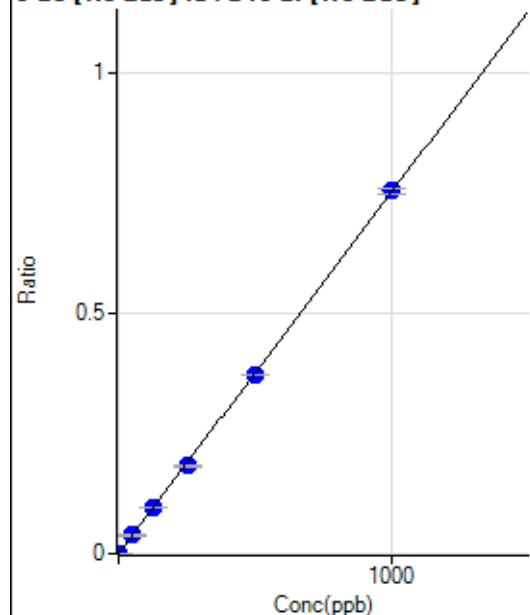


Batch Folder: C:\Agilent\ICPMH\1\DATA\P7123120MS.b\
Analysis File: P7123120MS.batch.bin
DA Date-Time: 2021-01-03 23:42:52
Calibration Title:
Calibration Method: External Calibration
VIS Interpolation Fit:

Level	Standard Data File	Sample Name	Acq. Date-Time
1	003CALB.d	S00	2020-12-31 12:41:28
2	004CALS.d	S02	2020-12-31 12:45:06
3	005CALS.d	S03	2020-12-31 12:48:43
4	006CALS.d	S04	2020-12-31 12:52:22
5	007CALS.d	S05	2020-12-31 12:56:00
6	008CALS.d	S06	2020-12-31 12:59:36
7	009CALS.d	S07	2020-12-31 13:03:06
8	010CALS.d	S08	2020-12-31 13:06:31

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	53.71	0.0000	P	16.2
2	☐	1.000	0.850	1016.72	0.0007	P	6.4
3	☐	50.000	50.669	56160.97	0.0382	P	2.2
4	☐	125.000	126.602	140346.36	0.0954	P	1.1
5	☐	250.000	243.167	274630.12	0.1832	P	1.6
6	☐	500.000	495.887	553511.64	0.3737	P	0.1
7	☐	1000.000	1003.531	1105824.82	0.7561	P	1.6
8	☐			190.75	0.0001	P	14.3

$$y = 7.5344\text{E-}004 * x + 3.5857\text{E-}005$$

$$R = 1.0000$$

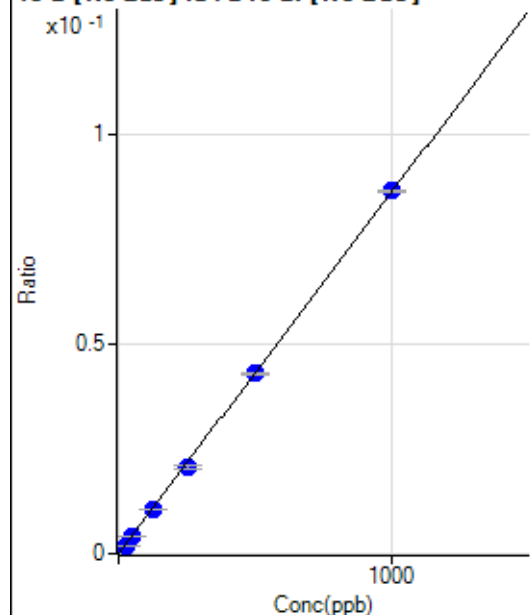
$$DL = 0.02319$$

$$BEC = 0.04759$$

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	44.44	0.0000	P	39.3
2	☐	25.000	21.823	2869.79	0.0019	P	6.6
3	☐	50.000	48.473	6179.17	0.0042	P	4.3
4	☐	125.000	123.247	15655.64	0.0106	P	1.4
5	☐	250.000	239.751	30996.13	0.0207	P	3.5
6	☐	500.000	498.210	63600.48	0.0429	P	1.5
7	☐	1000.000	1003.832	126493.38	0.0865	P	0.6
8	☐			2728.10	0.0019	P	3.8

