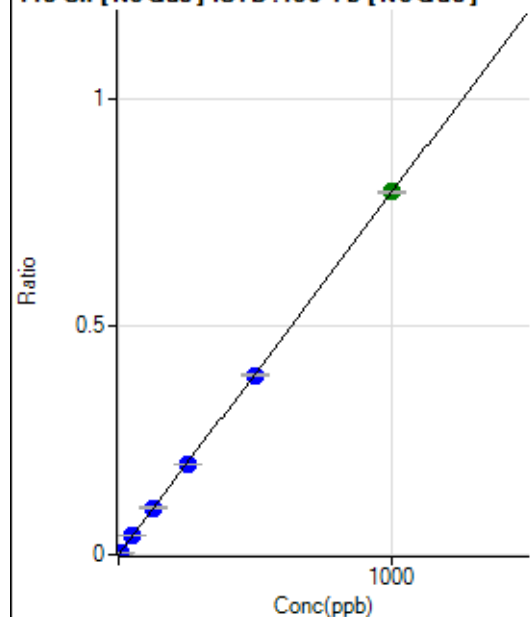
$$y = 2.5723\text{E-}004 * x + 1.8160\text{E-}004$$

$$R = 0.9998$$

$$DL = 0.05722$$

Weight: <None>

Min Conc: 0

118 Sn [No Gas] ISTD :159 Tb [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	688.93	0.0000	P	7.2
2	☐	0.500					
3	☐	5.000	5.354	65179.26	0.0043	P	0.4
4	☐	50.000	52.478	632129.58	0.0417	P	0.1
5	☐	125.000	129.911	1524692.68	0.1032	P	0.5
6	☐	250.000	249.129	2829318.21	0.1978	P	0.3
7	☐	500.000	495.102	5610018.96	0.3931	P	1.2
8	☐	1000.000	1001.927	11190992.78	0.7956	A	0.7
9	☐			17631.10	0.0012	P	1.3

$$y = 7.9398\text{E-}004 * x + 4.4408\text{E-}005$$

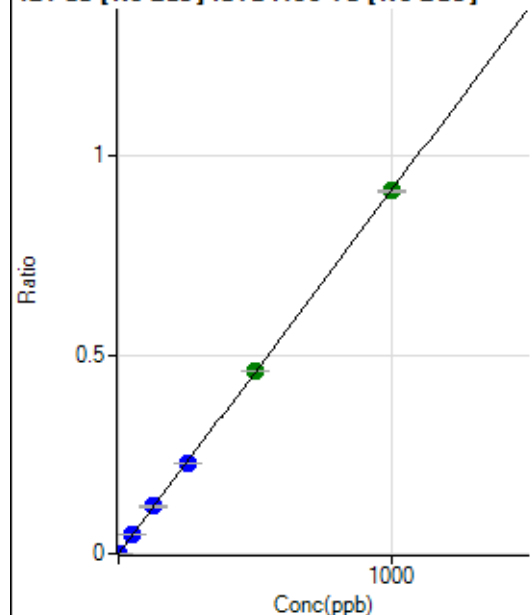
$$R = 1.0000$$

$$DL = 0.0121$$

Weight: <None>

Min Conc: 0

121 Sb [No Gas] ISTD : 159 Tb [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	47.22	0.0000	P	10.7
2	☐	0.200					
3	☐	2.000	2.098	29125.39	0.0019	P	1.1
4	☐	50.000	52.587	728033.98	0.0480	P	1.0
5	☐	125.000	129.956	1754097.78	0.1187	P	0.6
6	☐	250.000	250.433	3271569.24	0.2288	P	0.1
7	☐	500.000	501.573	6538473.62	0.4582	A	0.5
8	☐	1000.000	998.356	12828798.38	0.9120	A	0.9
9	☐			22577.26	0.0015	P	2.3

$$y = 9.1349\text{E-}004 * x + 3.0459\text{E-}006$$

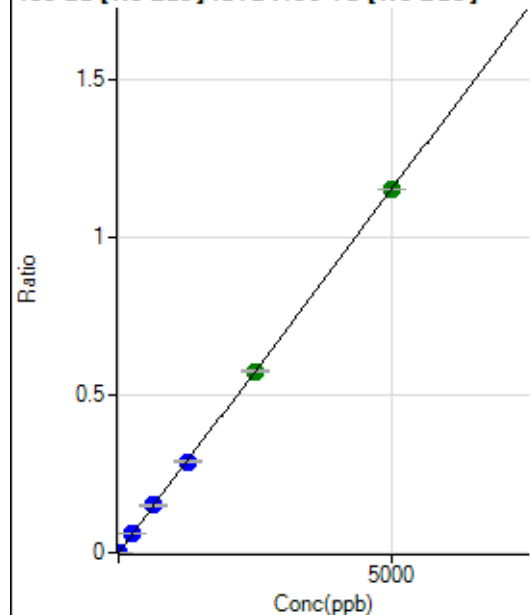
$$R = 1.0000$$

$$DL = 0.001067$$

Weight: <None>

Min Conc: 0

135 Ba [No Gas] ISTD : 159 Tb [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	25.00	0.0000	P	33.0
2	☐	1.000					
3	☐	10.000	10.456	36496.17	0.0024	P	1.1
4	☐	250.000	261.472	910932.84	0.0601	P	0.9
5	☐	625.000	650.672	2210085.27	0.1496	P	0.9
6	☐	1250.000	1256.680	4131125.44	0.2889	P	1.0
7	☐	2500.000	2499.332	8198802.61	0.5746	A	0.9
8	☐	5000.000	4994.880	16152353.14	1.1482	A	0.1
9	☐			5304.03	0.0004	P	5.7

