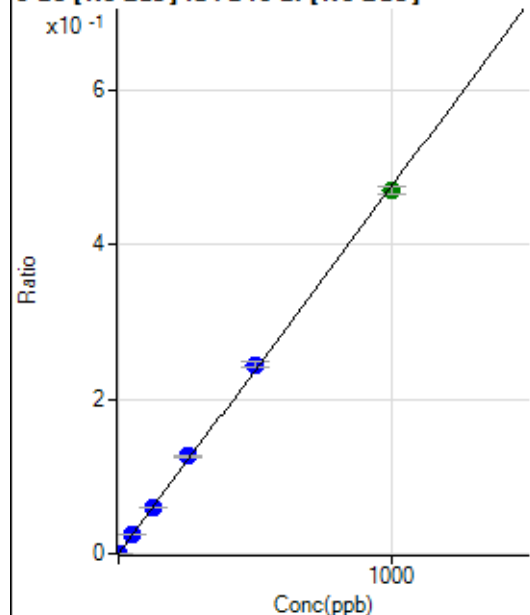


Batch Folder: D:\Agilent\ICPMH\1\DATA\P8040423 MS.b\
Analysis File: P8040423 MS.batch.bin
DA Date-Time: 2023-04-04 19:26:37
Calibration Title:
Calibration Method: External Calibration
VIS Interpolation Fit:

Level	Standard Data File	Sample Name	Acq. Date-Time
1	004CALB.d	S00	2023-04-04 11:19:38
2	005CALS.d	S02	2023-04-04 11:22:42
3	006CALS.d	S03	2023-04-04 11:25:48
4	007CALS.d	S04	2023-04-04 11:28:46
5	008CALS.d	S05	2023-04-04 11:31:47
6	009CALS.d	S06	2023-04-04 11:34:45
7	010CALS.d	S07	2023-04-04 11:37:46
8	012CALS.d	S08	2023-04-04 11:45:13

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	28.75	0.0000	P	28.9
2	☐	1.000	1.086	2159.90	0.0005	P	1.9
3	☐	50.000	53.544	103579.94	0.0254	P	0.3
4	☐	125.000	127.400	250923.29	0.0605	P	0.5
5	☐	250.000	265.792	494458.32	0.1262	P	1.1
6	☐	500.000	515.023	957704.81	0.2445	P	3.2
7	☐	1000.000	988.063	1895638.86	0.4691	A	2.2
8	☐			303.72	0.0001	P	5.8

$$y = 4.7478\text{E-}004 * x + 6.9728\text{E-}006$$

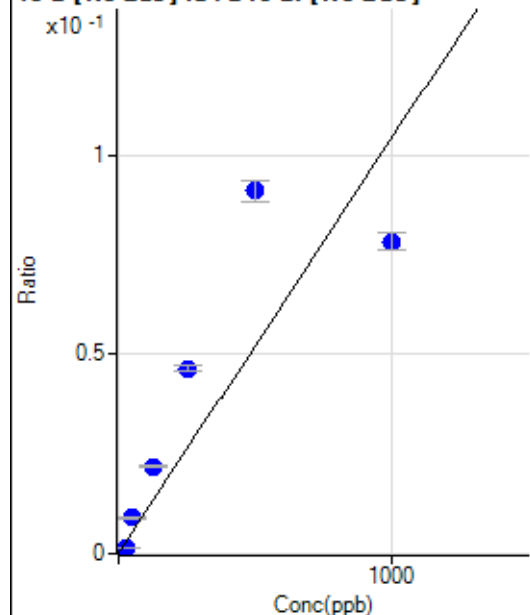
$$R = 0.9997$$

$$DL = 0.01275$$

$$BEC = 0.01469$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	426.59	0.0001	P	2.1
2	☐	25.000	13.619	6283.46	0.0015	P	7.7
3	☐	50.000	86.558	37105.51	0.0091	P	5.5
4	☐	125.000	209.167	90722.72	0.0219	P	3.5
5	☐	250.000	445.728	182215.36	0.0465	P	3.6
6	☐	500.000	873.684	356454.75	0.0910	P	5.7
7	☐	1000.000	752.162	316581.03	0.0784	P	5.3
8	☐			12550.89	0.0035	P	7.0

$$y = 1.0405\text{E-}004 * x + 1.0288\text{E-}004$$

$$R = 0.8579$$

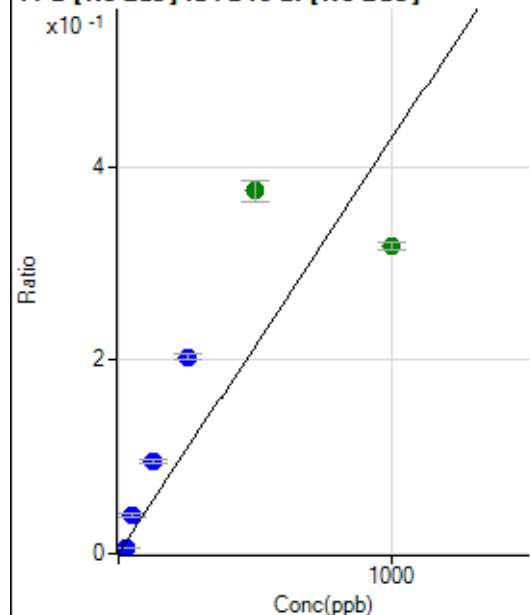
$$DL = 0.06373$$

$$BEC = 0.9888$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1769.10	0.0004	P	7.1
2	☐	25.000	14.448	27346.73	0.0066	P	6.0
3	☐	50.000	92.474	163070.63	0.0400	P	6.9
4	☐	125.000	221.907	396135.40	0.0955	P	4.2
5	☐	250.000	474.343	798073.96	0.2036	P	3.4
6	☐	500.000	874.539	1468678.60	0.3750	A	6.2
7	☐	1000.000	742.672	1287047.28	0.3185	A	2.4
8	☐			54850.23	0.0154	P	6.3

$$y = 4.2830E-004 * x + 4.2711E-004$$

$$R = 0.8476$$

$$DL = 0.2132$$

$$BEC = 0.9972$$

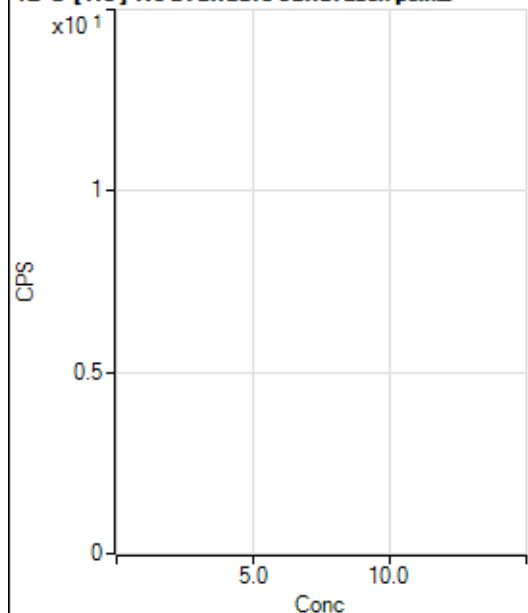
Weight: <None>

Min Conc: 0

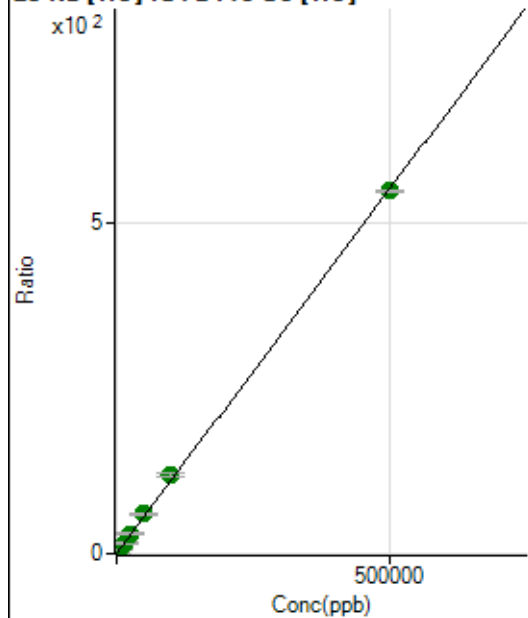
12 C [No Gas] No available calibration points



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐			5009180.97		A	2.4
2	☐			4936555.40		A	1.3
3	☐			4762351.67		A	2.2
4	☐			4829971.98		A	2.5
5	☐			4909969.90		A	2.4
6	☐			5007388.74		A	2.3
7	☐			5463605.16		A	4.4
8	☐			4728708.31		A	1.8

12 C [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			59632.68		P	1.8
2	☐			58720.72		P	0.7
3	☐			60837.58		P	1.6
4	☐			60036.81		P	2.6
5	☐			62117.91		P	1.1
6	☐			63560.16		P	0.5
7	☐			72808.48		P	0.2
8	☐			62701.13		P	1.7

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	18759.78	0.0933	P	2.5
2	☐	500.000	542.835	137311.26	0.6909	P	1.5
3	☐	5000.000	5737.487	1269826.56	6.4096	A	2.4
4	☐	12500.000	14047.540	3035464.87	15.5581	A	5.4
5	☐	25000.000	27509.260	5950542.19	30.3781	A	1.7
6	☐	50000.000	54290.020	11823130.82	59.8609	A	3.3
7	☐	100000.00	108107.13	23888015.64	119.1079	A	2.8
8	☐	500000.00	497778.00	107850863.5	548.0945	A	0.8

$$y = 0.0011 * x + 0.0933$$

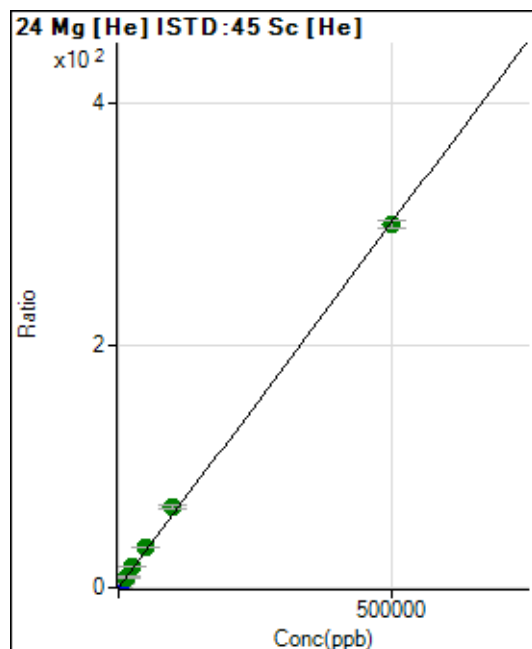
$$R = 0.9998$$

$$DL = 6.309$$

$$BEC = 84.72$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	300.01	0.0015	P	8.5
2	☐	500.000	548.224	65916.42	0.3316	P	2.7
3	☐	5000.000	5862.584	699834.93	3.5321	P	2.5
4	☐	12500.000	14323.004	1683069.98	8.6271	A	4.9
5	☐	25000.000	28220.625	3329084.97	16.9965	A	2.8
6	☐	50000.000	55740.439	6630611.39	33.5695	A	2.7
7	☐	100000.00	110645.01	13364001.17	66.6341	A	2.6
8	☐	500000.00	497081.67	58907440.20	299.3538	A	2.1

$$y = 6.0222\text{E-}004 * x + 0.0015$$

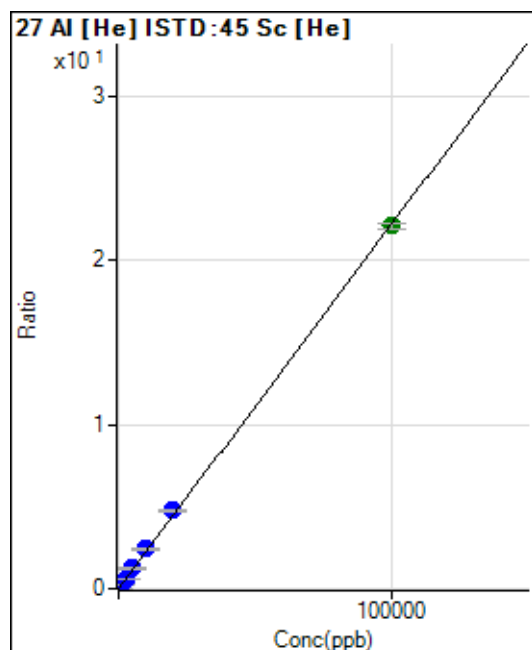
$$R = 0.9997$$

$$DL = 0.6303$$

$$BEC = 2.478$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	101.66	0.0005	P	9.1
2	☐	20.000	21.463	1045.74	0.0053	P	4.3
3	☐	1000.000	1140.074	50176.69	0.2532	P	1.6
4	☐	2500.000	2829.796	122506.71	0.6278	P	3.5
5	☐	5000.000	5575.686	242218.45	1.2366	P	2.2
6	☐	10000.000	10916.999	478123.25	2.4207	P	2.8
7	☐	20000.000	21529.024	957333.32	4.7733	P	1.6
8	☐	100000.00	99564.065	4343307.98	22.0730	A	1.7

$$y = 2.2169\text{E-}004 * x + 5.0495\text{E-}004$$

$$R = 0.9999$$

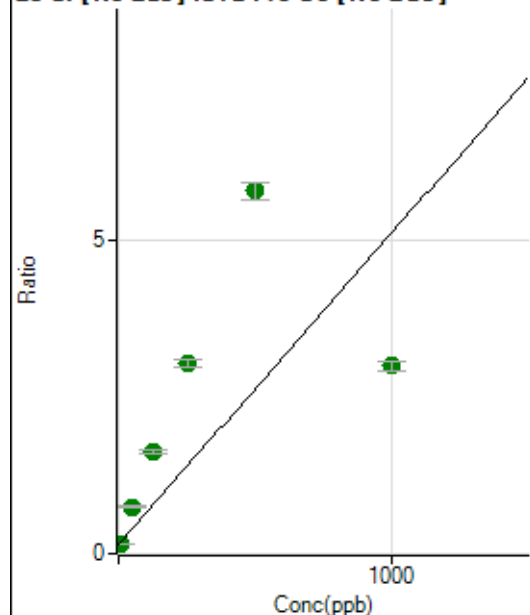
$$DL = 0.6192$$

$$BEC = 2.278$$

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	905394.63	0.1478	A	2.4
2	☐	10.000	1.822	961089.40	0.1569	A	1.3
3	☐	50.000	119.554	4582165.77	0.7428	A	4.1
4	☐	125.000	299.197	9942374.70	1.6369	A	3.3
5	☐	250.000	581.985	18457758.92	3.0442	A	4.1
6	☐	500.000	1135.012	35166588.29	5.7966	A	4.8
7	☐	1000.000	574.327	18707216.04	3.0061	A	4.9
8	☐			1137142.96	0.2036	A	6.8

$$y = 0.0050 * x + 0.1478$$

$$R = 0.6481$$

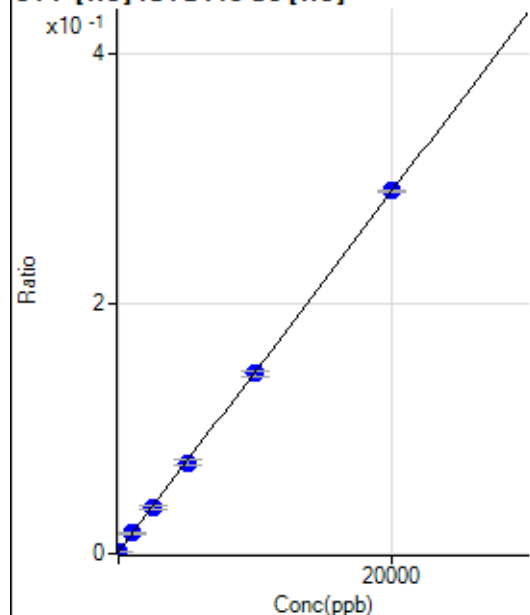
$$DL = 2.169$$

$$BEC = 29.7$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	-12.802	297.23	0.0015	P	13.8
2	☐	0.000	12.802	366.68	0.0018	P	10.9
3	☐	1000.000	1048.156	3314.35	0.0167	P	9.3
4	☐	2500.000	2478.830	7277.01	0.0373	P	7.6
5	☐	5000.000	4961.675	14296.31	0.0730	P	5.9
6	☐	10000.000	9915.907	28489.90	0.1442	P	3.1
7	☐	20000.000	20051.866	58159.11	0.2900	P	0.2
8	☐			305.56	0.0016	P	13.8

$$y = 1.4378E-005 * x + 0.0017$$

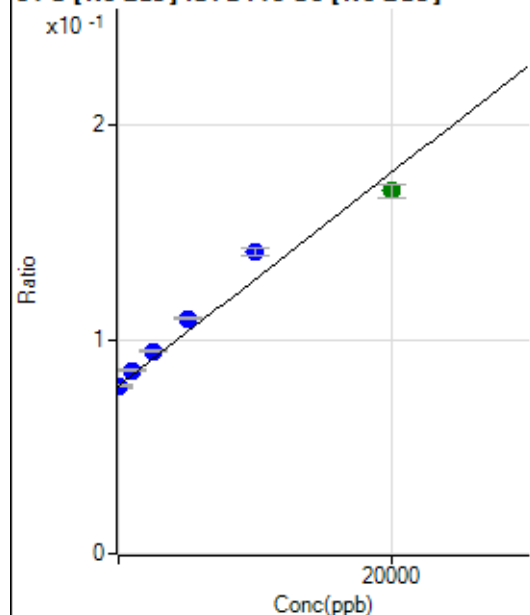
$$R = 1.0000$$

$$DL = 42.14$$

$$BEC = 115.6$$

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	-15.356	479867.69	0.0783	P	2.1
2	☐	0.000	15.356	480813.00	0.0785	P	1.9
3	☐	1000.000	1459.179	528398.30	0.0857	P	1.7
4	☐	2500.000	3188.355	572680.94	0.0943	P	1.0
5	☐	5000.000	6303.150	665808.69	0.1098	P	0.9
6	☐	10000.000	12612.046	857070.87	0.1412	P	2.7
7	☐	20000.000	18259.186	1054267.96	0.1694	A	3.5
8	☐			435960.10	0.0781	P	7.1