$$y = 8.6122\text{E-}005 * x + 2.9679\text{E-}005$$

$$R = 0.9999$$

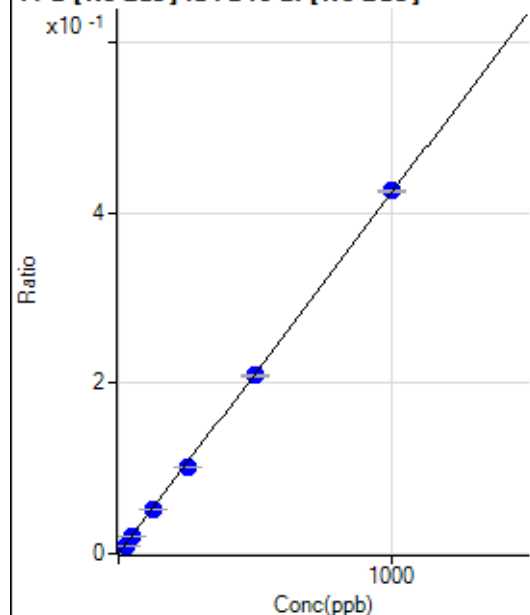
$$DL = 0.4063$$

$$BEC = 0.3446$$

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	213.90	0.0001	P	11.6
2	☐	25.000	22.952	14796.41	0.0098	P	3.3
3	☐	50.000	49.474	30934.70	0.0210	P	0.2
4	☐	125.000	122.433	76297.42	0.0519	P	1.1
5	☐	250.000	240.692	152645.41	0.1018	P	0.4
6	☐	500.000	493.339	308996.69	0.2086	P	1.4
7	☐	1000.000	1006.056	621953.53	0.4253	P	0.8
8	☐			12866.89	0.0090	P	7.0

$$y = 4.2255\text{E-}004 * x + 1.4270\text{E-}004$$

$$R = 0.9999$$

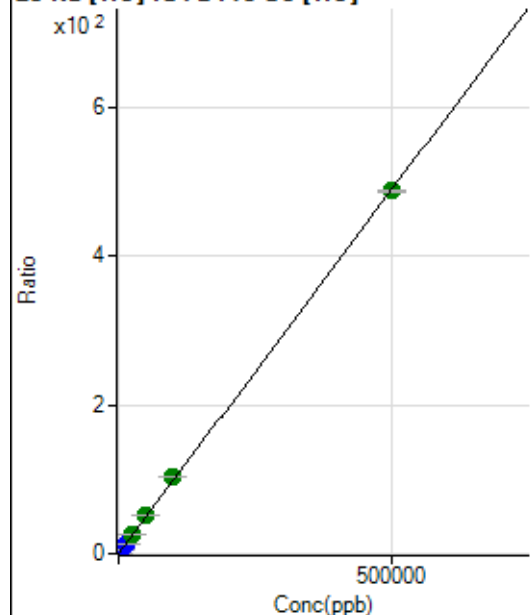
$$DL = 0.1177$$

$$BEC = 0.3377$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	14226.50	0.0429	P	2.2
2	☐	500.000	514.019	176872.90	0.5452	P	0.5
3	☐	5000.000	5995.169	1789121.83	5.9012	P	10.0
4	☐	12500.000	14000.001	4334398.32	13.7232	P	0.8
5	☐	25000.000	26069.145	7819905.82	25.5168	A	0.3
6	☐	50000.000	53272.611	15384937.84	52.0991	A	1.2
7	☐	100000.00	104605.94	30540125.68	102.2602	A	0.5
8	☐	500000.00	498650.62	146343079.6	487.3072	A	0.5