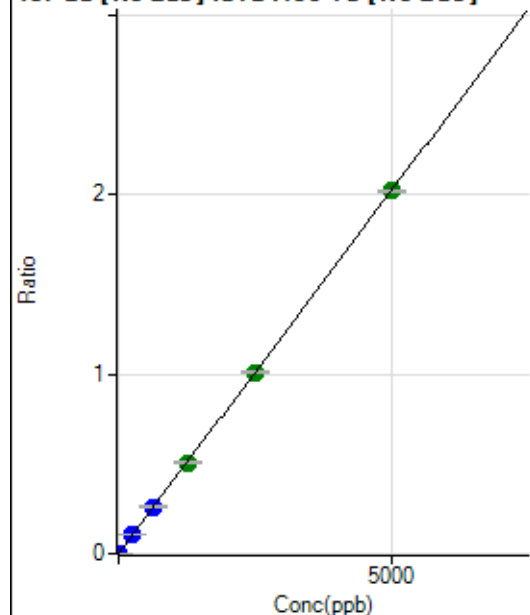
$$y = 2.2988\text{E-}004 * x + 1.6111\text{E-}006$$

$$R = 1.0000$$

$$DL = 0.006931$$

Weight: <None>

Min Conc: 0

¹³⁷Ba [No Gas] ISTD : ¹⁵⁹Tb [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	19.45	0.0000	P	25.3
2	☐	1.000					
3	☐	10.000	10.520	64525.86	0.0043	P	2.9
4	☐	250.000	259.962	1592319.06	0.1051	P	0.6
5	☐	625.000	646.716	3862083.68	0.2614	P	0.8
6	☐	1250.000	1255.588	7256784.10	0.5075	A	1.5
7	☐	2500.000	2499.101	14414030.01	1.0101	A	0.4
8	☐	5000.000	4995.839	28403674.94	2.0192	A	0.6
9	☐			9289.60	0.0006	P	5.0

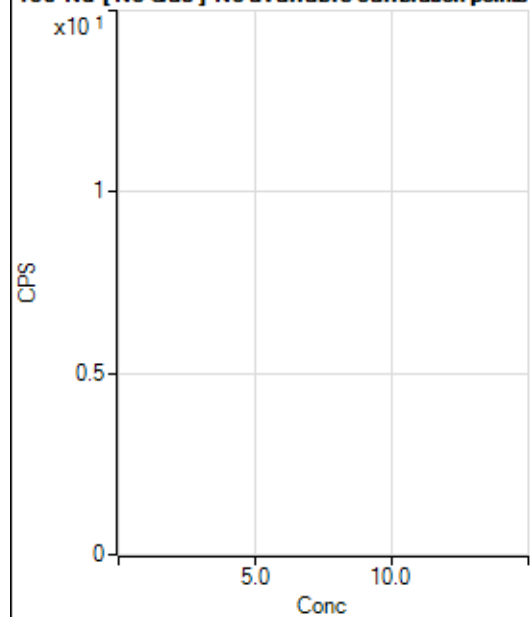
$$y = 4.0417\text{E-}004 * x + 1.2550\text{E-}006$$

$$R = 1.0000$$

$$DL = 0.002357$$

Weight: <None>

Min Conc: 0

¹⁵⁰Nd [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			2.22		P	173.2
2	☐						
3	☐			8.89		P	43.3
4	☐			88.89		P	24.1
5	☐			162.23		P	19.4
6	☐			268.90		P	27.2
7	☐			548.92		P	15.4
8	☐			1011.18		P	5.6
9	☐			275.57		P	18.2

150 Nd [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			2.22		P	173.2
2	☐						
3	☐			1.11		P	173.2
4	☐			8.89		P	43.3
5	☐			26.67		P	12.5
6	☐			32.22		P	15.8
7	☐			46.67		P	18.9
8	☐			78.89		P	2.4
9	☐			140.01		P	28.9

156 Dy [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			11.11		P	86.6
2	☐						
3	☐			13.89		P	34.7
4	☐			16.67		P	50.0
5	☐			30.56		P	31.5
6	☐			69.45		P	36.7
7	☐			136.12		P	23.2
8	☐			177.79		P	7.2
9	☐			197.23		P	13.6

156 Dy [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			7.78		P	65.5
2	☐						
3	☐			2.22		P	86.6
4	☐			13.34		P	43.3
5	☐			31.11		P	24.7
6	☐			47.78		P	26.4
7	☐			110.01		P	18.9
8	☐			204.45		P	12.2
9	☐			68.89		P	26.7

160 Gd [No Gas] Noavailable calibration poin...

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			88.89		P	19.5
2	☐						
3	☐			86.11		P	11.2
4	☐			100.00		P	8.3
5	☐			77.78		P	12.4
6	☐			86.12		P	5.6
7	☐			113.89		P	29.6
8	☐			94.45		P	18.4
9	☐			175.01		P	33.3

160 Gd [He] No available calibration points

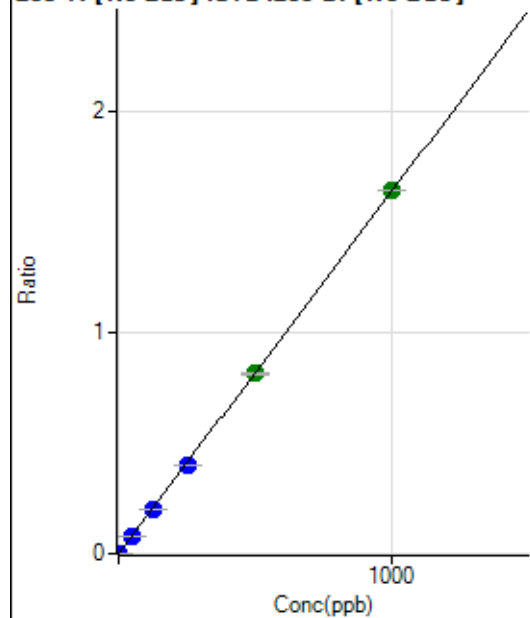
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			182.23		P	14.7
2	☐						
3	☐			164.45		P	14.4
4	☐			191.12		P	4.4
5	☐			185.56		P	10.8
6	☐			168.89		P	18.8
7	☐			165.56		P	24.0
8	☐			187.78		P	11.8
9	☐			216.67		P	2.7

164 Er [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			50.00		P	16.7
2	☐						
3	☐			69.45		P	50.0
4	☐			66.67		P	21.6
5	☐			52.78		P	50.8
6	☐			47.22		P	27.0
7	☐			63.89		P	83.9
8	☐			80.56		P	31.6
9	☐			116.67		P	25.8

164 Er [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			20.00		P	60.1
2	☐						
3	☐			46.67		P	25.8
4	☐			20.00		P	28.9
5	☐			33.33		P	26.5
6	☐			26.66		P	94.4
7	☐			33.33		P	30.0
8	☐			44.44		P	22.9
9	☐			36.67		P	24.1