$$y = 4.9805E-006 * x + 0.0784$$

$$R = 0.9835$$

$$DL = 925.3$$

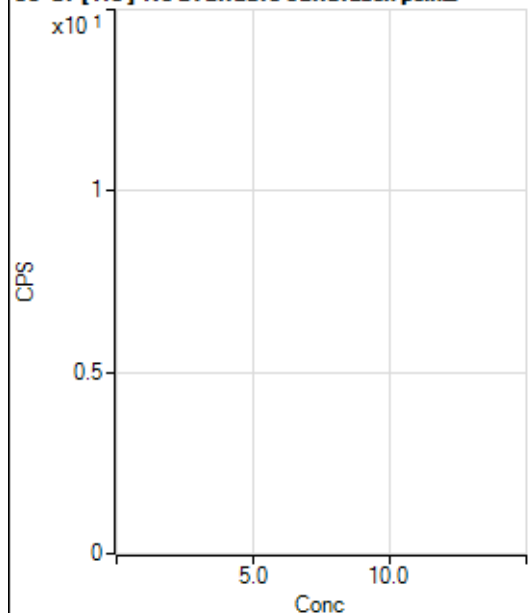
$$BEC = 1.574E+04$$

Weight: <None>

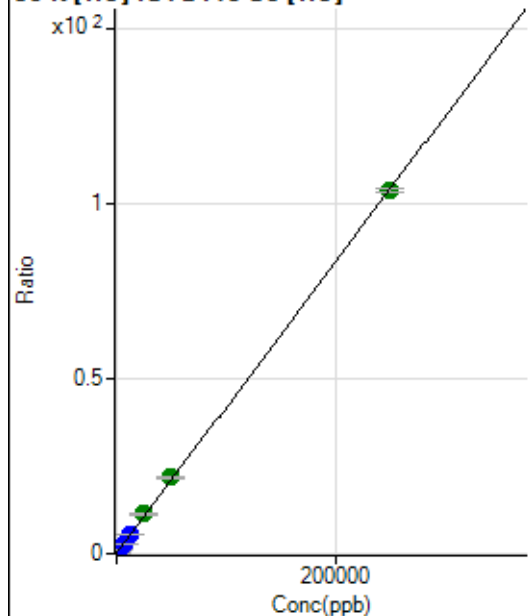
Min Conc: 0

35 Cl [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			148144.56		P	0.6
2	☐			139728.49		P	0.5
3	☐			160196.80		P	0.5
4	☐			159187.45		P	1.7
5	☐			157988.22		P	0.9
6	☐			155930.33		P	1.6
7	☐			153574.90		P	0.6
8	☐			145632.98		P	0.8

35 Cl [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			930.61		P	14.2
2	☐			952.84		P	15.9
3	☐			1011.18		P	16.0
4	☐			980.61		P	10.9
5	☐			952.84		P	6.6
6	☐			963.94		P	4.8
7	☐			963.95		P	11.3
8	☐			972.28		P	8.7

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	25172.54	0.1251	P	2.8
2	☐	500.000	529.178	68591.25	0.3452	P	3.3
3	☐	2500.000	2758.644	252037.25	1.2721	P	0.7
4	☐	6250.000	6769.240	573620.99	2.9397	P	3.6
5	☐	12500.000	13207.300	1100098.96	5.6165	P	3.4
6	☐	25000.000	26832.584	2228407.65	11.2817	A	0.6
7	☐	50000.000	52454.133	4399192.24	21.9347	A	2.6
8	☐	250000.00	249274.92	20419235.52	103.7696	A	1.1

$$y = 4.1578\text{E-}004 * x + 0.1251$$

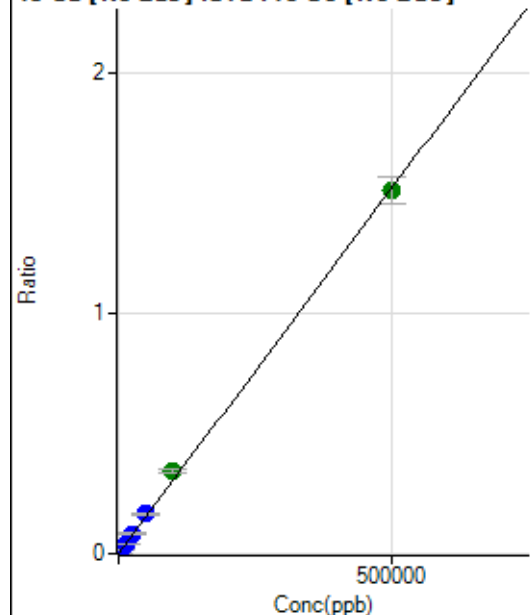
$$R = 0.9999$$

$$DL = 25.31$$

$$BEC = 301$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	134.15	0.0000	P	5.2
2	☐	500.000	487.788	9204.73	0.0015	P	1.8
3	☐	5000.000	5524.314	103549.52	0.0168	P	0.9
4	☐	12500.000	13757.852	253744.64	0.0418	P	1.6
5	☐	25000.000	27563.769	507412.87	0.0837	P	1.4
6	☐	50000.000	54383.957	1001829.71	0.1651	P	3.1
7	☐	100000.00	112909.51	2133644.42	0.3427	A	3.8
8	☐	500000.00	496814.83	8420340.18	1.5080	A	7.3

$$y = 3.0353E-006 * x + 2.1902E-005$$

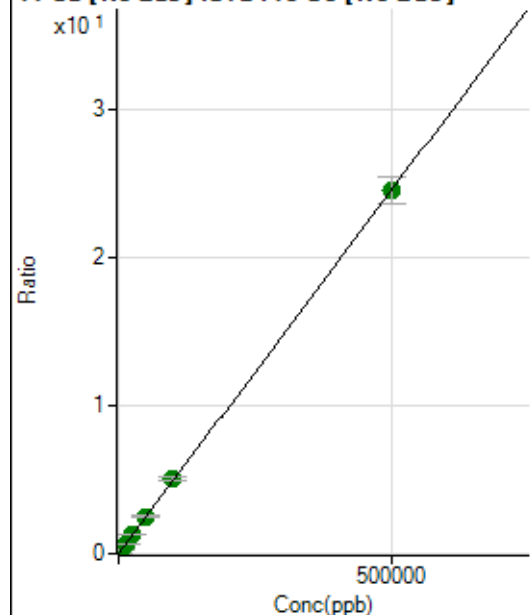
$$R = 0.9996$$

$$DL = 1.13$$

$$BEC = 7.216$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	14973.35	0.0024	P	1.9
2	☐	500.000	488.868	162154.76	0.0265	P	1.3
3	☐	5000.000	5290.407	1618888.18	0.2624	A	1.7
4	☐	12500.000	13062.949	3914256.04	0.6444	A	0.7
5	☐	25000.000	25873.057	7724018.73	1.2740	A	1.7
6	☐	50000.000	51063.974	15242600.01	2.5120	A	3.4
7	☐	100000.00	103499.78	31678004.89	5.0889	A	3.7
8	☐	500000.00	499133.02	136975771.5	24.5322	A	7.3

$$y = 4.9145E-005 * x + 0.0024$$

$$R = 1.0000$$

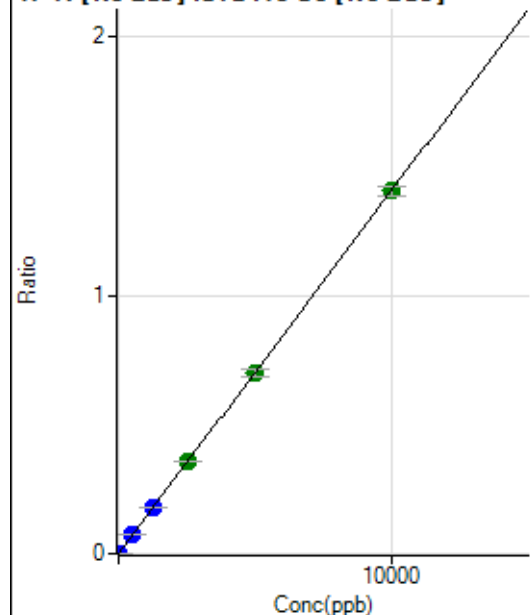
$$DL = 2.862$$

$$BEC = 49.74$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	155.56	0.0000	P	19.5
2	☐	5.000	4.847	4325.78	0.0007	P	3.6
3	☐	500.000	518.378	449339.30	0.0729	P	0.4
4	☐	1250.000	1286.082	1097627.16	0.1807	P	0.1
5	☐	2500.000	2545.798	2168824.18	0.3577	A	1.7
6	☐	5000.000	4978.086	4243187.29	0.6994	A	5.0
7	☐	10000.000	9994.079	8742187.52	1.4042	A	2.6
8	☐			1016.73	0.0002	P	12.4

$$y = 1.4050\text{E-}004 * x + 2.5370\text{E-}005$$

$$R = 1.0000$$

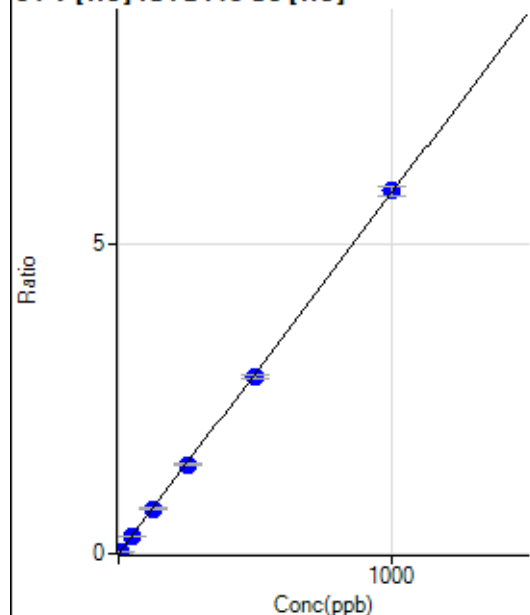
$$DL = 0.1054$$

$$BEC = 0.1806$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	5.56	0.0000	P	33.9
2	☐	5.000	4.950	5750.10	0.0289	P	3.7
3	☐	50.000	49.886	57713.70	0.2913	P	0.7
4	☐	125.000	124.190	141507.99	0.7252	P	3.1
5	☐	250.000	245.466	280741.59	1.4333	P	2.3
6	☐	500.000	491.100	566373.10	2.8675	P	2.5
7	☐	1000.000	1005.691	1177678.94	5.8721	P	2.8
8	☐			368.90	0.0019	P	6.6

$$y = 0.0058 * x + 2.7549\text{E-}005$$

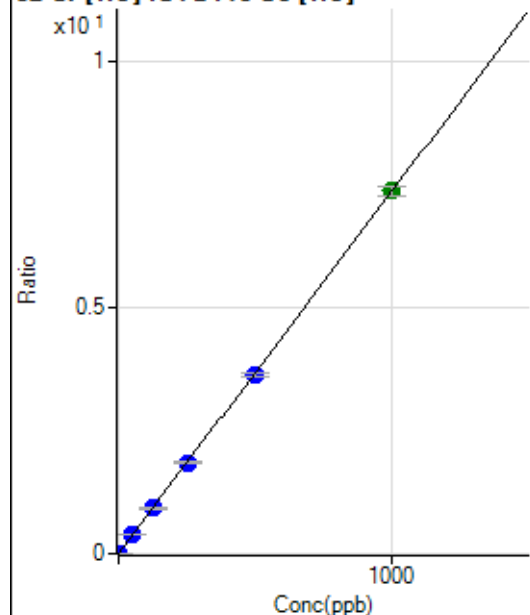
$$R = 0.9999$$

$$DL = 0.004793$$

$$BEC = 0.004718$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	630.02	0.0031	P	8.8
2	☐	2.000	1.869	3353.76	0.0169	P	1.9
3	☐	50.000	51.323	75367.56	0.3804	P	0.6
4	☐	125.000	125.419	180495.36	0.9251	P	3.9
5	☐	250.000	251.791	363161.62	1.8541	P	2.7
6	☐	500.000	494.297	718315.81	3.6367	P	2.4
7	☐	1000.000	1002.286	1478313.75	7.3709	A	2.3
8	☐			10616.24	0.0540	P	1.3

$$y = 0.0074 * x + 0.0031$$

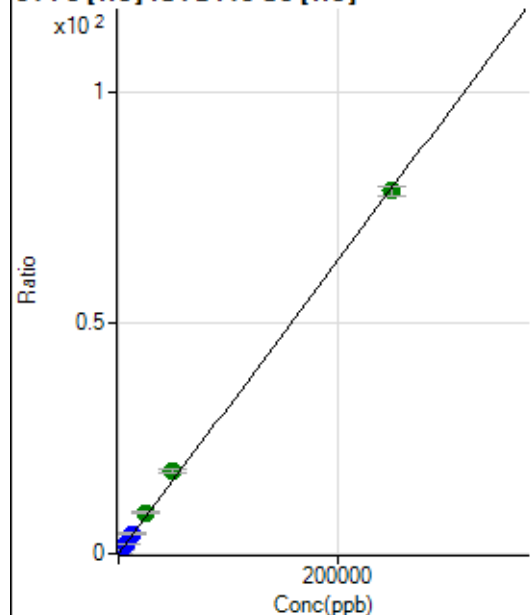
$$R = 1.0000$$

$$DL = 0.1129$$

$$BEC = 0.4264$$

Weight: <None>

Min Conc: 0

54 Fe [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	607.44	0.0030	P	4.0
2	☐	50.000	52.126	3878.36	0.0195	P	3.6
3	☐	2500.000	2846.592	179009.76	0.9035	P	0.1
4	☐	6250.000	6919.377	427705.92	2.1920	P	3.3
5	☐	12500.000	13752.468	852749.32	4.3537	P	3.1
6	☐	25000.000	27967.673	1748181.78	8.8507	A	2.7
7	☐	50000.000	56333.825	3574682.43	17.8244	A	3.6
8	☐	250000.00	248353.64	15461288.19	78.5706	A	2.4

$$y = 3.1635E-004 * x + 0.0030$$

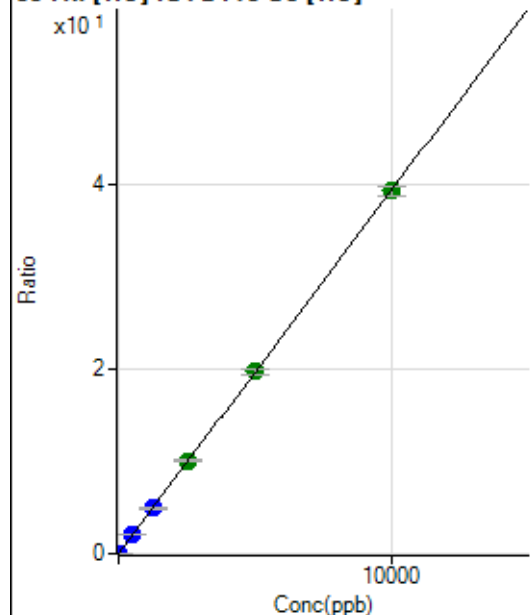
$$R = 0.9996$$

$$DL = 1.156$$

$$BEC = 9.542$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	47.78	0.0002	P	7.0
2	☐	1.000	1.059	876.70	0.0044	P	4.5
3	☐	500.000	509.180	397598.51	2.0068	P	1.0
4	☐	1250.000	1254.624	964909.62	4.9444	P	2.8
5	☐	2500.000	2555.616	1972712.84	10.0713	A	2.8
6	☐	5000.000	5004.194	3895162.96	19.7206	A	2.4
7	☐	10000.000	9982.962	7889974.05	39.3408	A	2.9
8	☐			3511.58	0.0178	P	0.8

$$y = 0.0039 * x + 2.3736E-004$$

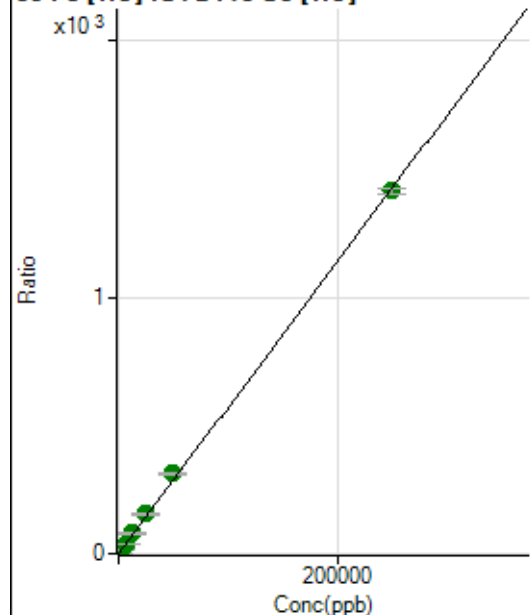
$$R = 1.0000$$

$$DL = 0.0126$$

$$BEC = 0.06023$$

Weight: <None>

Min Conc: 0

56 Fe [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	2744.76	0.0136	P	1.8
2	☐	50.000	53.734	63435.43	0.3192	P	1.5
3	☐	2500.000	2837.321	3199101.20	16.1472	A	0.3
4	☐	6250.000	6961.387	7727572.86	39.5974	A	2.3
5	☐	12500.000	13920.133	15507808.10	79.1662	A	1.9
6	☐	25000.000	27138.545	30485072.44	154.3287	A	3.4
7	☐	50000.000	54778.113	62472001.40	311.4927	A	2.2
8	☐	250000.00	248738.35	278321313.6	1,414.388	A	1.7