$$y = 9.7717\text{E-}004 * x + 0.0429$$

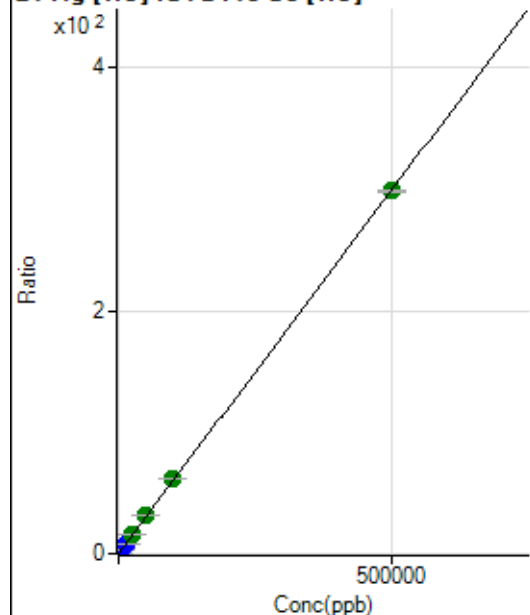
$$R = 0.9999$$

$$DL = 2.895$$

$$BEC = 43.9$$

Weight: <None>

Min Conc: 0

24 Mg [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	119.45	0.0004	P	4.7
2	☐	500.000	496.219	96388.43	0.2971	P	1.0
3	☐	5000.000	5849.284	1061058.53	3.4983	P	9.4
4	☐	12500.000	13567.351	2562726.17	8.1139	P	0.7
5	☐	25000.000	25703.983	4710950.32	15.3718	A	0.5
6	☐	50000.000	52449.266	9261229.81	31.3659	A	2.3
7	☐	100000.00	102297.89	18270436.00	61.1763	A	0.1
8	☐	500000.00	499225.12	89656383.26	298.5457	A	0.7

$$y = 5.9802\text{E-}004 * x + 3.6023\text{E-}004$$

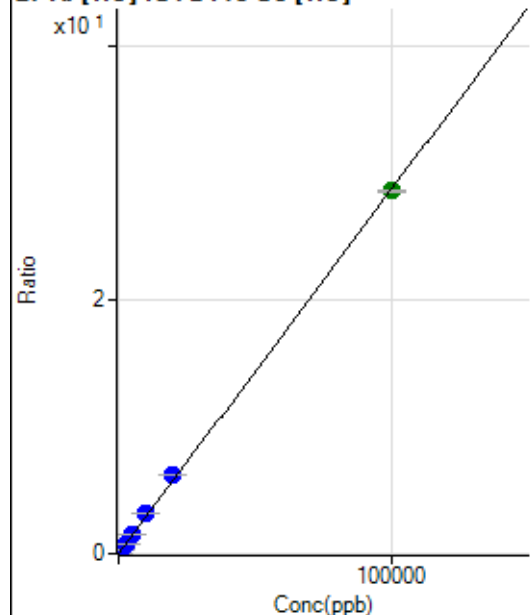
$$R = 1.0000$$

$$DL = 0.08575$$

$$BEC = 0.6024$$

Weight: <None>

Min Conc: 0

27 Al [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	472.24	0.0014	P	22.8
2	☐	20.000	20.077	2333.57	0.0072	P	14.9
3	☐	1000.000	1160.870	101687.65	0.3351	P	8.4
4	☐	2500.000	2713.915	246803.14	0.7814	P	0.6
5	☐	5000.000	5366.844	473143.47	1.5438	P	1.0
6	☐	10000.000	10972.112	931522.42	3.1548	P	2.1
7	☐	20000.000	21496.308	1845475.32	6.1794	P	0.3
8	☐	100000.00	99578.228	8594799.76	28.6197	A	0.3

$$y = 2.8740\text{E-}004 * x + 0.0014$$

$$R = 0.9999$$

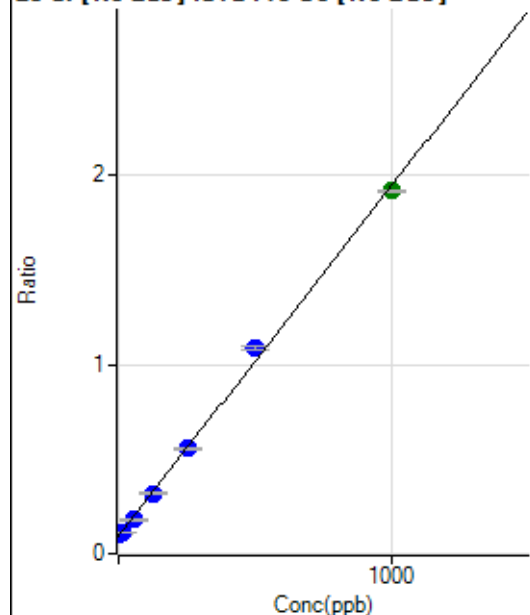
$$DL = 3.388$$

$$BEC = 4.959$$

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	408631.58	0.0997	P	0.4
2	☐	10.000	4.249	439238.83	0.1076	P	0.7
3	☐	50.000	42.847	711682.95	0.1788	P	2.5
4	☐	125.000	117.678	1248023.89	0.3169	P	3.2
5	☐	250.000	247.878	2177080.61	0.5572	P	1.6
6	☐	500.000	534.836	4148497.19	1.0868	P	1.8
7	☐	1000.000	984.443	7062931.58	1.9166	A	0.3
8	☐			818292.80	0.2234	P	0.7