203 Tl [No Gas] ISTD :209 Bi [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	138.89	0.0000	P	33.3
2	☐	0.100					
3	☐	1.000	0.991	17200.61	0.0016	P	0.7
4	☐	50.000	48.886	838898.28	0.0799	P	0.8
5	☐	125.000	122.765	2068782.10	0.2006	P	0.6
6	☐	250.000	244.859	4022090.41	0.4001	P	0.4
7	☐	500.000	497.749	7974311.72	0.8133	A	0.8
8	☐	1000.000	1002.746	15334450.69	1.6384	A	0.2
9	☐			7427.41	0.0008	P	2.8

$$y = 0.0016 * x + 1.2841E-005$$

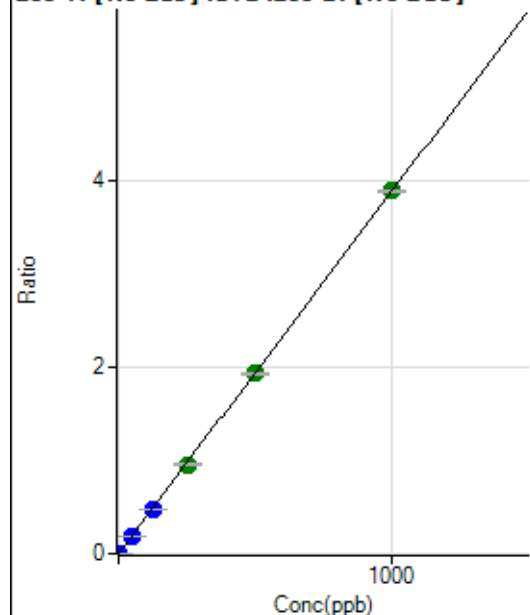
$$R = 1.0000$$

$$DL = 0.007848$$

Weight: <None>

Min Conc: 0

205 Tl [No Gas] ISTD :209 Bi [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	338.91	0.0000	P	15.7
2	☐	0.100					
3	☐	1.000	1.006	41382.05	0.0039	P	2.0
4	☐	50.000	49.288	2004621.62	0.1909	P	0.8
5	☐	125.000	124.284	4964052.93	0.4813	P	0.4
6	☐	250.000	246.709	9604757.25	0.9554	A	0.8
7	☐	500.000	497.461	18888697.82	1.9265	A	1.2
8	☐	1000.000	1002.217	36325588.31	3.8812	A	0.3
9	☐			17426.08	0.0020	P	1.1

$$y = 0.0039 * x + 3.1300E-005$$

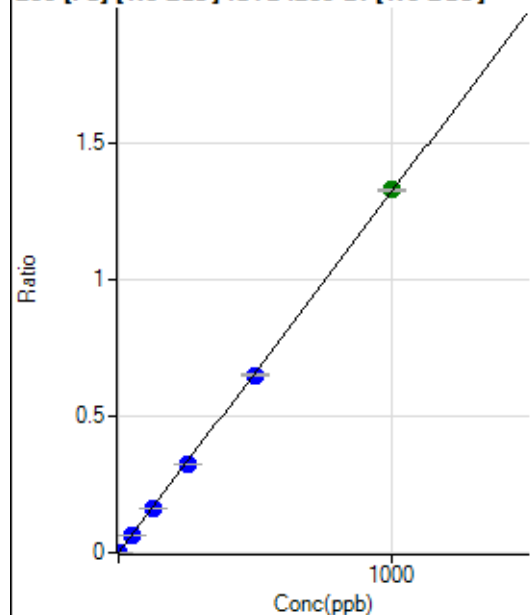
$$R = 1.0000$$

$$DL = 0.00381$$

Weight: <None>

Min Conc: 0

206 [Pb] [No Gas] ISTD :209 Bi [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	600.03	0.0001	P	6.6
2	☐	0.100					
3	☐	1.000	1.015	14736.38	0.0014	P	1.2
4	☐	50.000	48.999	681376.96	0.0649	P	0.4
5	☐	125.000	123.839	1690425.04	0.1639	P	0.7
6	☐	250.000	244.711	3255460.54	0.3238	P	0.5
7	☐	500.000	491.815	6380613.97	0.6508	P	1.2
8	☐	1000.000	1005.610	12453021.46	1.3306	A	0.5
9	☐			18005.22	0.0020	P	1.2

$$y = 0.0013 * x + 5.5426E-005$$

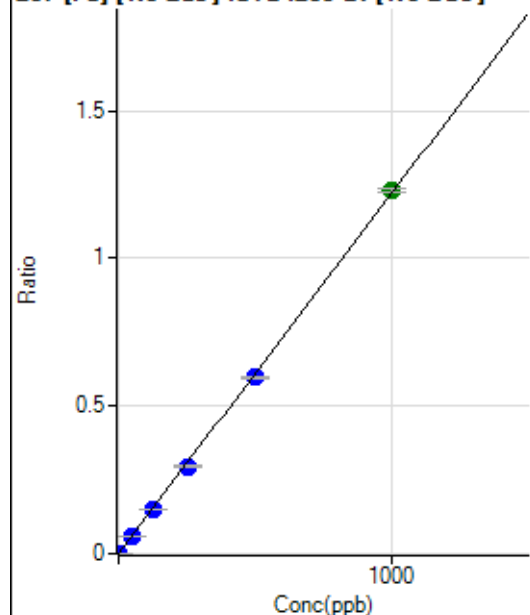
$$R = 0.9999$$

$$DL = 0.0083$$

Weight: <None>

Min Conc: 0

207 [Pb] [No Gas] ISTD :209 Bi [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	505.58	0.0000	P	10.5
2	☐	0.100					
3	☐	1.000	0.994	13269.92	0.0013	P	2.6
4	☐	50.000	48.575	622914.65	0.0593	P	0.4
5	☐	125.000	122.635	1543783.30	0.1497	P	0.5
6	☐	250.000	242.485	2974945.52	0.2959	P	1.0
7	☐	500.000	490.349	5866866.16	0.5984	P	1.3
8	☐	1000.000	1007.071	11501426.88	1.2289	A	0.9
9	☐			15793.11	0.0018	P	1.7

$$y = 0.0012 * x + 4.6698E-005$$

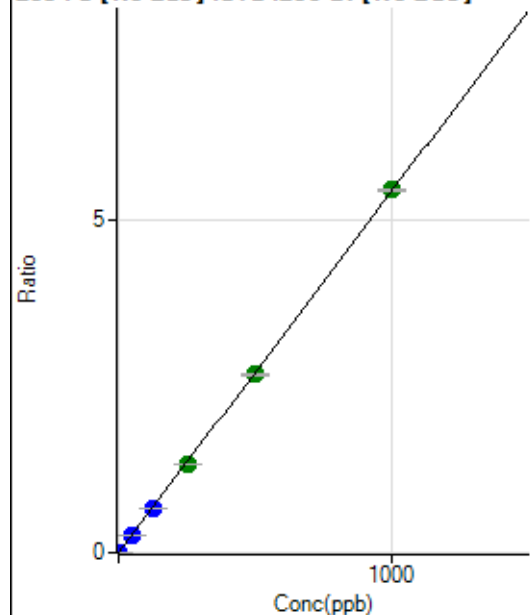
$$R = 0.9999$$

$$DL = 0.012$$

Weight: <None>

Min Conc: 0

208 Pb [No Gas] ISTD :209 Bi [No Gas]



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	2348.30	0.0002	P	2.6
2	☐	0.100					
3	☐	1.000	1.008	60049.39	0.0057	P	1.6
4	☐	50.000	49.039	2801507.20	0.2668	P	0.1
5	☐	125.000	123.558	6929034.23	0.6719	P	0.3
6	☐	250.000	243.859	13328009.64	1.3258	A	0.9
7	☐	500.000	493.529	26305974.43	2.6830	A	1.0
8	☐	1000.000	1004.999	51131444.78	5.4633	A	0.6
9	☐			72813.79	0.0082	P	1.2