$$y = 0.0057 * x + 0.0136$$

$$R = 0.9998$$

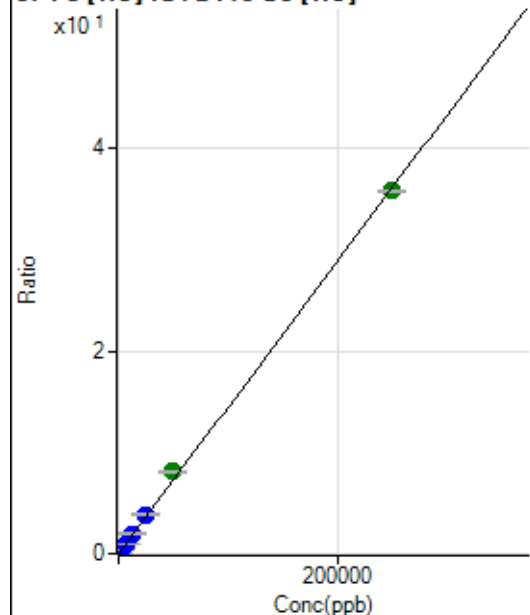
$$DL = 0.1302$$

$$BEC = 2.399$$

Weight: <None>

Min Conc: 0

57 Fe [He] ISTD:45 Sc [He]



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	198.15	0.0010	P	16.3
2	☐	50.000	50.536	1642.71	0.0083	P	8.9
3	☐	2500.000	2788.439	79763.25	0.4026	P	1.4
4	☐	6250.000	6945.373	195361.92	1.0013	P	4.7
5	☐	12500.000	13666.207	385710.89	1.9692	P	3.1
6	☐	25000.000	26834.755	763574.72	3.8658	P	1.8
7	☐	50000.000	56033.077	1618750.38	8.0710	A	1.0
8	☐	250000.00	248531.33	7043424.17	35.7952	A	0.7

$$y = 1.4402\text{E-}004 * x + 9.8509\text{E-}004$$

$$R = 0.9997$$

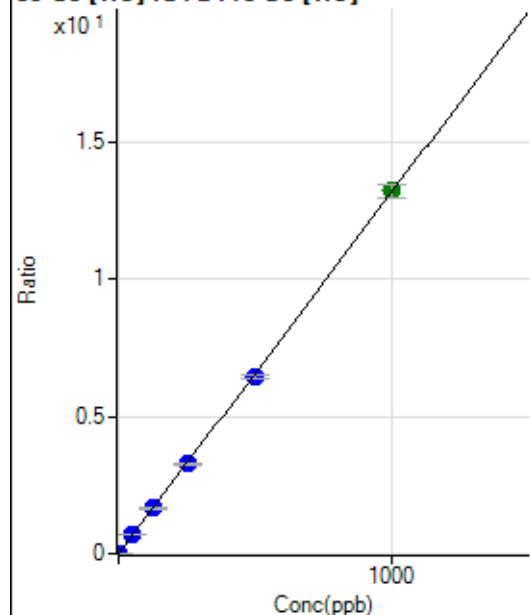
$$DL = 3.337$$

$$BEC = 6.84$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	55.55	0.0003	P	24.6
2	☐	1.000	0.994	2651.39	0.0133	P	1.5
3	☐	50.000	51.092	133037.25	0.6715	P	1.4
4	☐	125.000	125.586	321917.32	1.6501	P	4.8
5	☐	250.000	248.053	638371.21	3.2589	P	1.7
6	☐	500.000	491.268	1274786.92	6.4540	P	2.1
7	☐	1000.000	1004.725	2647128.31	13.1993	A	3.4
8	☐			2120.18	0.0108	P	3.0

$$y = 0.0131 * x + 2.7640\text{E-}004$$

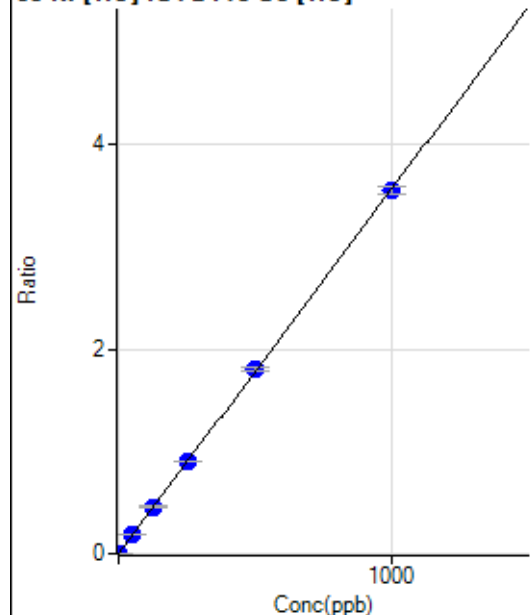
$$R = 0.9999$$

$$DL = 0.01554$$

$$BEC = 0.02104$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	50.00	0.0002	P	29.9
2	☐	1.000	0.997	755.59	0.0038	P	5.2
3	☐	50.000	52.867	37368.09	0.1886	P	1.9
4	☐	125.000	128.952	89685.31	0.4597	P	4.8
5	☐	250.000	253.659	177088.25	0.9040	P	1.2
6	☐	500.000	505.755	355974.94	1.8022	P	1.5
7	☐	1000.000	995.571	711466.49	3.5474	P	2.1
8	☐			1347.86	0.0068	P	5.5

$$y = 0.0036 * x + 2.4909E-004$$

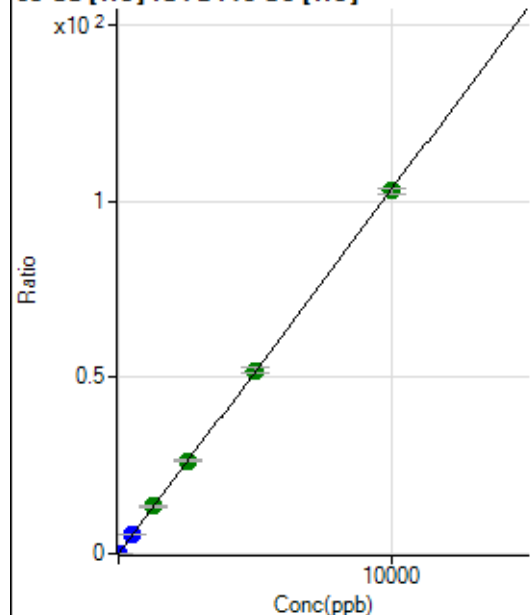
$$R = 1.0000$$

$$DL = 0.06267$$

$$BEC = 0.06991$$

Weight: <None>

Min Conc: 0

63 Cu [He] ISTD:45 Sc [He]

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	818.92	0.0041	P	7.7
2	☐	2.000	2.085	5090.96	0.0256	P	2.6
3	☐	500.000	521.291	1067522.36	5.3880	P	1.4
4	☐	1250.000	1293.562	2607569.46	13.3641	A	4.1
5	☐	2500.000	2541.468	5142207.74	26.2526	A	2.5
6	☐	5000.000	5041.929	10285440.68	52.0776	A	2.9
7	☐	10000.000	9962.159	20636677.05	102.8942	A	1.7
8	☐			3614.95	0.0184	P	1.1

$$y = 0.0103 * x + 0.0041$$

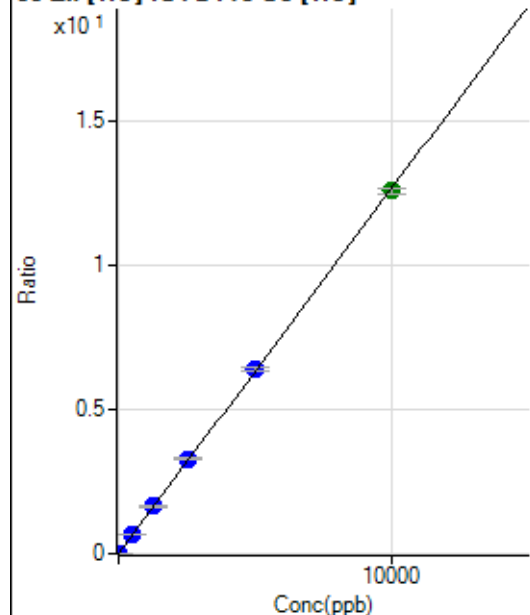
$$R = 1.0000$$

$$DL = 0.09106$$

$$BEC = 0.3944$$

Weight: <None>

Min Conc: 0

66 Zn [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	116.67	0.0006	P	23.9
2	☐	2.000	2.084	637.80	0.0032	P	17.9
3	☐	500.000	529.178	132571.35	0.6691	P	1.8
4	☐	1250.000	1300.062	320610.17	1.6430	P	3.2
5	☐	2500.000	2586.204	640082.57	3.2678	P	2.2
6	☐	5000.000	5064.629	1263836.20	6.3989	P	2.6
7	☐	10000.000	9938.418	2518260.97	12.5560	A	1.3
8	☐			1572.33	0.0080	P	2.1

$$y = 0.0013 * x + 5.8039E-004$$

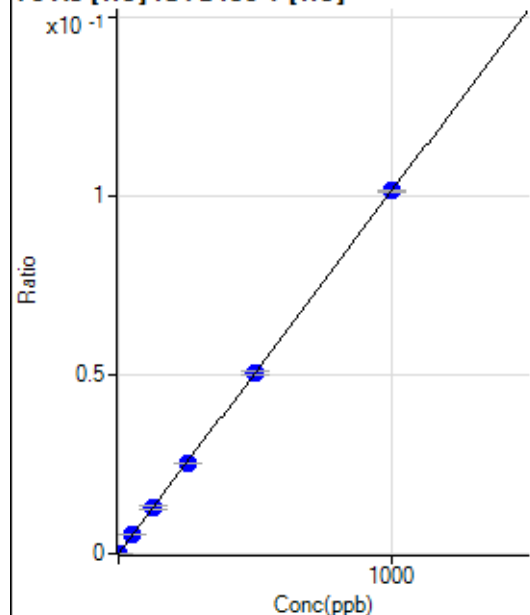
$$R = 0.9999$$

$$DL = 0.33$$

$$BEC = 0.4594$$

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	1.67	0.0000	P	34.3
2	☐	1.000	1.069	155.02	0.0001	P	10.1
3	☐	50.000	51.455	7388.01	0.0052	P	2.7
4	☐	125.000	127.456	17775.28	0.0129	P	4.5
5	☐	250.000	248.811	35774.66	0.0252	P	1.0
6	☐	500.000	498.388	71510.08	0.0506	P	1.3
7	☐	1000.000	1000.724	147551.78	0.1015	P	0.8
8	☐			25.67	0.0000	P	15.5

$$y = 1.0146E-004 * x + 1.1737E-006$$

$$R = 1.0000$$

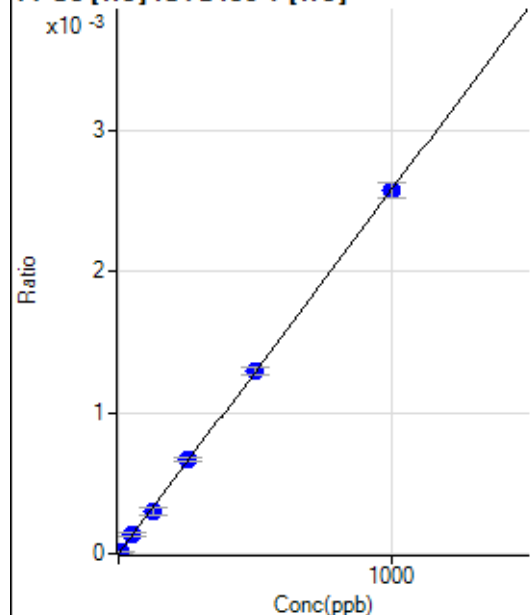
$$DL = 0.01191$$

$$BEC = 0.01157$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1.11	0.0000	P	173.
2	☐	5.000	3.970	15.56	0.0000	P	12.5
3	☐	50.000	51.524	188.89	0.0001	P	20.0
4	☐	125.000	115.240	408.90	0.0003	P	17.8
5	☐	250.000	258.550	944.49	0.0007	P	5.5
6	☐	500.000	503.064	1832.36	0.0013	P	4.2
7	☐	1000.000	997.480	3731.65	0.0026	P	4.3
8	☐			0.00	0.0000	P	

$$y = 2.5741\text{E-}006 * x + 7.8995\text{E-}007$$

$$R = 0.9999$$

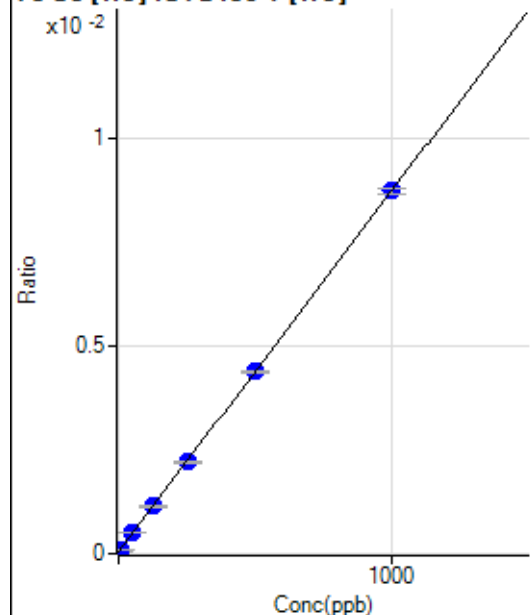
$$DL = 1.595$$

$$BEC = 0.3069$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	55.34	0.0000	P	16.1
2	☐	5.000	5.708	125.34	0.0001	P	0.9
3	☐	50.000	53.354	712.09	0.0005	P	4.1
4	☐	125.000	126.734	1569.92	0.0011	P	2.0
5	☐	250.000	248.655	3121.66	0.0022	P	1.4
6	☐	500.000	499.180	6197.66	0.0044	P	0.3
7	☐	1000.000	1000.358	12707.34	0.0087	P	1.5
8	☐			65.68	0.0000	P	14.6

$$y = 8.7014\text{E-}006 * x + 3.9042\text{E-}005$$

$$R = 1.0000$$

$$DL = 2.169$$

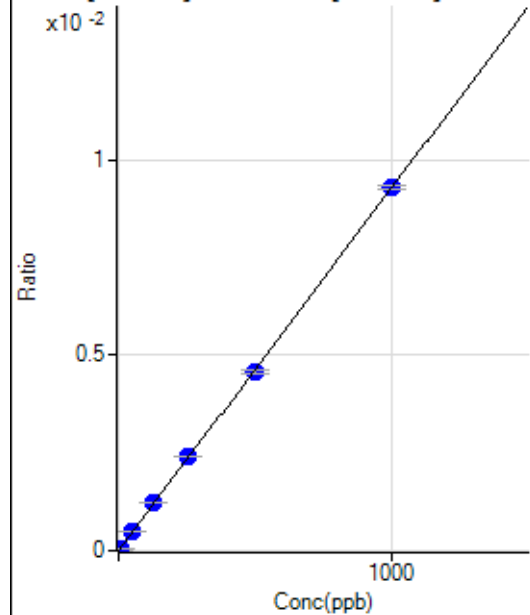
$$BEC = 4.487$$

Weight: <None>

Min Conc: 0

81 Br [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			37392.90		P	1.5
2	☐			36969.31		P	2.1
3	☐			37203.47		P	1.7
4	☐			36961.07		P	0.7
5	☐			35524.00		P	2.7
6	☐			37245.27		P	1.0
7	☐			36724.20		P	0.5
8	☐			35924.80		P	1.0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	29.58	0.0000	P	89.0
2	☐	5.000	4.696	586.21	0.0000	P	9.3
3	☐	50.000	51.161	6236.62	0.0005	P	0.4
4	☐	125.000	129.921	15288.94	0.0012	P	0.2
5	☐	250.000	257.409	30143.04	0.0024	P	0.2
6	☐	500.000	494.145	59444.62	0.0046	P	1.9
7	☐	1000.000	1000.404	121871.01	0.0093	P	1.0
8	☐			127.90	0.0000	P	39.3

$$y = 9.2673\text{E-}006 * x + 2.3667\text{E-}006$$

$$R = 0.9999$$

$$DL = 0.6816$$

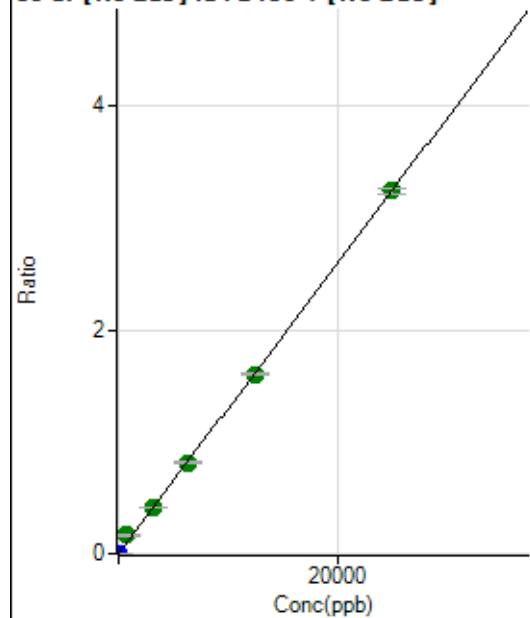
$$BEC = 0.2554$$

Weight: <None>

Min Conc: 0

83 Kr [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			382.46		P	4.2
2	☐			380.79		P	2.2
3	☐			375.79		P	9.1
4	☐			408.29		P	1.7
5	☐			384.96		P	7.0
6	☐			399.54		P	4.7
7	☐			367.04		P	1.3
8	☐			383.29		P	4.6