$$y = 0.0018 * x + 0.0997$$

$$R = 0.9990$$

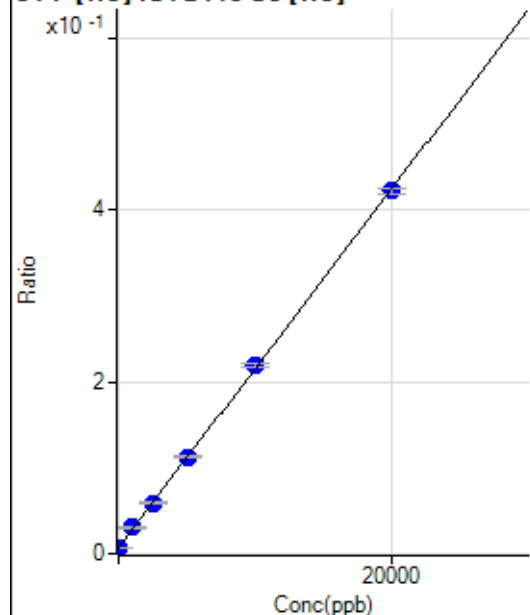
$$DL = 0.6261$$

$$BEC = 54.03$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	11.537	2450.27	0.0074	P	10.9
2	☐	0.000	-11.537	2241.89	0.0069	P	6.3
3	☐	1000.000	1113.207	9236.40	0.0304	P	6.6
4	☐	2500.000	2496.417	18712.01	0.0592	P	1.8
5	☐	5000.000	5045.566	34459.62	0.1124	P	2.0
6	☐	10000.000	10172.304	64796.32	0.2194	P	2.1
7	☐	20000.000	19897.244	126145.60	0.4224	P	1.7
8	☐			2111.32	0.0070	P	2.8

$$y = 2.0868E-005 * x + 0.0071$$

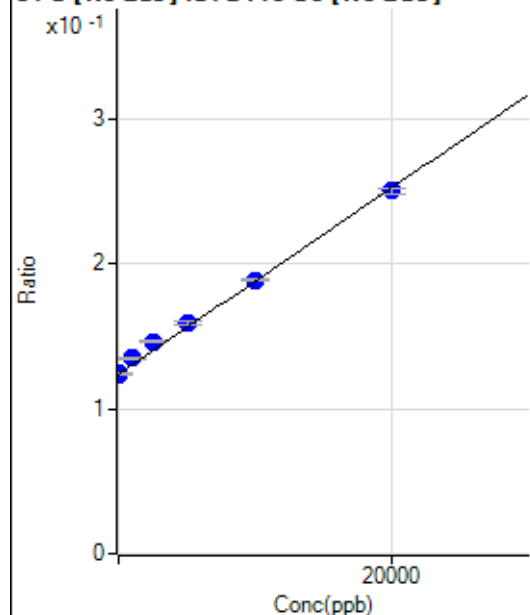
$$R = 0.9999$$

$$DL = 89.34$$

$$BEC = 342.6$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	-21.685	506476.24	0.1236	P	0.7
2	☐	0.000	21.685	505874.94	0.1239	P	0.9
3	☐	1000.000	1691.053	535705.10	0.1346	P	0.5
4	☐	2500.000	3522.848	576428.00	0.1463	P	0.3
5	☐	5000.000	5460.299	620321.41	0.1588	P	1.4
6	☐	10000.000	10124.287	720390.82	0.1887	P	0.9
7	☐	20000.000	19660.373	920975.85	0.2499	P	1.3
8	☐			492592.73	0.1345	P	1.6