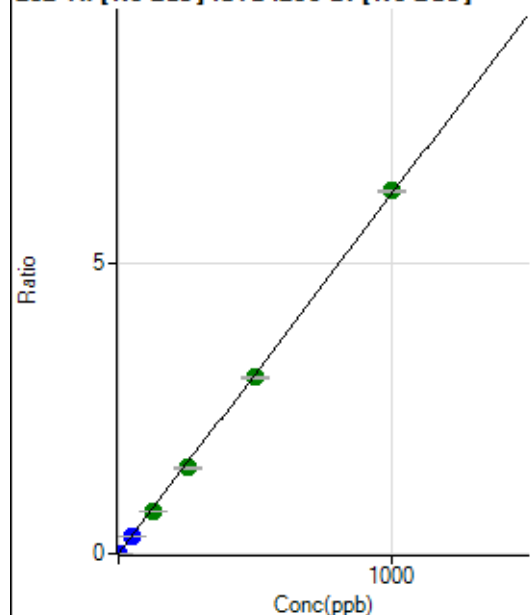
$$y = 0.0054 * x + 2.1689E-004$$

$$R = 0.9999$$

$$DL = 0.003161$$

Weight: <None>

Min Conc: 0

232 Th [No Gas] ISTD :209 Bi [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	46.30	0.0000	P	29.7
2	☐	0.100					
3	☐	1.000	0.931	60939.89	0.0058	P	0.3
4	☐	50.000	45.766	2982802.00	0.2841	P	0.2
5	☐	125.000	116.972	7487113.25	0.7260	A	0.5
6	☐	250.000	238.215	14863056.58	1.4785	A	1.1
7	☐	500.000	490.081	29822276.13	3.0417	A	1.4
8	☐	1000.000	1009.121	58619264.27	6.2632	A	0.2
9	☐			18565.51	0.0021	P	4.8

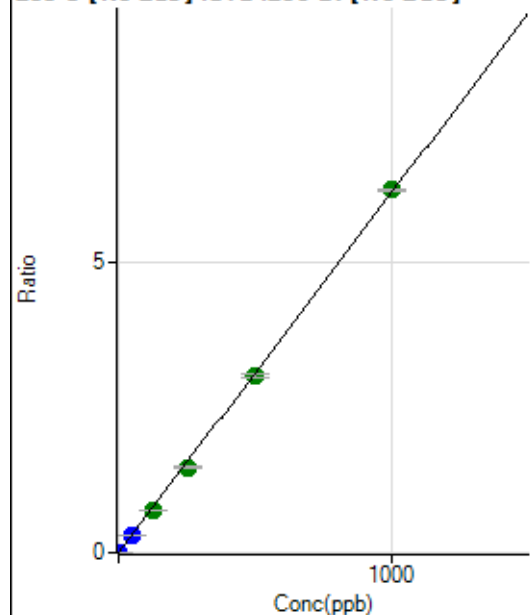
$$y = 0.0062 * x + 4.2726E-006$$

$$R = 0.9998$$

$$DL = 0.0006128$$

Weight: <None>

Min Conc: 0

238 U [No Gas] ISTD :209 Bi [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	69.45	0.0000	P	38.6
2	☐	0.100					
3	☐	1.000	0.925	60398.88	0.0057	P	2.1
4	☐	50.000	45.903	2981630.19	0.2839	P	0.6
5	☐	125.000	116.901	7457360.59	0.7231	A	0.4
6	☐	250.000	237.655	14777990.78	1.4701	A	0.8
7	☐	500.000	491.740	29822860.04	3.0417	A	1.1
8	☐	1000.000	1008.434	58380710.33	6.2378	A	0.4
9	☐			15329.56	0.0017	P	5.2