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	672.26	0.0001	P	9.8
2	☐	1.000	0.948	2255.80	0.0002	P	3.9
3	☐	625.000	1267.159	2147732.84	0.1641	A	3.6
4	☐	3125.000	3175.617	5209764.92	0.4111	A	1.0
5	☐	6250.000	6283.998	10268219.76	0.8134	A	3.0
6	☐	12500.000	12357.753	20754667.82	1.5995	A	1.2
7	☐	25000.000	25040.243	42593378.04	3.2411	A	1.3
8	☐			11188.10	0.0009	P	7.1

$$y = 1.2943E-004 * x + 5.3704E-005$$

$$R = 0.9997$$

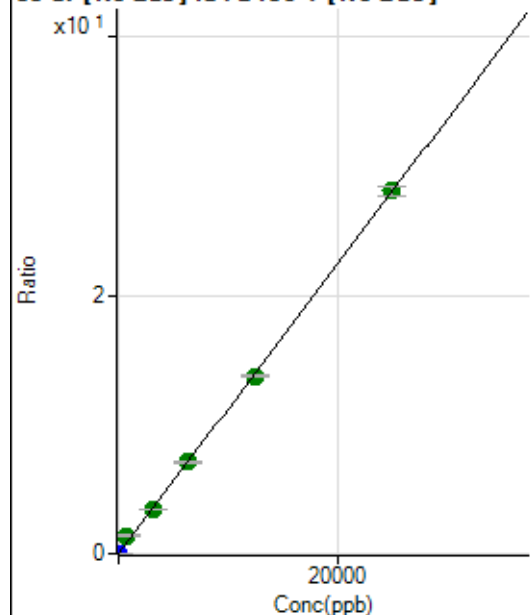
$$DL = 0.1215$$

$$BEC = 0.4149$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	380.57	0.0000	P	84.7
2	☐	1.000	0.990	14569.08	0.0011	P	0.7
3	☐	625.000	1248.970	18304132.35	1.3983	A	2.4
4	☐	3125.000	3104.554	44047727.37	3.4757	A	1.2
5	☐	6250.000	6319.872	89315630.47	7.0754	A	0.9
6	☐	12500.000	12244.307	177856681.7	13.7081	A	1.1
7	☐	25000.000	25097.335	369249569.3	28.0976	A	2.5
8	☐			89768.57	0.0075	P	9.8

$$y = 0.0011 * x + 3.0642E-005$$

$$R = 0.9996$$

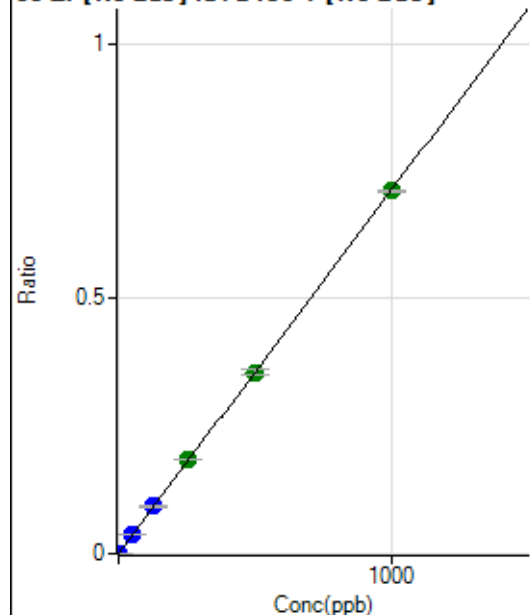
$$DL = 0.06958$$

$$BEC = 0.02737$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	486.13	0.0000	P	11.0
2	☐	1.000	0.978	9411.75	0.0007	P	3.8
3	☐	50.000	51.132	477960.88	0.0365	P	2.7
4	☐	125.000	129.744	1173602.59	0.0926	P	0.9
5	☐	250.000	258.556	2329161.66	0.1845	A	1.5
6	☐	500.000	498.978	4618803.44	0.3560	A	2.7
7	☐	1000.000	997.723	9355506.63	0.7118	A	0.5
8	☐			2280.81	0.0002	P	6.8

$$y = 7.1343E-004 * x + 3.8841E-005$$

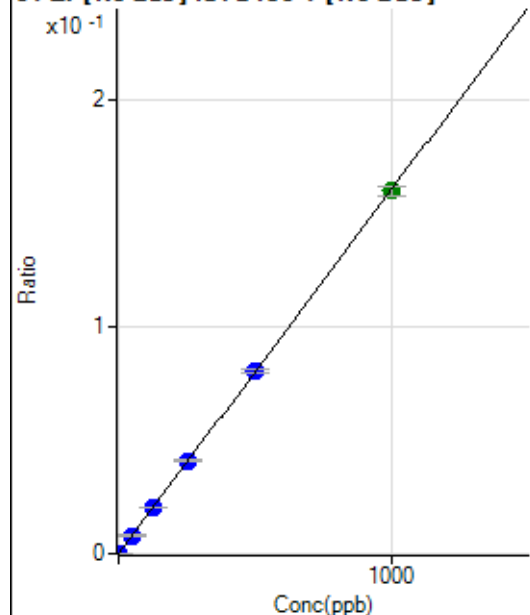
$$R = 1.0000$$

$$DL = 0.0179$$

$$BEC = 0.05444$$

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	55.56	0.0000	P	35.4
2	☐	1.000	1.058	2225.24	0.0002	P	9.0
3	☐	50.000	50.048	105155.84	0.0080	P	2.3
4	☐	125.000	128.894	262123.87	0.0207	P	0.7
5	☐	250.000	255.509	517538.54	0.0410	P	0.7
6	☐	500.000	503.429	1047905.60	0.0808	P	2.2
7	☐	1000.000	996.419	2100797.35	0.1599	A	2.3
8	☐			522.25	0.0000	P	7.1

$$y = 1.6043\text{E-}004 * x + 4.4443\text{E-}006$$

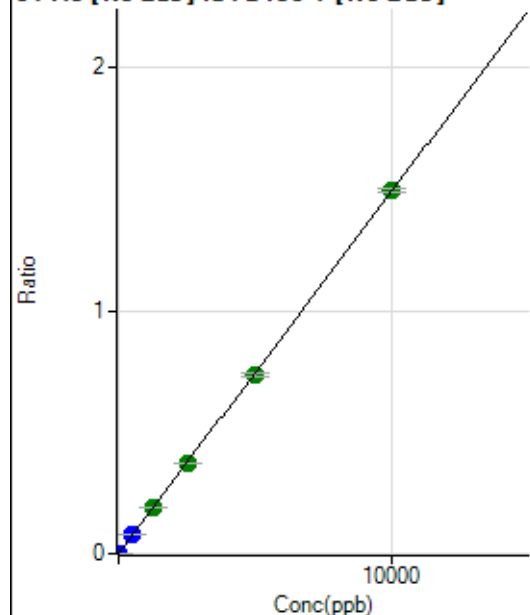
$$R = 1.0000$$

$$DL = 0.02938$$

$$BEC = 0.0277$$

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	191.67	0.0000	P	31.2
2	☐	5.000	5.639	10943.49	0.0009	P	2.8
3	☐	500.000	507.454	990197.66	0.0756	P	1.1
4	☐	1250.000	1258.949	2378198.53	0.1877	A	0.8
5	☐	2500.000	2512.938	4728147.20	0.3746	A	0.5
6	☐	5000.000	4951.955	9575761.41	0.7381	A	2.0
7	☐	10000.000	10019.296	19625965.71	1.4933	A	0.9
8	☐			3008.74	0.0003	P	15.8

$$y = 1.4905\text{E-}004 * x + 1.5325\text{E-}005$$

$$R = 1.0000$$

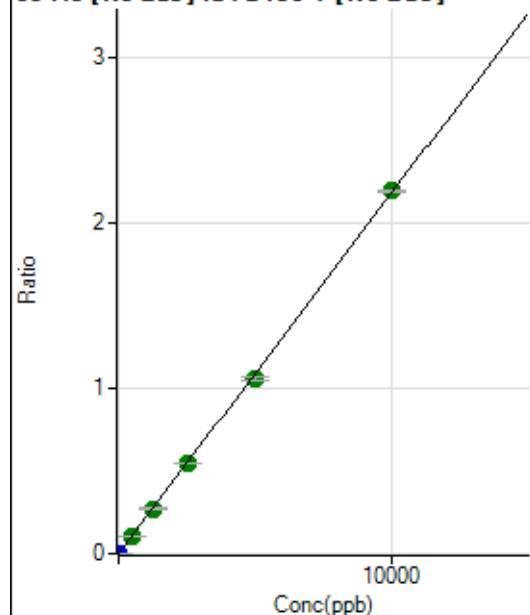
$$DL = 0.09627$$

$$BEC = 0.1028$$

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	30.56	0.0000	P	42.7
2	☐	5.000	4.788	13381.76	0.0010	P	4.3
3	☐	500.000	497.270	1420117.12	0.1085	A	0.9
4	☐	1250.000	1250.960	3459199.12	0.2730	A	1.5
5	☐	2500.000	2500.642	6887680.71	0.5456	A	0.5
6	☐	5000.000	4866.165	13774845.62	1.0618	A	2.3
7	☐	10000.000	10066.773	28867957.59	2.1965	A	0.2
8	☐			3656.17	0.0003	P	19.3

$$y = 2.1819E-004 * x + 2.4463E-006$$

$$R = 0.9999$$

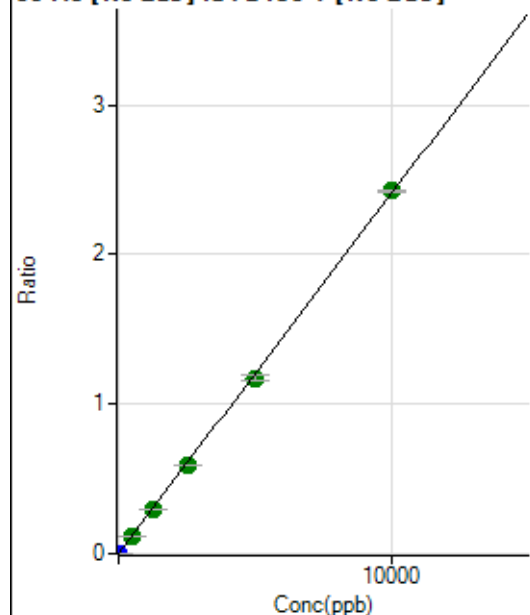
$$DL = 0.01437$$

$$BEC = 0.01121$$

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	86.11	0.0000	P	41.9
2	☐	5.000	4.848	15011.37	0.0012	P	4.7
3	☐	500.000	489.005	1541536.75	0.1178	A	1.6
4	☐	1250.000	1241.110	3788098.83	0.2989	A	1.3
5	☐	2500.000	2469.912	7508534.46	0.5948	A	0.6
6	☐	5000.000	4880.802	15249316.14	1.1754	A	2.4
7	☐	10000.000	10068.782	31867293.77	2.4248	A	0.9
8	☐			9795.40	0.0008	P	7.6

$$y = 2.4082E-004 * x + 6.9006E-006$$

$$R = 0.9999$$

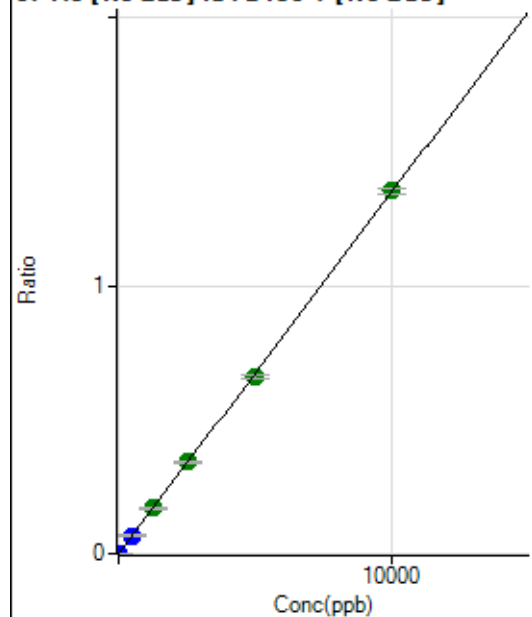
$$DL = 0.03605$$

$$BEC = 0.02865$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	19.45	0.0000	P	24.1
2	☐	5.000	4.729	8174.85	0.0006	P	1.2
3	☐	500.000	505.460	892286.66	0.0682	P	2.5
4	☐	1250.000	1258.552	2151116.84	0.1697	A	1.4
5	☐	2500.000	2531.335	4309552.35	0.3414	A	0.6
6	☐	5000.000	4898.103	8570601.93	0.6606	A	1.4
7	☐	10000.000	10041.773	17797061.16	1.3543	A	1.8
8	☐			2497.52	0.0002	P	16.3

$$y = 1.3486\text{E-}004 * x + 1.5507\text{E-}006$$

$$R = 0.9999$$

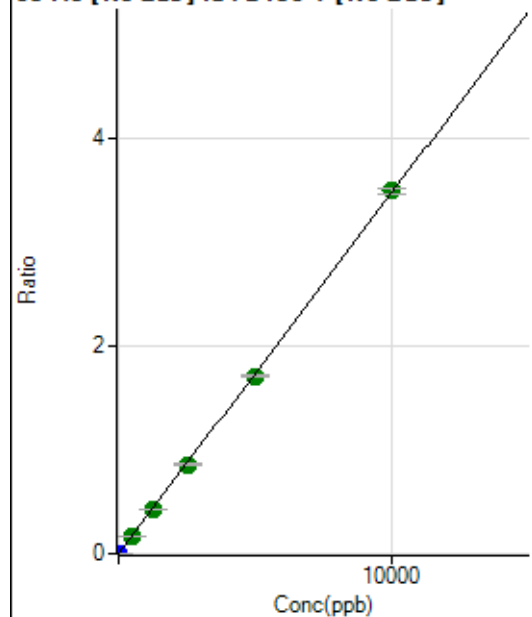
$$DL = 0.008306$$

$$BEC = 0.0115$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	66.67	0.0000	P	33.5
2	☐	5.000	4.794	21355.89	0.0017	P	2.7
3	☐	500.000	490.270	2228901.72	0.1703	A	3.1
4	☐	1250.000	1227.519	5403561.97	0.4264	A	1.3
5	☐	2500.000	2464.948	10807356.75	0.8562	A	1.4
6	☐	5000.000	4920.449	22173402.23	1.7090	A	1.4
7	☐	10000.000	10051.835	45881406.23	3.4913	A	1.4
8	☐			5943.09	0.0005	P	11.5

$$y = 3.4733\text{E-}004 * x + 5.3298\text{E-}006$$

$$R = 0.9999$$

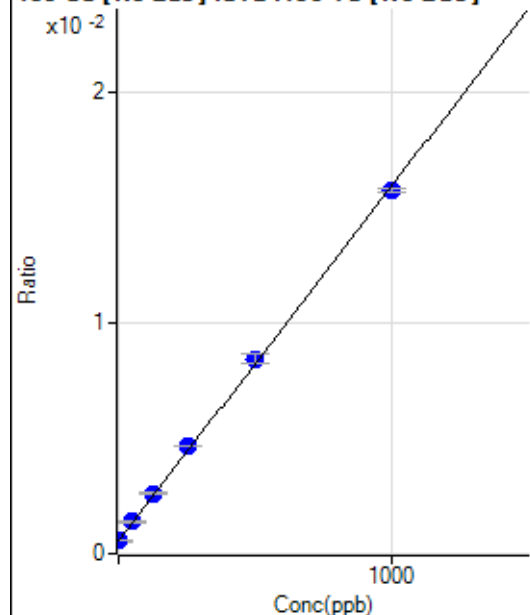
$$DL = 0.01541$$

$$BEC = 0.01535$$

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	5209.46	0.0006	P	4.8
2	☐	1.000	0.569	5342.87	0.0006	P	3.0
3	☐	50.000	53.918	13231.69	0.0014	P	4.3
4	☐	125.000	132.922	24425.10	0.0026	P	3.7
5	☐	250.000	268.350	44121.49	0.0047	P	1.4
6	☐	500.000	514.135	83033.77	0.0085	P	4.2
7	☐	1000.000	987.159	160564.01	0.0157	P	1.2
8	☐			4681.50	0.0005	P	3.3