$$y = 6.4198\text{E-}006 * x + 0.1237$$

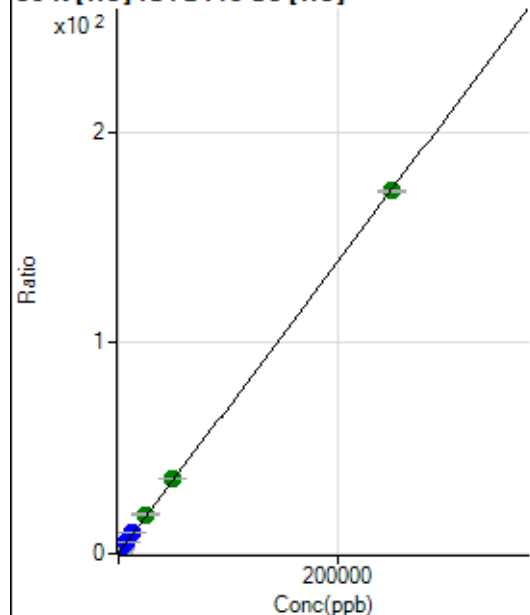
R = 0.9984

DL = 464.5

BEC = 1.927E+04

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	79085.08	0.2384	P	1.2
2	☐	500.000	526.325	195121.87	0.6014	P	0.7
3	☐	2500.000	3119.750	724769.64	2.3899	P	9.6
4	☐	6250.000	7120.095	1626200.32	5.1487	P	0.8
5	☐	12500.000	14090.213	3051027.80	9.9556	P	1.0
6	☐	25000.000	26612.845	5489447.82	18.5917	A	2.3
7	☐	50000.000	51693.161	10718061.96	35.8881	A	0.2
8	☐	250000.00	249392.57	51722258.10	172.2293	A	0.5

$$y = 6.8964\text{E-}004 * x + 0.2384$$

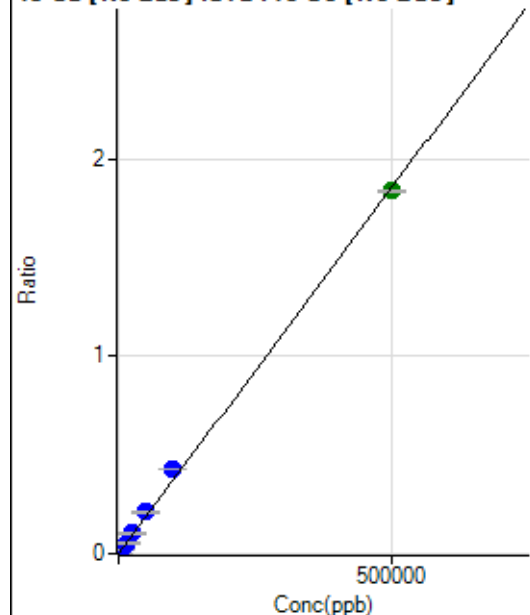
R = 1.0000

DL = 12.95

BEC = 345.8

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	522.25	0.0001	P	21.0
2	☐	500.000	506.458	8188.62	0.0020	P	5.6
3	☐	5000.000	5818.644	86398.60	0.0217	P	1.1
4	☐	12500.000	14352.459	210146.70	0.0534	P	1.0
5	☐	25000.000	27744.264	402439.71	0.1030	P	2.0
6	☐	50000.000	56745.882	803767.50	0.2106	P	1.2
7	☐	100000.00	115640.69	1580536.49	0.4290	P	2.3
8	☐	500000.00	496005.55	6738113.78	1.8396	A	0.3