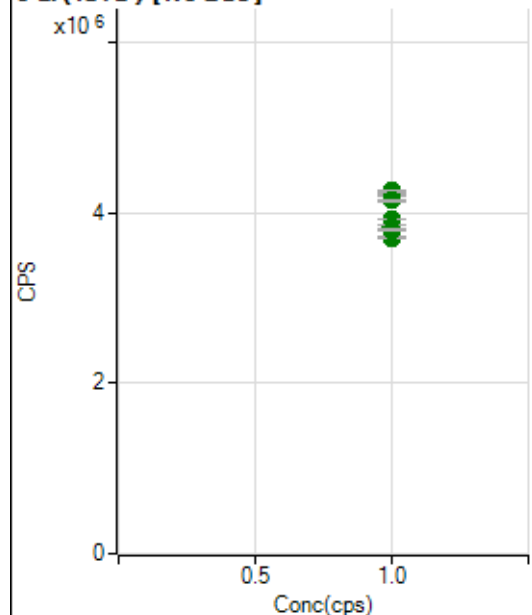
$$y = 0.0062 * x + 6.4167E-006$$

$$R = 0.9999$$

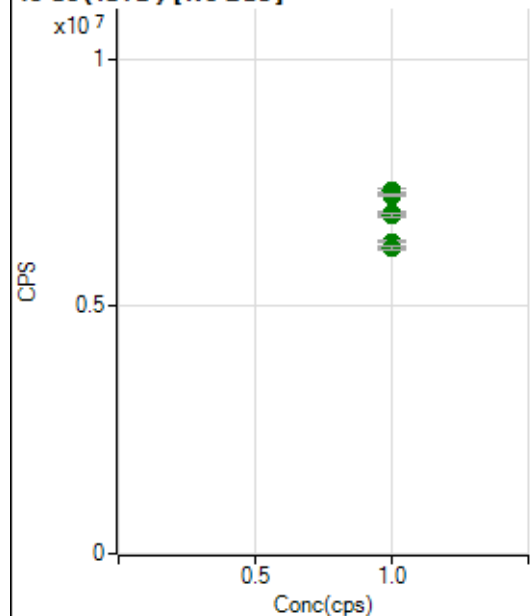
$$DL = 0.001202$$

Weight: <None>

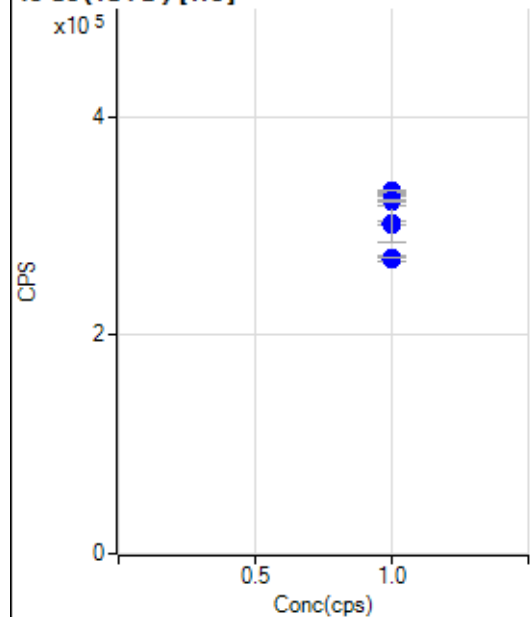
Min Conc: 0

6 Li (ISTD) [No Gas]

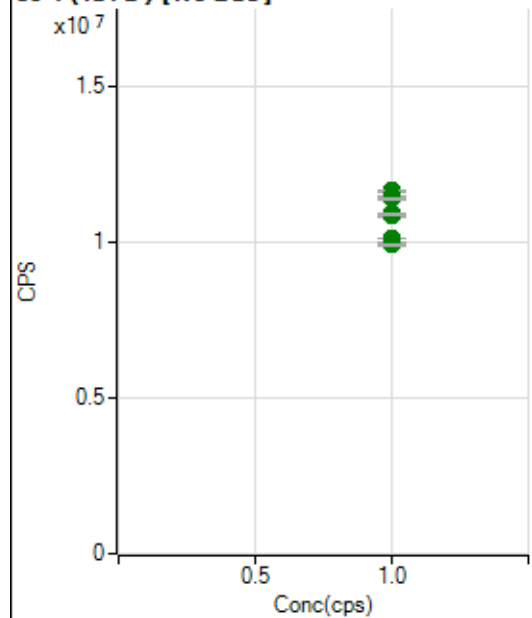
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4229672.13		A	0.4
2	☐	1.000					
3	☐	1.000		4214679.28		A	0.6
4	☐	1.000		4263070.15		A	0.2
5	☐	1.000		4152840.11		A	0.7
6	☐	1.000		3926459.21		A	0.2
7	☐	1.000		3834268.94		A	1.1
8	☐	1.000		3716254.18		A	0.6
9	☐	1.000		3801028.38		A	0.4

45 Sc (ISTD) [No Gas]

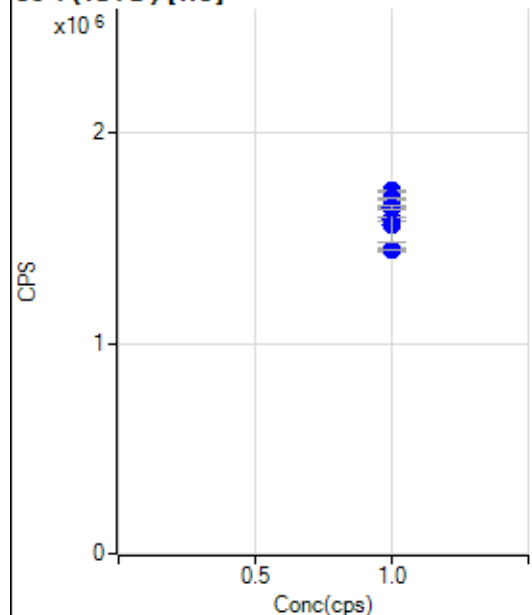
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		7331865.09		A	1.0
2	☐	1.000					
3	☐	1.000		7306225.86		A	0.5
4	☐	1.000		7239271.26		A	0.6
5	☐	1.000		6884859.79		A	1.3
6	☐	1.000		6312454.22		A	0.5
7	☐	1.000		6160859.90		A	0.6
8	☐	1.000		6175088.94		A	1.0
9	☐	1.000		6849313.09		A	1.2

45 Sc (ISTD) [He]

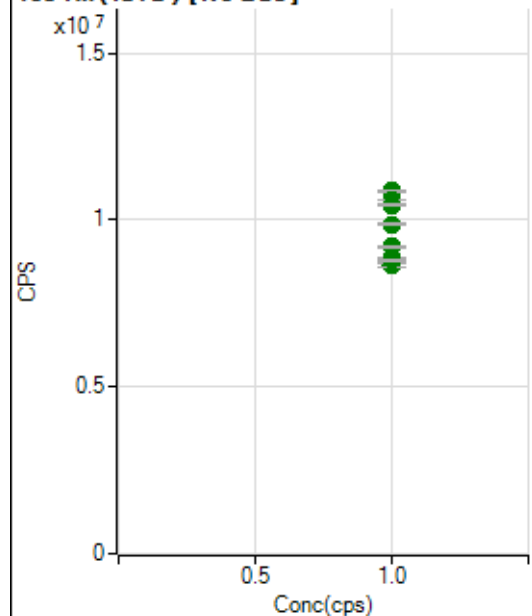
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		328379.79		P	1.0
2	☐	1.000					
3	☐	1.000		332016.64		P	0.8
4	☐	1.000		322202.59		P	0.5
5	☐	1.000		303002.53		P	1.0
6	☐	1.000		269555.94		P	1.9
7	☐	1.000		271109.26		P	0.1
8	☐	1.000		301503.13		P	11.3
9	☐	1.000		322938.62		P	1.0