$$y = 1.5371\text{E-}005 * x + 5.5014\text{E-}004$$

$$R = 0.9996$$

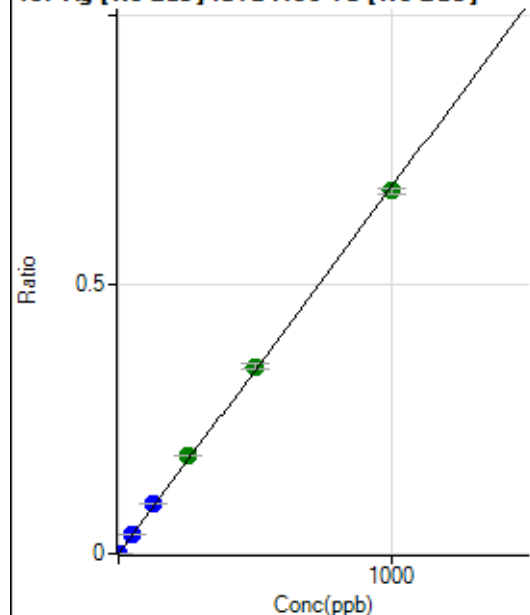
$$DL = 5.156$$

$$BEC = 35.79$$

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	202.78	0.0000	P	10.3
2	☐	1.000	1.033	6940.84	0.0007	P	8.5
3	☐	50.000	54.310	355428.82	0.0370	P	0.9
4	☐	125.000	135.080	867721.39	0.0921	P	2.0
5	☐	250.000	268.200	1725488.95	0.1829	A	0.7
6	☐	500.000	510.132	3415886.03	0.3478	A	3.4
7	☐	1000.000	988.908	6883789.13	0.6742	A	1.5
8	☐			2550.30	0.0003	P	15.9

$$y = 6.8170\text{E-}004 * x + 2.1390\text{E-}005$$

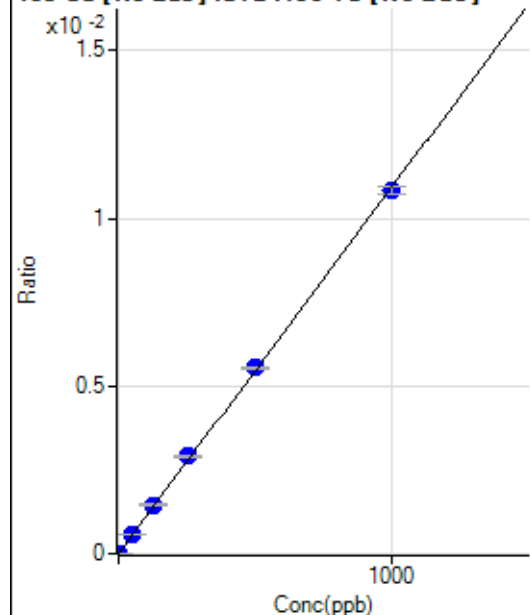
$$R = 0.9997$$

$$DL = 0.00974$$

$$BEC = 0.03138$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	22.22	0.0000	P	26.9
2	☐	1.000	1.103	137.50	0.0000	P	10.2
3	☐	50.000	53.462	5617.88	0.0006	P	3.4
4	☐	125.000	133.260	13720.85	0.0015	P	2.4
5	☐	250.000	266.302	27442.65	0.0029	P	1.0
6	☐	500.000	507.148	54391.64	0.0055	P	0.7
7	☐	1000.000	991.145	110447.29	0.0108	P	2.2
8	☐			81.95	0.0000	P	31.3

$$y = 1.0912\text{E-}005 * x + 2.3405\text{E-}006$$

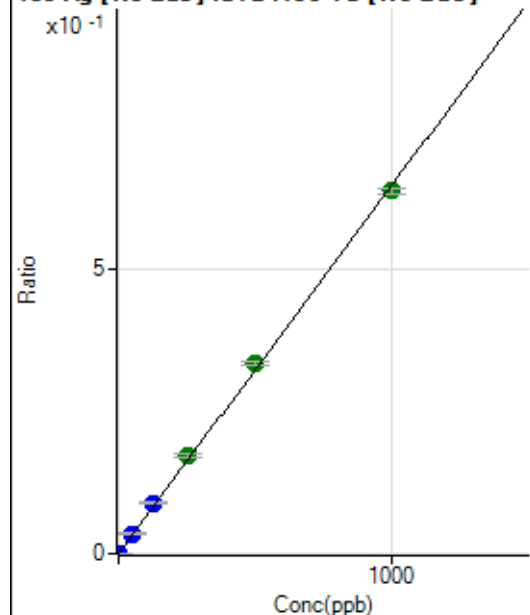
$$R = 0.9998$$

$$DL = 0.173$$

$$BEC = 0.2145$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	97.23	0.0000	P	27.7
2	☐	1.000	1.063	6668.46	0.0007	P	3.2
3	☐	50.000	54.289	336635.06	0.0351	P	3.5
4	☐	125.000	138.054	840367.63	0.0892	P	3.4
5	☐	250.000	266.310	1623764.25	0.1721	A	2.6
6	☐	500.000	515.529	3272404.24	0.3331	A	2.1
7	☐	1000.000	986.312	6507920.46	0.6373	A	1.7
8	☐			2322.48	0.0003	P	8.6

$$y = 6.4617\text{E-}004 * x + 1.0292\text{E-}005$$

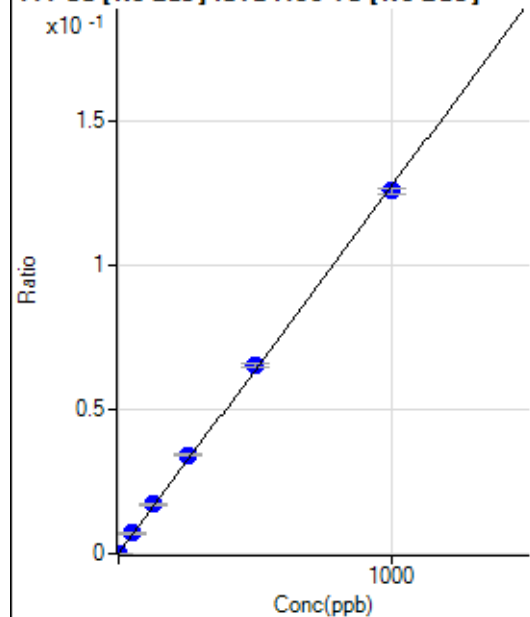
$$R = 0.9996$$

$$DL = 0.01325$$

$$BEC = 0.01593$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	515.11	0.0001	P	5.3
2	☐	1.000	1.115	1877.02	0.0002	P	4.1
3	☐	50.000	54.726	67369.07	0.0070	P	2.7
4	☐	125.000	133.687	160863.18	0.0171	P	2.5
5	☐	250.000	269.078	323785.76	0.0343	P	1.9
6	☐	500.000	512.646	641775.94	0.0653	P	1.3
7	☐	1000.000	987.585	1284610.30	0.1258	P	1.4
8	☐			805.24	0.0001	P	6.2

$$y = 1.2732\text{E-}004 * x + 5.4399\text{E-}005$$

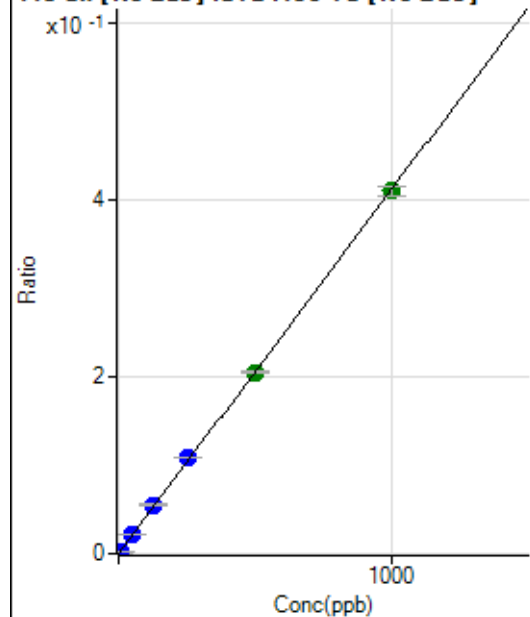
$$R = 0.9997$$

$$DL = 0.06762$$

$$BEC = 0.4273$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	522.25	0.0001	P	14.1
2	☐	5.000	5.158	20788.58	0.0022	P	4.1
3	☐	50.000	53.045	209683.46	0.0219	P	2.0
4	☐	125.000	132.727	514342.89	0.0546	P	3.0
5	☐	250.000	263.579	1022610.03	0.1084	P	1.5
6	☐	500.000	498.235	2011970.45	0.2048	A	1.8
7	☐	1000.000	996.369	4181146.80	0.4095	A	2.6
8	☐			2191.89	0.0002	P	9.1

$$y = 4.1097\text{E-}004 * x + 5.5212\text{E-}005$$

$$R = 0.9999$$

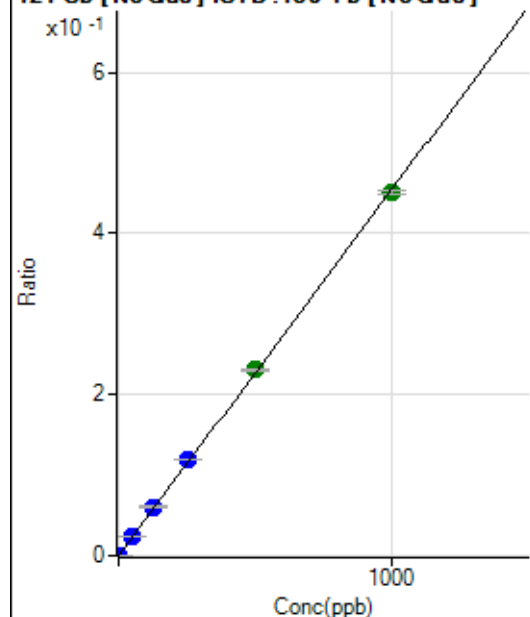
$$DL = 0.05678$$

$$BEC = 0.1343$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	16.67	0.0000	P	49.9
2	☐	2.000	2.088	9083.83	0.0010	P	0.8
3	☐	50.000	52.949	230771.73	0.0240	P	1.4
4	☐	125.000	131.816	563858.95	0.0599	P	3.8
5	☐	250.000	261.502	1120747.41	0.1188	P	0.5
6	☐	500.000	508.204	2267711.62	0.2308	A	0.4
7	☐	1000.000	992.023	4600672.54	0.4505	A	1.2
8	☐			1475.13	0.0002	P	3.7

$$y = 4.5416\text{E-}004 * x + 1.7553\text{E-}006$$

$$R = 0.9999$$

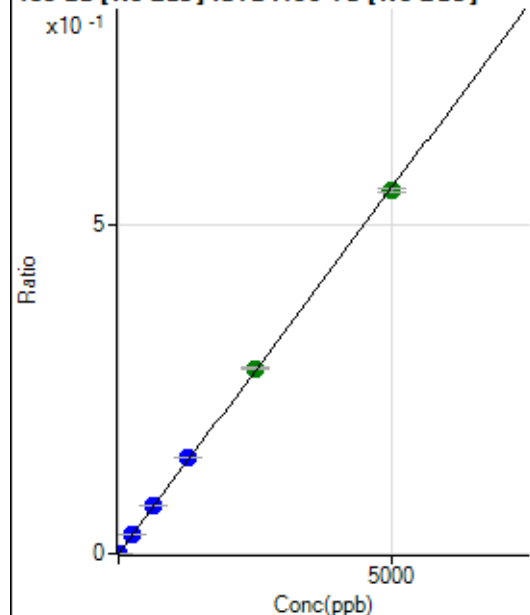
$$DL = 0.005781$$

$$BEC = 0.003865$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	22.22	0.0000	P	115.
2	☐	10.000	10.174	10824.10	0.0011	P	1.7
3	☐	250.000	264.021	281341.06	0.0293	P	2.0
4	☐	625.000	657.675	687898.61	0.0730	P	3.5
5	☐	1250.000	1317.527	1380544.07	0.1463	P	1.3
6	☐	2500.000	2535.729	2766256.53	0.2816	A	1.4
7	☐	5000.000	4960.468	5626115.45	0.5508	A	1.0
8	☐			3269.93	0.0004	P	4.6

$$y = 1.1105\text{E-}004 * x + 2.3839\text{E-}006$$

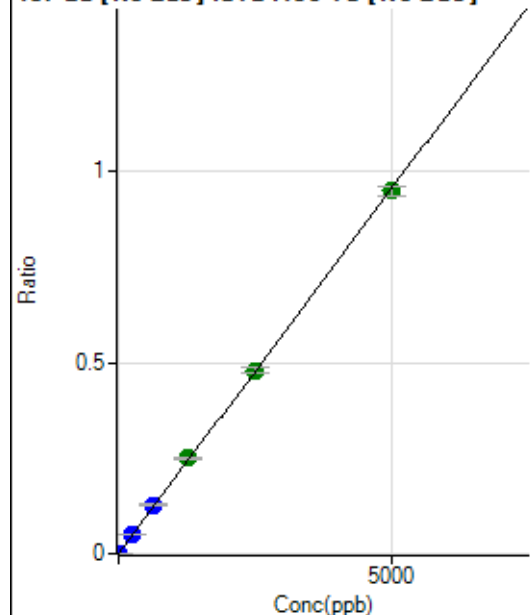
$$R = 0.9999$$

$$DL = 0.07419$$

$$BEC = 0.02147$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	30.55	0.0000	P	68.8
2	☐	10.000	9.949	18187.78	0.0019	P	2.2
3	☐	250.000	263.289	482360.76	0.0503	P	2.5
4	☐	625.000	670.857	1206543.74	0.1281	P	3.5
5	☐	1250.000	1306.938	2354812.36	0.2495	A	0.8
6	☐	2500.000	2515.868	4718990.90	0.4804	A	2.2
7	☐	5000.000	4971.435	9691101.78	0.9492	A	2.9
8	☐			5918.11	0.0006	P	9.4

$$y = 1.9094E-004 * x + 3.2482E-006$$

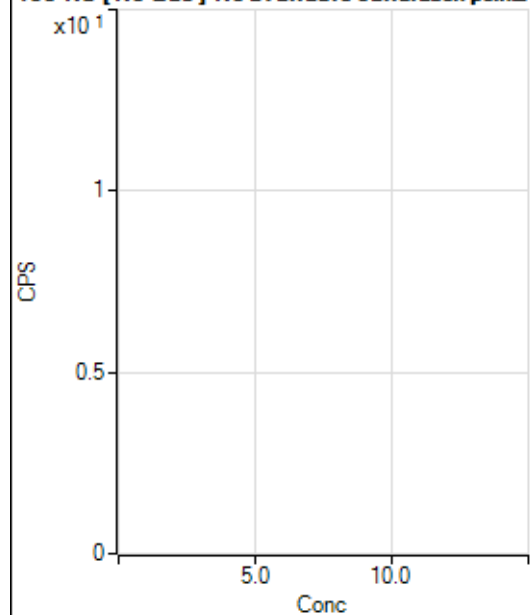
$$R = 0.9999$$

$$DL = 0.03514$$

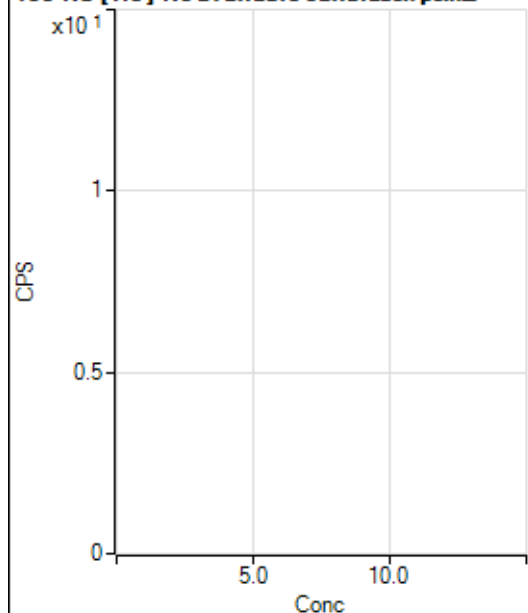
$$BEC = 0.01701$$

Weight: <None>

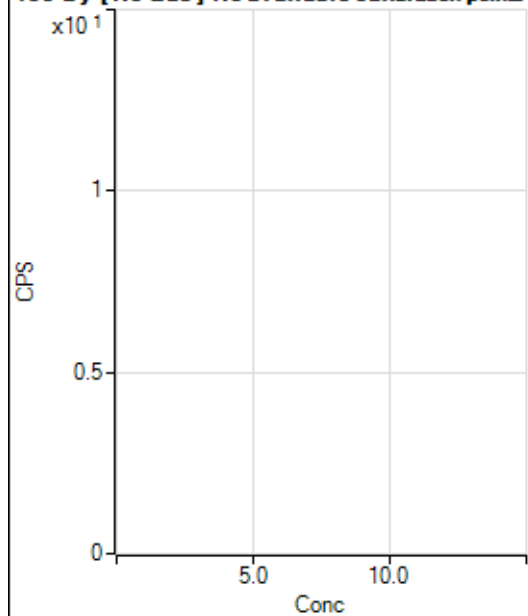
Min Conc: 0

150 Nd [No Gas] No available calibration points

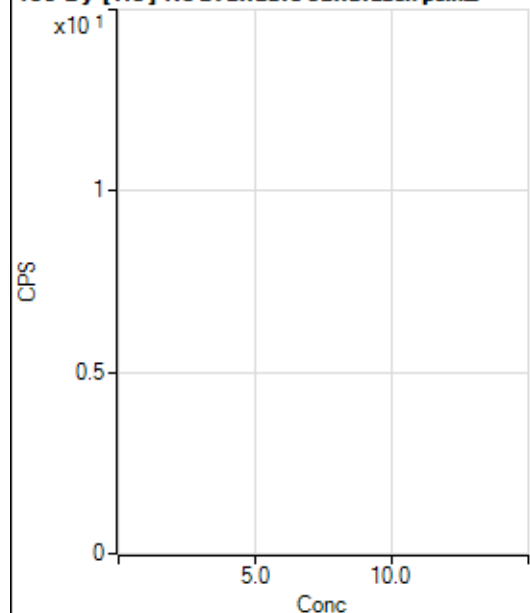
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			0.00		P	
2	☐			2.22		P	173.
3	☐			35.56		P	28.6
4	☐			77.78		P	32.5
5	☐			180.01		P	19.6
6	☐			417.79		P	10.9
7	☐			691.15		P	6.4
8	☐			62.23		P	43.3

150 Nd [He] No available calibration points

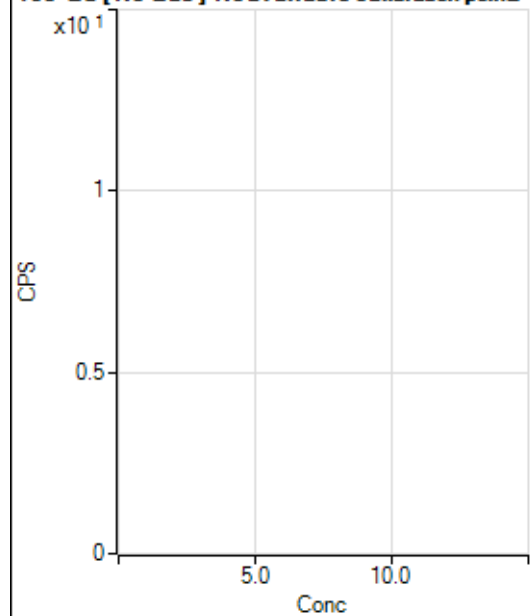
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			0.00		P	
2	☐			3.33		P	100.
3	☐			6.66		P	86.6
4	☐			6.67		P	50.0
5	☐			18.89		P	27.0
6	☐			30.00		P	29.4
7	☐			62.22		P	17.2
8	☐			13.33		P	75.0

156 Dy [No Gas] No available calibration points

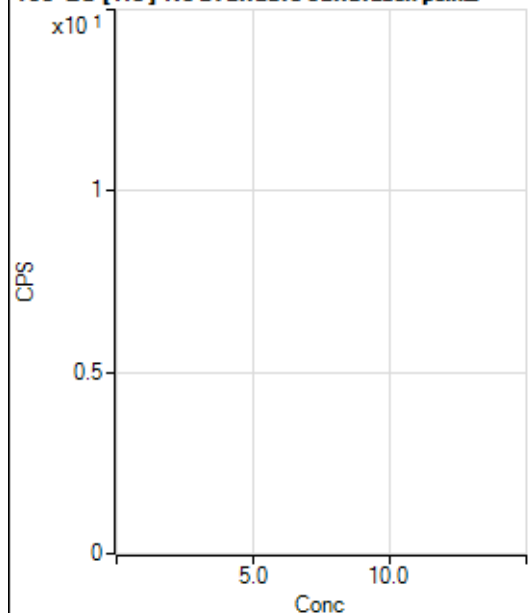
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			8.33		P	0.0
2	☐			19.44		P	99.0
3	☐			44.45		P	28.7
4	☐			38.89		P	24.7
5	☐			113.89		P	22.4
6	☐			175.01		P	23.8
7	☐			366.68		P	9.1
8	☐			916.73		P	2.4

156 Dy [He] No available calibration points

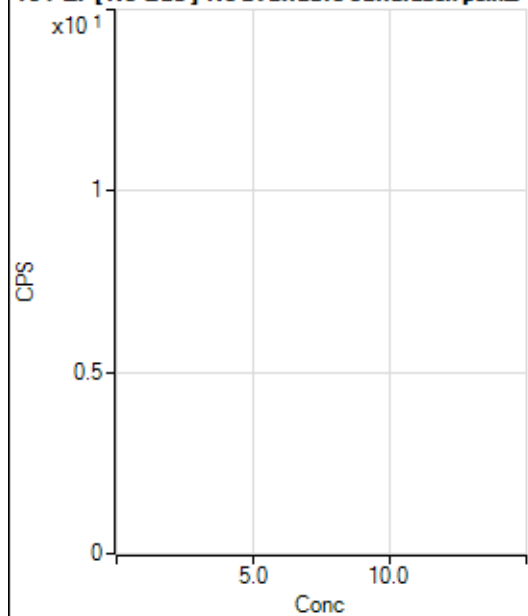
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			1.11		P	173.
2	☐			2.22		P	86.6
3	☐			7.78		P	65.5
4	☐			26.67		P	33.1
5	☐			38.89		P	44.0
6	☐			66.67		P	13.2
7	☐			130.00		P	5.1
8	☐			432.24		P	14.3

160 Gd [No Gas] Noavailable calibration poin_

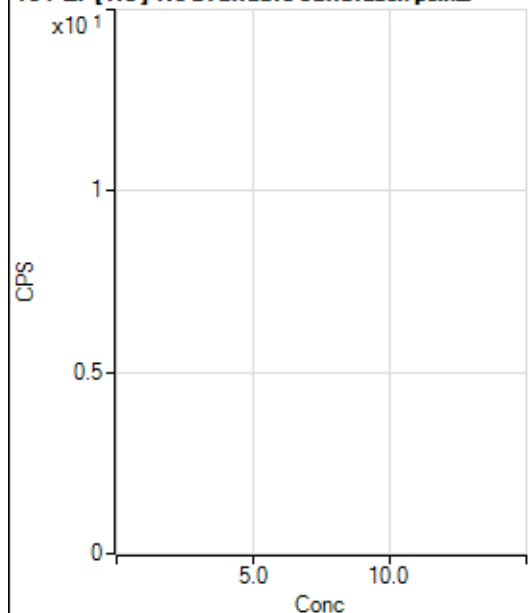
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			83.34		P	26.5
2	☐			88.89		P	47.2
3	☐			133.34		P	55.6
4	☐			97.23		P	34.6
5	☐			116.67		P	14.3
6	☐			213.90		P	19.6
7	☐			330.57		P	3.9
8	☐			1263.99		P	5.6

160 Gd [He] No available calibration points

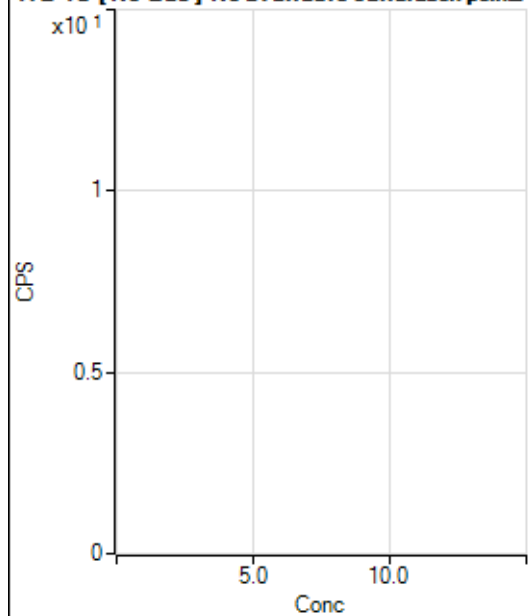
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			111.11		P	33.0
2	☐			114.44		P	12.1
3	☐			130.00		P	6.8
4	☐			133.34		P	6.6
5	☐			156.67		P	25.8
6	☐			197.78		P	6.8
7	☐			235.56		P	7.1
8	☐			664.47		P	6.3

164 Er [No Gas] No available calibration points

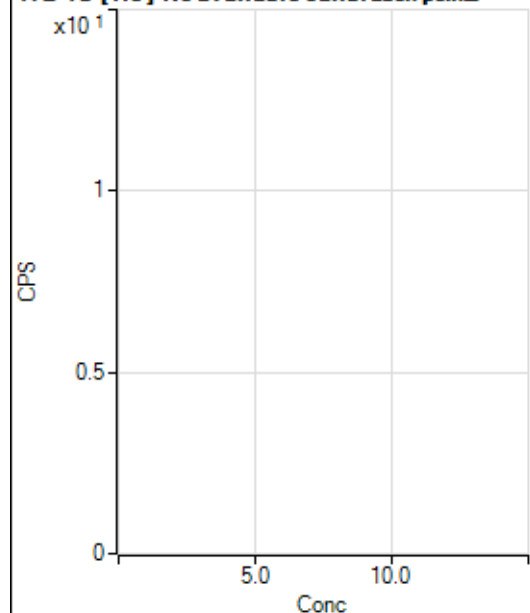
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			52.78		P	45.6
2	☐			44.44		P	28.6
3	☐			88.89		P	47.2
4	☐			88.89		P	32.9
5	☐			77.78		P	43.3
6	☐			113.89		P	34.6
7	☐			94.45		P	50.9
8	☐			100.00		P	44.1

164 Er [He] No available calibration points

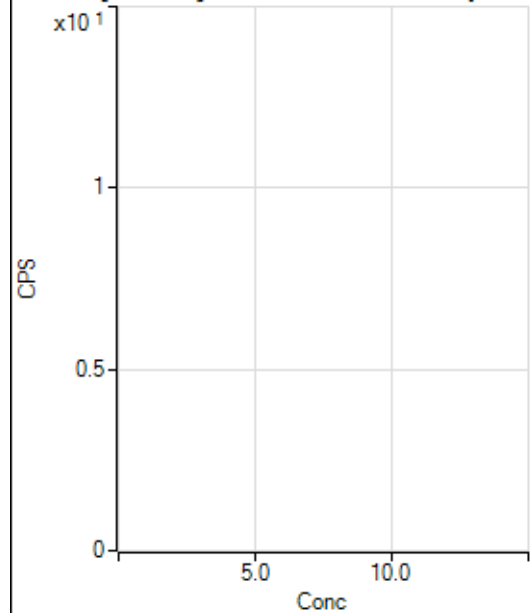
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			35.56		P	69.1
2	☐			34.44		P	14.8
3	☐			27.78		P	30.2
4	☐			36.67		P	32.8
5	☐			34.44		P	14.8
6	☐			61.11		P	26.9
7	☐			35.56		P	23.6
8	☐			50.00		P	24.0

172 Yb [No Gas] No available calibration points

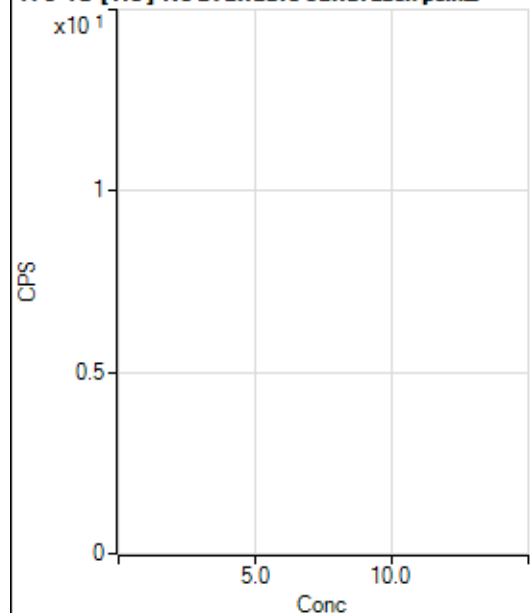
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			63.89		P	49.4
2	☐			52.78		P	32.9
3	☐			72.22		P	17.6
4	☐			86.11		P	31.1
5	☐			105.56		P	35.6
6	☐			130.56		P	28.8
7	☐			161.11		P	6.0
8	☐			488.91		P	14.3

172 Yb [He] No available calibration points

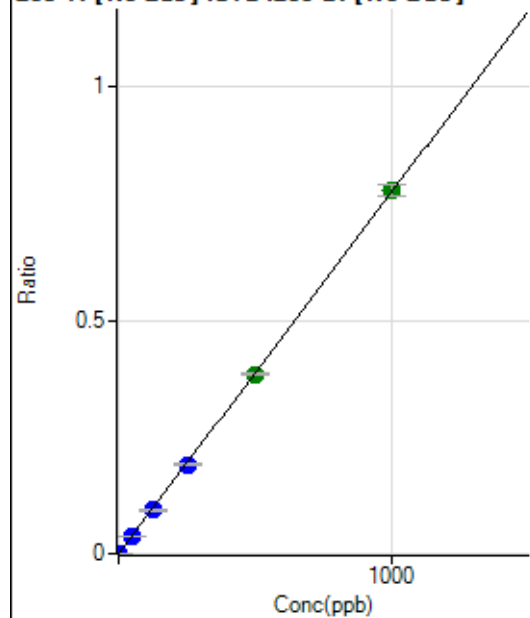
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			42.60		P	7.5
2	☐			25.93		P	53.9
3	☐			29.63		P	43.3
4	☐			50.00		P	19.2
5	☐			55.56		P	20.0
6	☐			66.67		P	14.4
7	☐			57.41		P	49.7
8	☐			192.60		P	21.3

176 Yb [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			1733.50		P	5.4
2	☐			1839.07		P	6.9
3	☐			2761.48		P	4.0
4	☐			4036.85		P	5.7
5	☐			6718.56		P	4.7
6	☐			11383.00		P	3.8
7	☐			21314.99		P	4.1
8	☐			1916.86		P	7.7

176 Yb [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			8723.43		P	3.7
2	☐			8449.13		P	2.0
3	☐			9068.08		P	2.5
4	☐			9459.12		P	5.1
5	☐			10795.31		P	1.5
6	☐			13084.50		P	2.7
7	☐			17417.24		P	0.8
8	☐			9058.83		P	4.1

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	55.56	0.0000	P	23.9
2	☐	1.000	1.008	4523.16	0.0008	P	5.3
3	☐	50.000	49.288	217744.04	0.0382	P	1.9
4	☐	125.000	120.572	543066.43	0.0934	P	1.6
5	☐	250.000	246.192	1076820.01	0.1908	P	1.6
6	☐	500.000	495.927	2224276.05	0.3842	A	0.8
7	☐	1000.000	1003.578	4489940.64	0.7776	A	3.3
8	☐			497.25	0.0001	P	22.8

$$y = 7.7477\text{E-}004 * x + 9.8881\text{E-}006$$

$$R = 1.0000$$

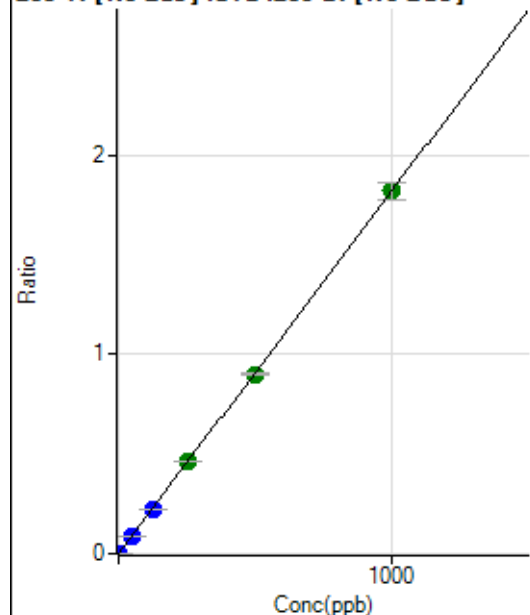
$$DL = 0.009166$$

$$BEC = 0.01276$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	141.71	0.0000	P	22.9
2	☐	1.000	0.961	10141.83	0.0018	P	2.3
3	☐	50.000	49.907	517452.96	0.0908	P	1.2
4	☐	125.000	122.672	1296569.39	0.2230	P	1.0
5	☐	250.000	254.554	2612783.62	0.4628	A	0.2
6	☐	500.000	495.349	5211939.82	0.9006	A	1.5
7	☐	1000.000	1001.483	10511104.36	1.8207	A	5.1
8	☐			1436.88	0.0003	P	13.7

$$y = 0.0018 * x + 2.5241E-005$$

$$R = 1.0000$$

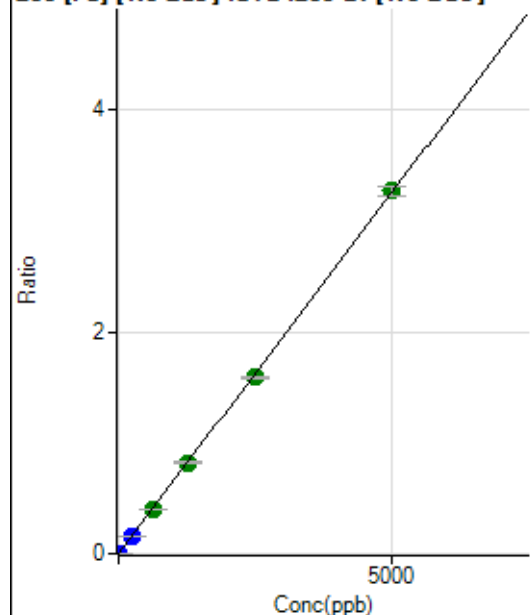
$$DL = 0.009551$$

$$BEC = 0.01388$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	381.49	0.0001	P	13.7
2	☐	1.000	0.946	3909.92	0.0007	P	4.9
3	☐	250.000	243.915	905775.26	0.1589	P	0.9
4	☐	625.000	613.558	2322094.84	0.3995	A	0.9
5	☐	1250.000	1263.357	4642961.10	0.8225	A	2.0
6	☐	2500.000	2439.510	9192744.76	1.5882	A	1.7
7	☐	5000.000	5028.640	18908824.27	3.2737	A	2.3
8	☐			3154.15	0.0007	P	3.5