89 Y (ISTD) [No Gas]

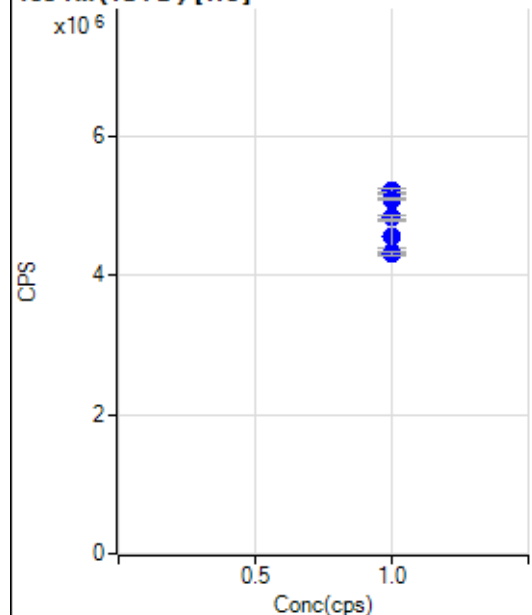
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		11669360.80		A	0.5
2	☐	1.000					
3	☐	1.000		11483406.22		A	0.6
4	☐	1.000		11412342.47		A	1.0
5	☐	1.000		10865562.62		A	0.6
6	☐	1.000		10150413.53		A	0.2
7	☐	1.000		10018035.27		A	0.4
8	☐	1.000		9933491.79		A	0.6
9	☐	1.000		10917962.20		A	1.0

89 Y (ISTD) [He]

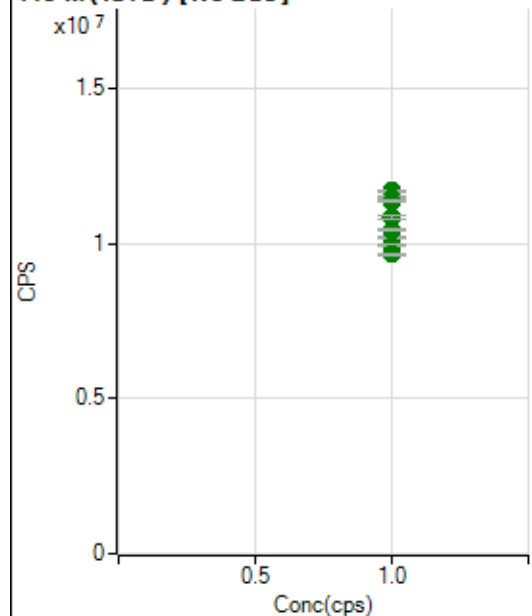
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1724628.05		P	0.9
2	☐	1.000					
3	☐	1.000		1724698.86		P	0.9
4	☐	1.000		1687048.93		P	0.3
5	☐	1.000		1592754.42		P	1.4
6	☐	1.000		1443775.64		P	1.7
7	☐	1.000		1447293.80		P	0.2
8	☐	1.000		1563792.06		P	10.2
9	☐	1.000		1645613.45		P	1.1

103 Rh (ISTD) [No Gas]

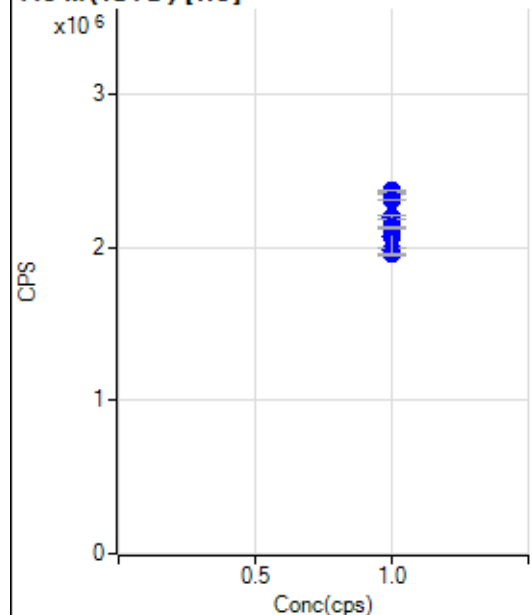
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		10864477.33		A	0.6
2	☐	1.000					
3	☐	1.000		10615400.32		A	0.1
4	☐	1.000		10442497.89		A	0.7
5	☐	1.000		9872942.41		A	0.9
6	☐	1.000		9190355.24		A	0.6
7	☐	1.000		8850981.10		A	0.9
8	☐	1.000		8628852.54		A	1.0
9	☐	1.000		8787524.94		A	1.0

103 Rh (ISTD) [He]

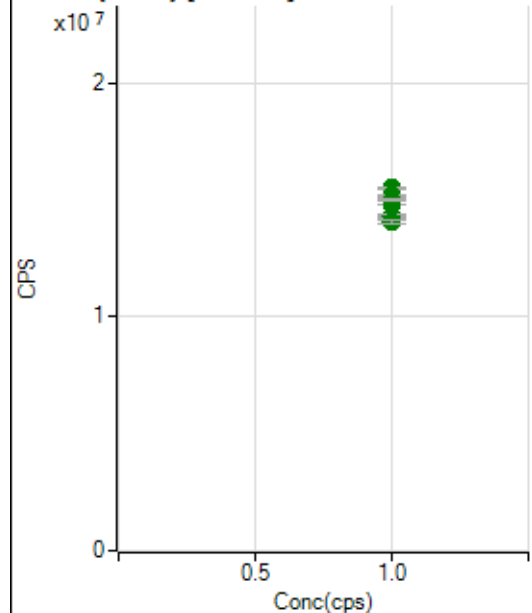
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5187894.99		P	0.9
2	☐	1.000					
3	☐	1.000		5218833.47		P	1.0
4	☐	1.000		5098294.51		P	0.5
5	☐	1.000		4827870.27		P	1.7
6	☐	1.000		4355143.23		P	1.4
7	☐	1.000		4311645.21		P	0.3
8	☐	1.000		4566524.62		P	10.7
9	☐	1.000		4314807.82		P	0.9

115 In (ISTD) [No Gas]

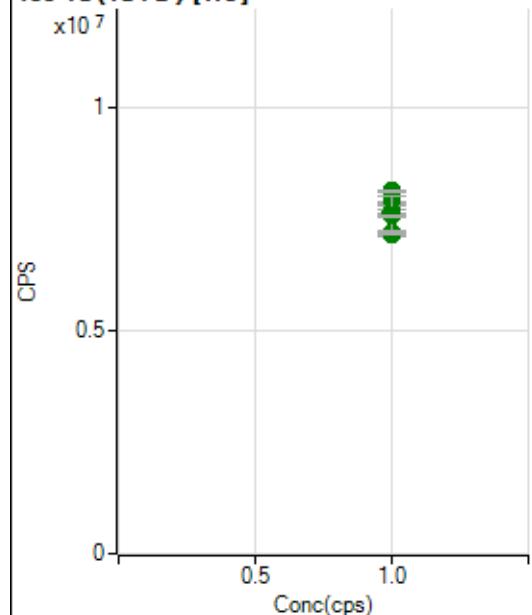
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		11690447.93		A	0.7
2	☐	1.000					
3	☐	1.000		11470026.51		A	0.5
4	☐	1.000		11359624.78		A	0.5
5	☐	1.000		10835362.09		A	0.7
6	☐	1.000		10202688.16		A	0.5
7	☐	1.000		9929258.31		A	0.8
8	☐	1.000		9637073.53		A	1.2
9	☐	1.000		10420467.61		A	0.8