$$y = 6.5100E-004 * x + 6.7896E-005$$

$$R = 0.9999$$

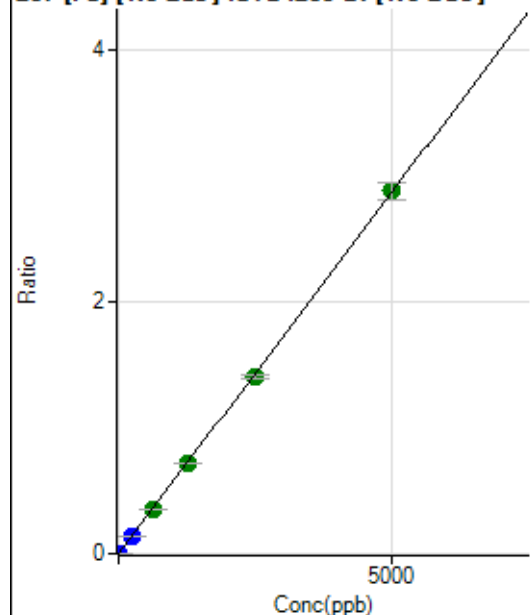
$$DL = 0.04276$$

$$BEC = 0.1043$$

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	312.97	0.0001	P	14.3
2	☐	1.000	0.829	3039.31	0.0005	P	4.0
3	☐	250.000	245.182	802100.22	0.1407	P	1.0
4	☐	625.000	609.584	2032580.37	0.3497	A	0.4
5	☐	1250.000	1259.057	4076627.38	0.7221	A	0.7
6	☐	2500.000	2449.225	8131327.50	1.4047	A	1.8
7	☐	5000.000	5025.291	16640338.22	2.8821	A	4.7
8	☐			2865.19	0.0006	P	5.0

$$y = 5.7352E-004 * x + 5.5714E-005$$

$$R = 0.9999$$

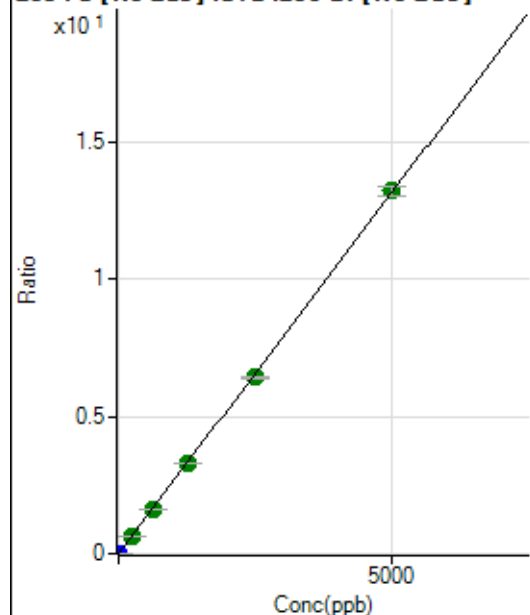
$$DL = 0.04174$$

$$BEC = 0.09715$$

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	1466.73	0.0003	P	8.5
2	☐	1.000	0.881	14746.17	0.0026	P	1.5
3	☐	250.000	247.880	3717440.11	0.6519	A	1.3
4	☐	625.000	615.953	9414315.31	1.6196	A	0.6
5	☐	1250.000	1256.855	18655421.22	3.3045	A	0.7
6	☐	2500.000	2439.701	37126960.90	6.4143	A	1.1
7	☐	5000.000	5029.673	76367152.29	13.2233	A	2.9
8	☐			12802.72	0.0026	P	7.0

$$y = 0.0026 * x + 2.6090E-004$$

$$R = 0.9999$$

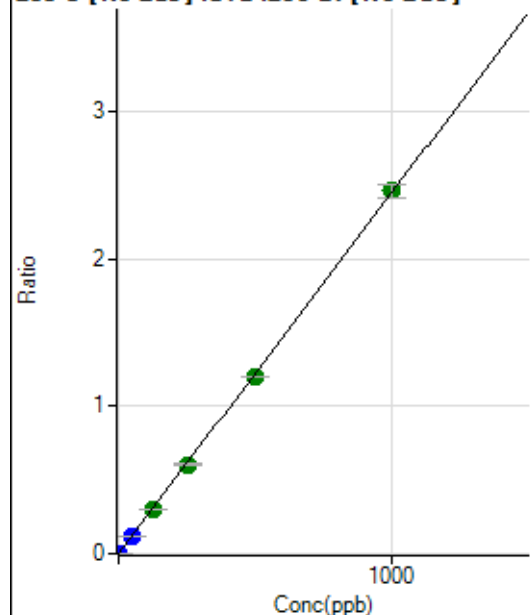
$$DL = 0.02517$$

$$BEC = 0.09924$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	25.00	0.0000	P	33.7
2	☐	1.000	0.955	13424.09	0.0023	P	3.7
3	☐	50.000	48.984	684854.87	0.1201	P	1.3
4	☐	125.000	122.690	1748469.91	0.3008	A	1.7
5	☐	250.000	247.703	3428958.37	0.6073	A	0.8
6	☐	500.000	490.220	6956740.09	1.2019	A	0.5
7	☐	1000.000	1005.804	14239856.22	2.4661	A	3.7
8	☐			622.26	0.0001	P	13.6

$$y = 0.0025 * x + 4.4508E-006$$

$$R = 0.9999$$

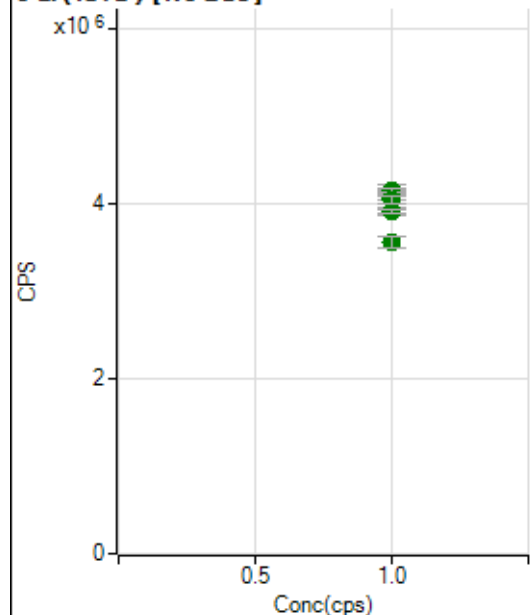
$$DL = 0.001835$$

$$BEC = 0.001815$$

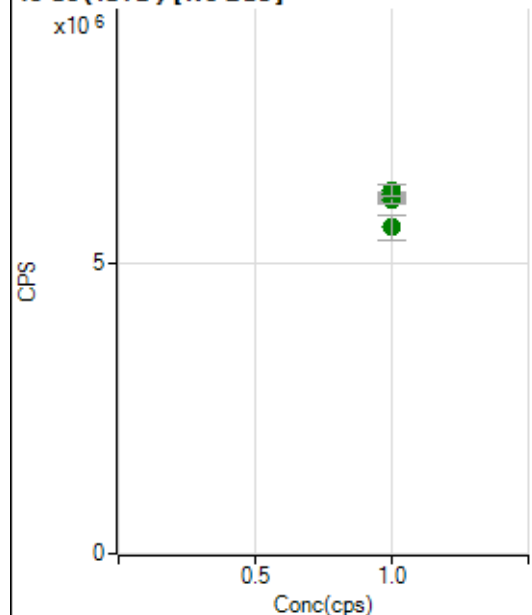
Weight: <None>

Min Conc: 0

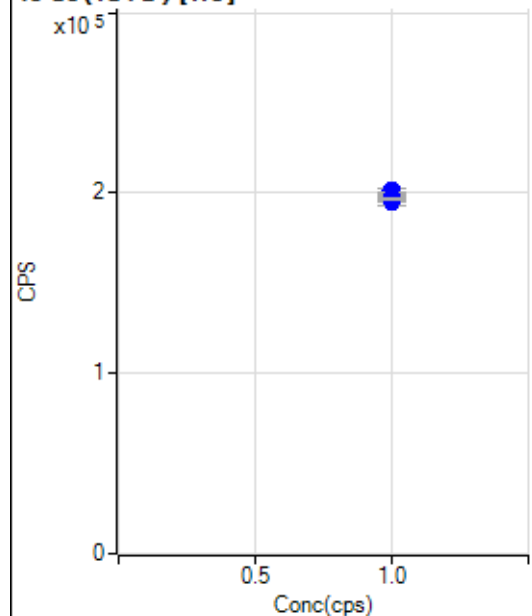
6 Li (ISTD) [No Gas]



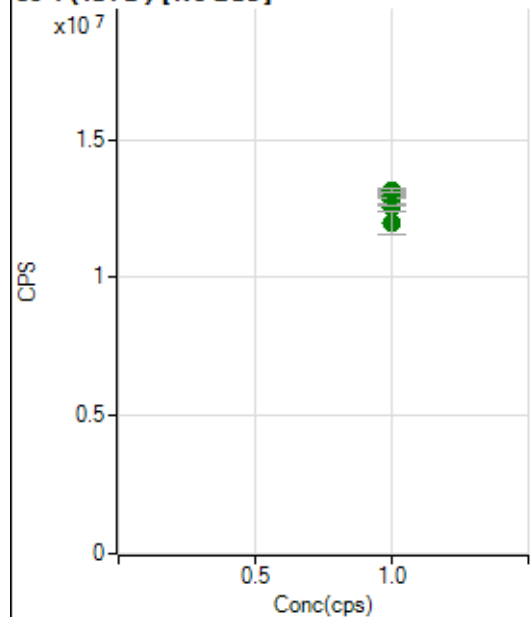
	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	1.000		4148160.76		A	3.2
2	☐	1.000		4132200.98		A	1.0
3	☐	1.000		4073478.11		A	1.1
4	☐	1.000		4148091.23		A	1.1
5	☐	1.000		3918628.20		A	2.0
6	☐	1.000		3917477.09		A	1.1
7	☐	1.000		4041718.67		A	2.0
8	☐	1.000		3562447.51		A	3.9

45 Sc (ISTD) [No Gas]

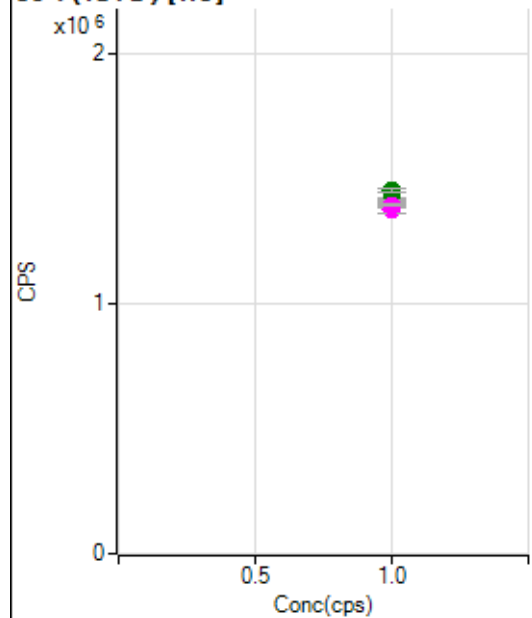
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6126923.24		A	1.8
2	☐	1.000		6127021.37		A	2.0
3	☐	1.000		6167703.38		A	1.3
4	☐	1.000		6073726.99		A	1.4
5	☐	1.000		6063565.81		A	1.0
6	☐	1.000		6070728.17		A	2.1
7	☐	1.000		6229428.03		A	3.2
8	☐	1.000		5603629.60		A	7.4

45 Sc (ISTD) [He]

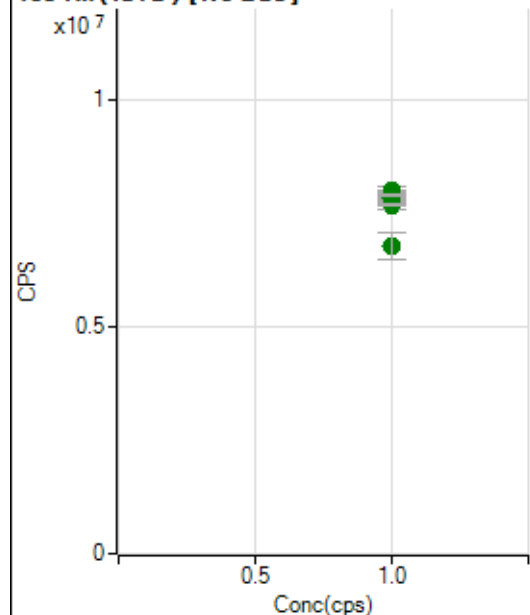
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		201178.42		P	1.4
2	☐	1.000		198759.36		P	1.2
3	☐	1.000		198118.39		P	0.6
4	☐	1.000		195196.70		P	1.8
5	☐	1.000		195900.73		P	0.9
6	☐	1.000		197526.41		P	0.7
7	☐	1.000		200568.03		P	0.4
8	☐	1.000		196769.62		P	0.4

89 Y (ISTD) [No Gas]

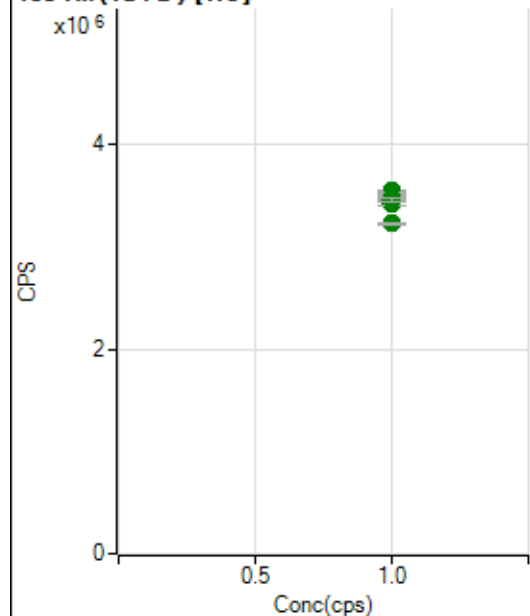
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		12529703.98		A	1.6
2	☐	1.000		12788700.78		A	2.7
3	☐	1.000		13088869.67		A	0.7
4	☐	1.000		12673292.17		A	0.4
5	☐	1.000		12623452.31		A	0.6
6	☐	1.000		12975582.72		A	1.0
7	☐	1.000		13142876.33		A	1.1
8	☐	1.000		11996601.49		A	6.7

89 Y (ISTD) [He]

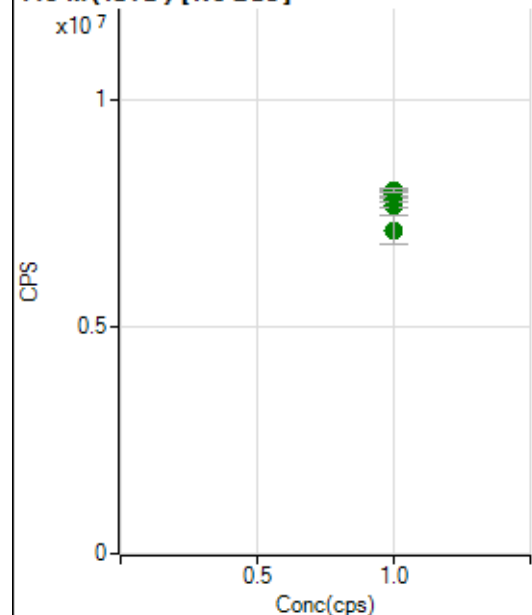
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1418591.18		M	1.3
2	☐	1.000		1413063.85		M	0.8
3	☐	1.000		1414929.96		M	0.5
4	☐	1.000		1375311.29		M	2.1
5	☐	1.000		1417135.17		M	0.8
6	☐	1.000		1414162.91		A	0.3
7	☐	1.000		1453209.75		A	1.0
8	☐	1.000		1397305.93		M	0.9

103 Rh (ISTD) [No Gas]

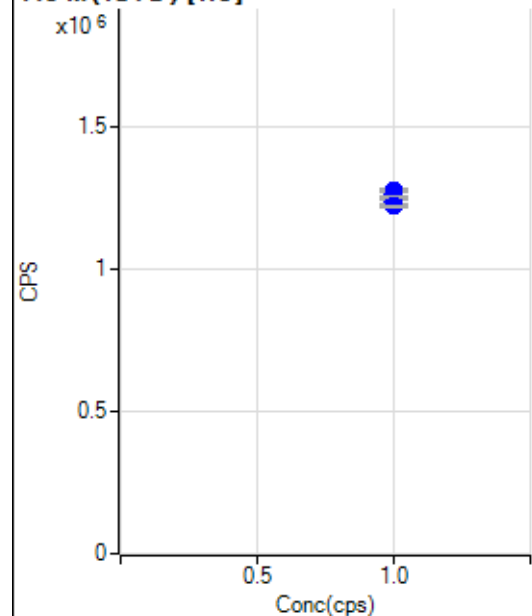
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		7895644.62		A	1.2
2	☐	1.000		7986124.05		A	2.5
3	☐	1.000		8002617.98		A	0.7
4	☐	1.000		7865948.87		A	1.6
5	☐	1.000		7683734.63		A	2.1
6	☐	1.000		7701078.64		A	0.7
7	☐	1.000		7924804.00		A	0.5
8	☐	1.000		6798434.31		A	8.7

103 Rh (ISTD) [He]

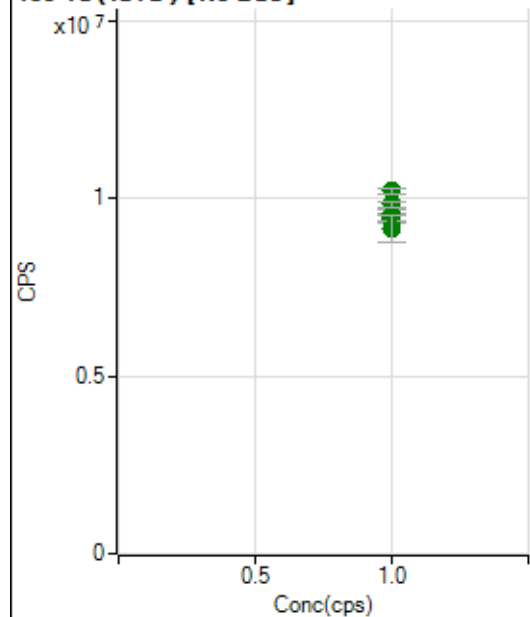
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		3512252.90		A	1.0
2	☐	1.000		3547042.59		A	0.6
3	☐	1.000		3507177.03		A	1.2
4	☐	1.000		3475625.30		A	2.1
5	☐	1.000		3480339.46		A	1.4
6	☐	1.000		3425001.41		A	1.3
7	☐	1.000		3463729.29		A	0.9
8	☐	1.000		3229209.22		A	0.8

115 In (ISTD) [No Gas]

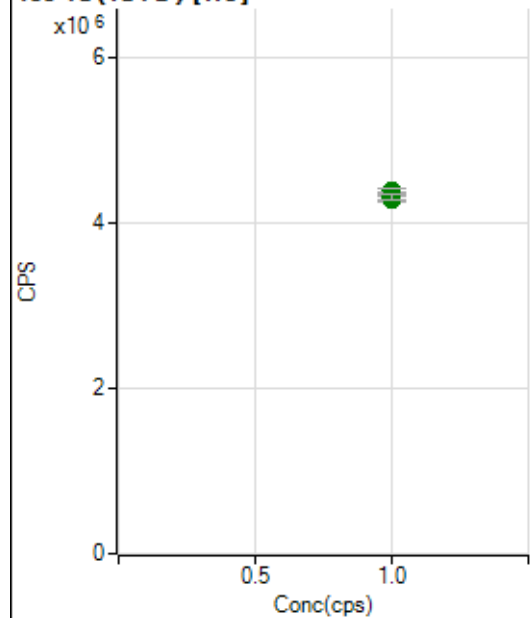
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		7925295.91		A	2.9
2	☐	1.000		7908578.07		A	1.2
3	☐	1.000		7985092.88		A	0.7
4	☐	1.000		7679793.71		A	2.0
5	☐	1.000		7789669.03		A	1.4
6	☐	1.000		7922830.16		A	1.1
7	☐	1.000		7982600.54		A	1.1
8	☐	1.000		7127486.11		A	9.0

115 In (ISTD) [He]

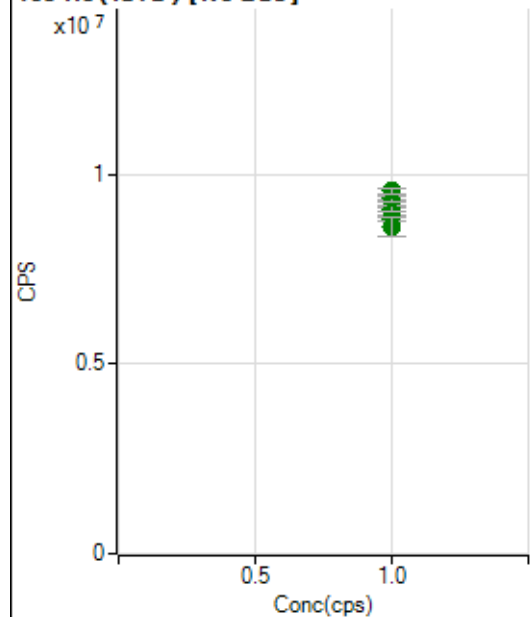
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1271228.29		P	1.8
2	☐	1.000		1275627.30		P	0.3
3	☐	1.000		1264431.62		P	1.0
4	☐	1.000		1234890.23		P	1.3
5	☐	1.000		1256808.55		P	0.5
6	☐	1.000		1238697.30		P	1.1
7	☐	1.000		1251576.27		P	0.6
8	☐	1.000		1222043.79		P	0.4

159 Tb (ISTD) [No Gas]

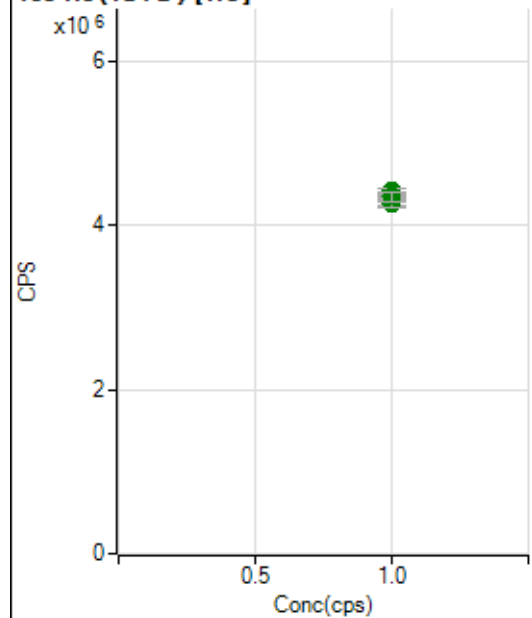
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		9470019.16		A	2.1
2	☐	1.000		9559533.12		A	1.0
3	☐	1.000		9595048.54		A	1.6
4	☐	1.000		9423575.83		A	2.2
5	☐	1.000		9436981.94		A	1.4
6	☐	1.000		9825463.95		A	1.7
7	☐	1.000		10212755.26		A	1.8
8	☐	1.000		9152991.11		A	8.0

159 Tb (ISTD) [He]

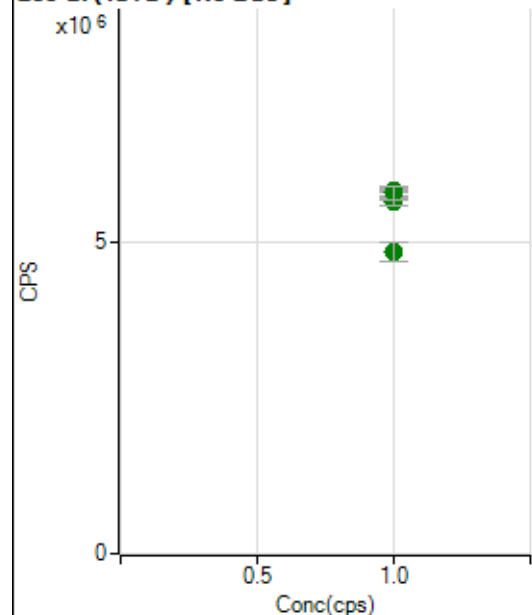
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4303576.84		A	1.0
2	☐	1.000		4292007.29		A	2.1
3	☐	1.000		4300152.26		A	2.4
4	☐	1.000		4317178.13		A	3.0
5	☐	1.000		4289543.69		A	1.7
6	☐	1.000		4327233.10		A	2.0
7	☐	1.000		4389953.37		A	1.3
8	☐	1.000		4309130.49		A	1.7

165 Ho (ISTD) [No Gas]

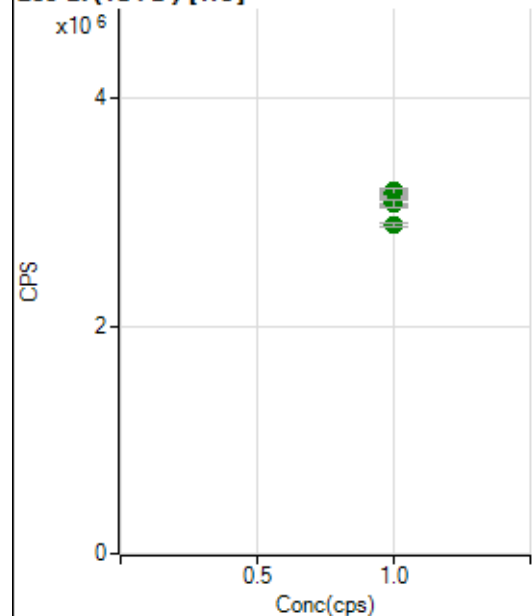
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		9174282.93		A	2.8
2	☐	1.000		8846519.47		A	1.3
3	☐	1.000		9010551.94		A	2.9
4	☐	1.000		9277859.76		A	1.6
5	☐	1.000		9092531.89		A	1.9
6	☐	1.000		9361907.85		A	1.4
7	☐	1.000		9567035.63		A	1.5
8	☐	1.000		8620078.23		A	5.8

165 Ho (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4301963.79		A	0.8
2	☐	1.000		4324733.10		A	0.3
3	☐	1.000		4274767.40		A	1.2
4	☐	1.000		4272649.35		A	2.5
5	☐	1.000		4289901.84		A	2.8
6	☐	1.000		4367347.12		A	1.5
7	☐	1.000		4424559.76		A	1.3
8	☐	1.000		4350396.32		A	2.4

209 Bi (ISTD) [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5627571.03		A	1.9
2	☐	1.000		5721254.84		A	0.4
3	☐	1.000		5701488.66		A	1.3
4	☐	1.000		5812840.89		A	1.0
5	☐	1.000		5645630.13		A	2.1
6	☐	1.000		5788234.08		A	1.7
7	☐	1.000		5778520.47		A	3.4
8	☐	1.000		4850399.06		A	6.4

209 Bi (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		3189315.65		A	0.8
2	☐	1.000		3159787.97		A	0.6
3	☐	1.000		3161772.28		A	2.2
4	☐	1.000		3092834.92		A	2.5
5	☐	1.000		3182856.90		A	2.3
6	☐	1.000		3099937.66		A	1.6
7	☐	1.000		3076362.80		A	2.0
8	☐	1.000		2885885.10		A	1.1

US EPA Tune Check Report

Operator Name Jaswal

Acq/Data Batch D:\Agilent\ICPMH\1\DATA\IP8040423 MS.b

Acq. Date-Time 2023-04-04 09:52:54

Report Comment ---

Instrument Name G8403A SG19224459

[No Gas]

Sensitivity

Mass	Conc. [ug/l]	Count	CPS	Resp (Required) [cps/ug/l]	Resp (Flag)	RSD%	RSD% (Required)
9		16188	161877.29			0.349	5.000
24		124200	1242003.21			1.209	5.000
25		16798	167976.54			0.827	5.000
26		19402	194022.93			0.499	5.000
59		96681	966814.58			1.359	5.000
113		9897	98970.51			0.859	5.000
115		117924	1179238.50			2.184	5.000
206		24311	243114.17			2.237	5.000
207		22486	224855.68			1.726	5.000
208		52862	528624.70			1.472	5.000
220		0	4.10			33.840	

Mass	RSD% (Flag)
9	
24	
25	
26	
59	
113	
115	
206	
207	
208	
220	

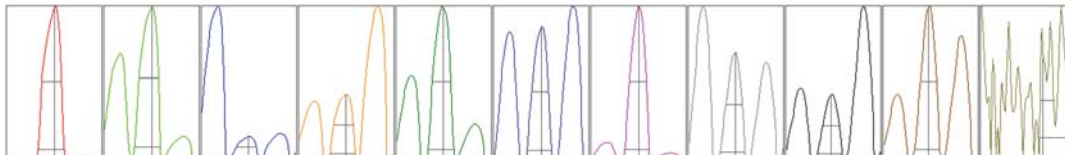
Mass	Rep#1 Count	Rep#2 Count	Rep#3 Count	Rep#4 Count	Rep#5 Count
9	16220	16258	16107	16179	16174
24	126042	125593	123250	122766	123351
25	16858	17006	16719	16758	16648
26	19558	19403	19353	19299	19398
59	98480	97028	96286	96773	94841
113	9906	9971	9861	9771	9976
115	119098	116198	114383	119172	120768
206	23770	24234	24173	24154	25227
207	22158	22434	22523	22191	23122
208	52191	52639	52507	52776	54199

US EPA Tune Check Report

Mass	Rep#1 Count	Rep#2 Count	Rep#3 Count	Rep#4 Count	Rep#5 Count
220	0	0	1	0	1

Integration Time [sec] 0.1

Resolution/Axis



Mass	Peak Height	Axis	Axis (Required)	Axis (Flag)
9	28660.11	9.05	8.90 - 9.10	
24	210732.18	24.05	23.90 - 24.10	
25	28431.29	25.00	24.90 - 25.10	
26	32333.70	26.00	25.90 - 26.10	
59	174193.33	59.00	58.90 - 59.10	
113	19426.58	113.05	112.90 - 113.10	
115	231570.90	115.05	114.90 - 115.10	
206	48013.08	206.00	205.90 - 206.10	
207	43403.36	206.95	206.90 - 207.10	
208	104819.84	207.95	207.90 - 208.10	
220	0.65	220.50	-	

Mass	W-50%	W-5%	W-5% (Required)	W-5% (Flag)
9	0.62	0.819	0.900	
24	0.62	0.808	0.900	
25	0.62	0.812	0.900	
26	0.63	0.790	0.900	
59	0.58	0.813	0.900	
113	0.52	0.772	0.900	
115	0.53	0.769	0.900	
206	0.51	0.780	0.900	
207	0.52	0.783	0.900	
208	0.51	0.791	0.900	
220	0.42	0.880		

Integration Time [sec] 0.1

Acquisition Time [sec] 256.770000000002

Y Axis Linear

Tune Parameters

Plasma Parameters

Plasma Mode --- Nebulizer Gas 0.87 L/min Dilution Gas 0.40 L/min

US EPA Tune Check Report

RF Power	1600 W	Option Gas	---	Auxiliary Gas	0.90 L/min
RF Matching	1.40 V	Nebulizer Pump	0.10 rps	Plasma Gas	15.0 L/min
Sample Depth	10.0 mm	S/C Temp	2 °C		

Lens Parameters

Extract 1	-6.0 V	Omega Lens	10.2 V	Deflect	15.8 V
Extract 2	-180.0 V	Cell Entrance	-30 V	Plate Bias	-50 V
Omega Bias	-95 V	Cell Exit	-50 V		

Cell Parameters

Use Gas	No	3rd Gas Flow	---	Energy Discrimination	4.0 V
He Flow	0.0 mL/min	OctP Bias	-8.0 V		
H2 Flow	---	OctP RF	150 V		

QP Parameters

Mass Gain	124	Axis Gain	0.9990	QP Bias	-4.0 V
Mass Offset	124	Axis Offset	0.02		

Hardware Settings

Torch

Torch H	1.4 mm	Torch V	-1.0 mm
---------	--------	---------	---------

EM

Discriminator	4.6 mV	Analog HV	2317 V	Pulse HV	1730 V
---------------	--------	-----------	--------	----------	--------

[He]

Sensitivity

Mass	Conc. [ug/l]	Count	CPS	Resp (Required) [cps/ug/l]	Resp (Flag)	RSD%	RSD% (Required)
59		19783	197830.35			0.564	
89		14996	149962.89			0.978	
205		19169	191692.30			0.522	

Mass	RSD% (Flag)
59	
89	
205	

Mass	Rep#1 Count	Rep#2 Count	Rep#3 Count	Rep#4 Count	Rep#5 Count
59	19929	19686	19843	19659	19798
89	15067	14893	15054	14801	15166
205	19215	19134	19013	19212	19272

Integration Time [sec] 0.1

Tune Parameters

Plasma Parameters

Plasma Mode	---	Nebulizer Gas	0.87 L/min	Dilution Gas	0.40 L/min
RF Power	1600 W	Option Gas	---	Auxiliary Gas	0.90 L/min
RF Matching	1.40 V	Nebulizer Pump	0.10 rps	Plasma Gas	15.0 L/min
Sample Depth	10.0 mm	S/C Temp	2 °C		

Lens Parameters

Extract 1	-6.0 V	Omega Lens	10.2 V	Deflect	4.6 V
-----------	--------	------------	--------	---------	-------

US EPA Tune Check Report

Extract 2	-180.0 V	Cell Entrance	-50 V	Plate Bias	-60 V
Omega Bias	-95 V	Cell Exit	-70 V		

Cell Parameters

Use Gas	Yes	3rd Gas Flow	---	Energy Discrimination	5.0 V
He Flow	4.5 mL/min	OctP Bias	-18.0 V		
H2 Flow	---	OctP RF	190 V		

QP Parameters

Mass Gain	124	Axis Gain	0.9990	QP Bias	-13.0 V
Mass Offset	124	Axis Offset	0.02		

Hardware Settings

Torch

Torch H	1.4 mm	Torch V	-1.0 mm
---------	--------	---------	---------

EM

Discriminator	4.6 mV	Analog HV	2317 V	Pulse HV	1730 V
---------------	--------	-----------	--------	----------	--------