115 In (ISTD) [He]

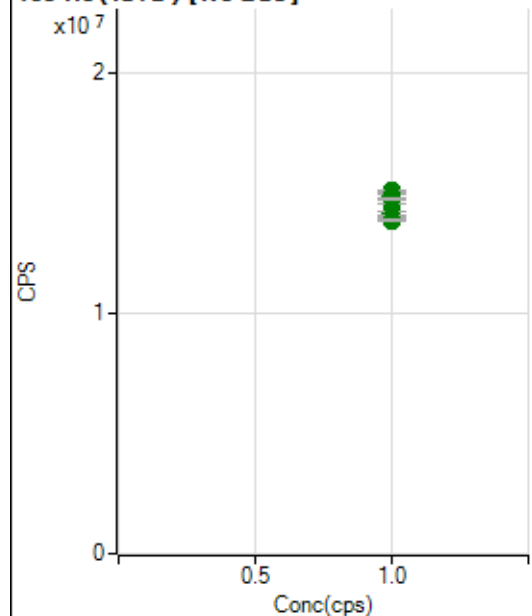
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		2358545.58		P	0.8
2	☐	1.000					
3	☐	1.000		2369497.67		P	0.9
4	☐	1.000		2311896.90		P	0.4
5	☐	1.000		2197929.39		P	1.5
6	☐	1.000		1978904.50		P	1.9
7	☐	1.000		1956077.37		P	0.1
8	☐	1.000		2066044.25		P	11.2
9	☐	1.000		2129430.32		P	0.9

159 Tb (ISTD) [No Gas]

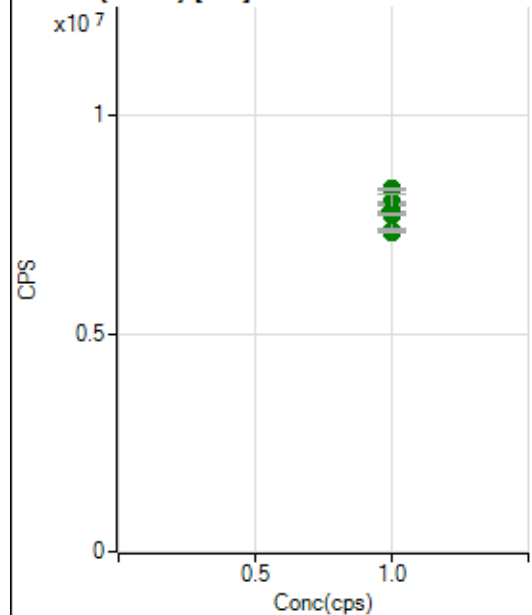
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		15509450.60		A	0.6
2	☐	1.000					
3	☐	1.000		15173743.11		A	0.6
4	☐	1.000		15155071.17		A	0.8
5	☐	1.000		14775581.17		A	0.3
6	☐	1.000		14300614.23		A	0.6
7	☐	1.000		14270861.31		A	1.1
8	☐	1.000		14067160.76		A	0.8
9	☐	1.000		14984407.00		A	0.7

159 Tb (ISTD) [He]

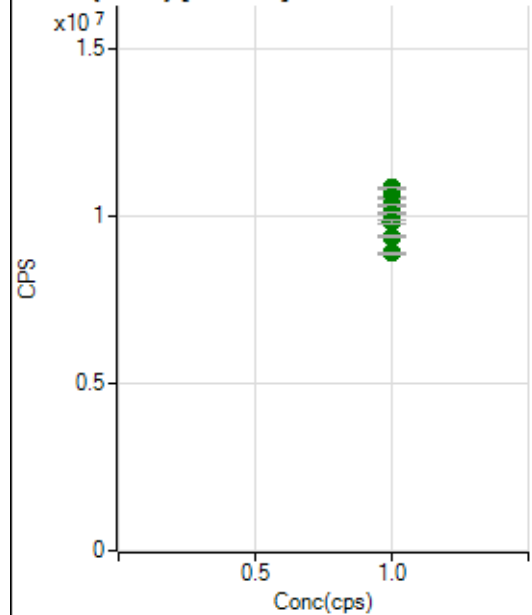
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		8133200.02		A	0.4
2	☐	1.000					
3	☐	1.000		7883299.12		A	0.4
4	☐	1.000		7804631.48		A	0.1
5	☐	1.000		7679533.91		A	1.4
6	☐	1.000		7168618.99		A	1.1
7	☐	1.000		7178536.28		A	0.2
8	☐	1.000		7627835.65		A	10.2
9	☐	1.000		7580853.43		A	0.6

165 Ho (ISTD) [No Gas]

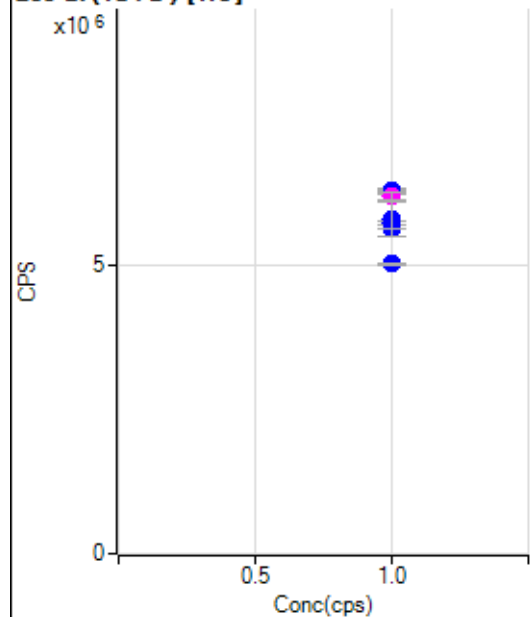
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		15111503.98		A	0.7
2	☐	1.000					
3	☐	1.000		14825040.26		A	0.1
4	☐	1.000		14882552.94		A	0.9
5	☐	1.000		14548144.60		A	0.1
6	☐	1.000		14163967.33		A	0.9
7	☐	1.000		14042774.62		A	0.8
8	☐	1.000		13863809.34		A	0.6
9	☐	1.000		14801303.98		A	0.5

165 Ho (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		8318102.80		A	0.6
2	☐	1.000					
3	☐	1.000		8030009.60		A	0.2
4	☐	1.000		7944863.28		A	0.3
5	☐	1.000		7859716.48		A	1.7
6	☐	1.000		7334611.21		A	1.0
7	☐	1.000		7359461.90		A	0.6
8	☐	1.000		7796674.47		A	10.3
9	☐	1.000		7733166.90		A	0.5

209 Bi (ISTD) [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		10826574.56		A	0.8
2	☐	1.000					
3	☐	1.000		10539848.04		A	0.1
4	☐	1.000		10500894.22		A	0.5
5	☐	1.000		10312998.67		A	0.6
6	☐	1.000		10052972.49		A	0.5
7	☐	1.000		9805627.56		A	1.4
8	☐	1.000		9359185.49		A	0.7
9	☐	1.000		8869496.81		A	0.4

209 Bi (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6275473.24		P	1.0
2	☐	1.000					
3	☐	1.000		6275853.59		P	0.6
4	☐	1.000		6245064.84		P	0.6
5	☐	1.000		6179820.39		M	2.2
6	☐	1.000		5713734.98		P	1.4
7	☐	1.000		5619162.35		P	0.4
8	☐	1.000		5801586.37		P	10.3
9	☐	1.000		5013256.00		P	0.5

US EPA Tune Check Sample Report

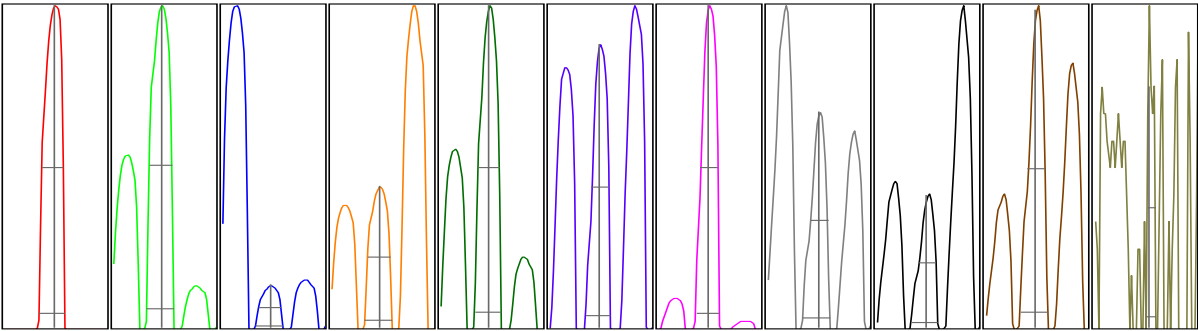
Batch Folder D:\ICP-MS Data\P7111518-MS.b
Report Comment
Instrument Name G8403A JP14410463

[No Gas]

Mass	Count (Mean)	RSD% (Actual)	RSD% (Required)	RSD% (Flag)
9	19872	0.28	5.00	
24	153248	0.58	5.00	
25	20247	0.44	5.00	
26	23359	0.48	5.00	
59	135620	0.56	5.00	
113	17277	0.32	5.00	
115	205748	0.57	5.00	
206	54329	0.30	5.00	
207	49844	0.29	5.00	
208	117912	0.48	5.00	
220	0	30.90		

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
9	19897	19869	19903	19915	19777
24	153041	153654	154342	153275	151929
25	20181	20258	20301	20358	20135
26	23411	23316	23513	23344	23210
59	136000	136086	136329	135201	134483
113	17247	17362	17302	17247	17224
115	205677	206812	206617	205789	203847
206	54141	54470	54514	54313	54205
207	49696	49923	49977	49945	49680
208	117313	118204	118183	118555	117306
220	0	0	0	0	0

Integration Time [sec] = 0.1



Mass	Peak Height	Axis (Actual)	Axis (Required)	Axis (Flag)	Width-X% (Actual)	Width-X% (Required)	Width- X% (Flag)
9	33782	9.00	8.9 - 9.1		0.741	0.900	
24	250199	23.95	23.9 - 24.1		0.785	0.900	
25	33381	24.95	24.9 - 25.1		0.785	0.900	
26	38453	25.95	25.9 - 26.1		0.785	0.900	
59	238099	58.95	58.9 - 59.1		0.776	0.900	
113	33971	113.00	112.9 - 113.1		0.718	0.900	
115	403635	115.00	114.9 - 115.1		0.689	0.900	
206	107308	206.05	205.9 - 206.1		0.786	0.900	
207	96384	207.00	206.9 - 207.1		0.777	0.900	
208	231327	208.00	207.9 - 208.1		0.815	0.900	
220	0	220.15	-		0.295		

X% = 5 Integration Time [sec] = 0.1 Acquisition Time [sec] = 268 Y Axis = Linear

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
RF Power	1600	W	Carrier Gas	0.80	L/min	S/C Temp		2 °C
RF Matching	1.80	V	Option Gas	0.0	%	Gas Switch		Dilution Gas
Smpl Depth	9.0	mm	Nebulizer Pump	0.10	rpm	Makeup/Dilution Gas		0.37 L/min

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	6.6	V	Deflect	14.4	V
Extract 2	-115.0	V	Cell Entrance	-30	V	Plate Bias	-35	V
Omega Bias	-60	V	Cell Exit	-50	V			

Cell Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Use Gas	No		OctP Bias	-8.0	V	Energy Discrimination		5.0 V
He Flow	0.0	mL/min	OctP RF	180	V			

[He]

Mass	Count (Mean)	RSD% (Actual)	RSD% (Required)
59	34213	0.29	
89	18422	0.39	
205	48762	0.19	

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
59	34101	34152	34285	34181	34348
89	18428	18493	18330	18371	18489
205	48757	48856	48694	48856	48647

Integration Time [sec] = 0.1

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
RF Power	1600	W	Carrier Gas	0.80	L/min	S/C Temp		2 °C
RF Matching	1.80	V	Option Gas	0.0	%	Gas Switch		Dilution Gas
Smpl Depth	9.0	mm	Nebulizer Pump	0.10	rpm	Makeup/Dilution Gas		0.37 L/min

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	7.7	V	Deflect	1.8	V
Extract 2	-120.0	V	Cell Entrance	-40	V	Plate Bias	-60	V
Omega Bias	-70	V	Cell Exit	-60	V			

Cell Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Use Gas	Yes		OctP Bias	-18.0	V	Energy Discrimination		5.0 V
He Flow	4.1	mL/min	OctP RF	200	V			