$$y = 3.7085\text{E-}006 * x + 1.2750\text{E-}004$$

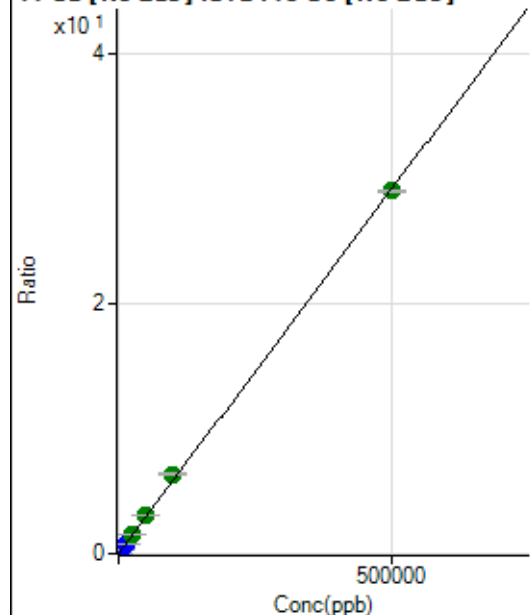
$$R = 0.9994$$

$$DL = 21.61$$

$$BEC = 34.38$$

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	21148.88	0.0052	P	2.2
2	☐	500.000	528.247	147007.03	0.0360	P	1.5
3	☐	5000.000	5867.588	1383981.92	0.3477	P	1.0
4	☐	12500.000	14409.935	3333824.10	0.8464	P	0.2
5	☐	25000.000	26039.657	5958754.82	1.5253	A	1.9
6	☐	50000.000	52902.508	11808375.87	3.0935	A	1.0
7	☐	100000.00	108359.42	23325040.80	6.3310	A	2.7
8	☐	500000.00	497929.43	106491858.6	29.0735	A	0.8

$$y = 5.8379\text{E-}005 * x + 0.0052$$

$$R = 0.9998$$

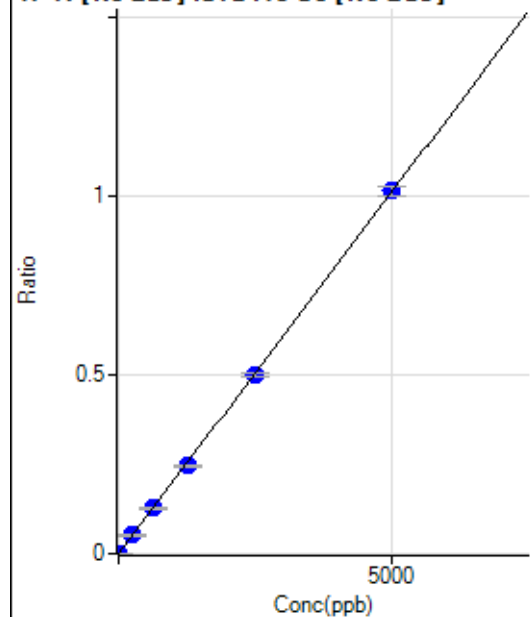
$$DL = 5.865$$

$$BEC = 88.4$$

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	152.79	0.0000	P	13.5
2	☐	5.000	4.464	3828.37	0.0009	P	8.3
3	☐	250.000	254.423	204421.91	0.0514	P	1.6
4	☐	625.000	625.980	497500.94	0.1263	P	0.5
5	☐	1250.000	1217.120	959229.40	0.2455	P	2.4
6	☐	2500.000	2476.734	1907124.87	0.4996	P	1.6
7	☐	5000.000	5019.510	3730417.53	1.0125	P	2.7
8	☐			888.94	0.0002	P	6.8

$$y = 2.0171E-004 * x + 3.7275E-005$$

$$R = 1.0000$$

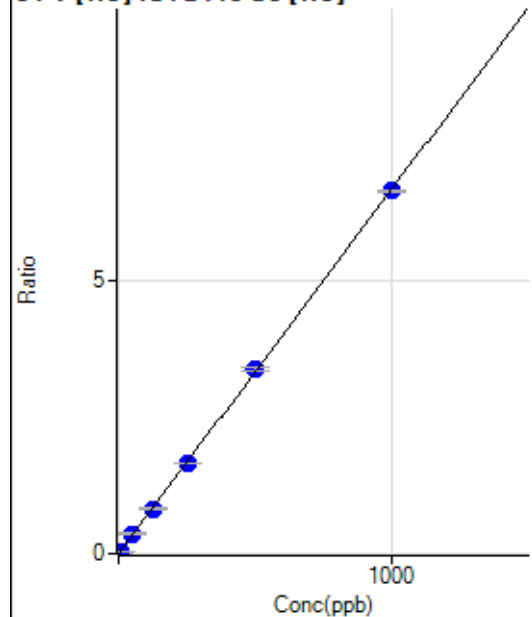
$$DL = 0.07472$$

$$BEC = 0.1848$$

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	6.67	0.0000	P	132.8
2	☐	5.000	4.662	10085.75	0.0311	P	2.3
3	☐	50.000	54.219	109589.27	0.3613	P	9.4
4	☐	125.000	123.855	260689.28	0.8254	P	0.9
5	☐	250.000	248.692	507903.88	1.6573	P	0.7
6	☐	500.000	507.792	999157.99	3.3839	P	2.1
7	☐	1000.000	996.365	1982930.09	6.6396	P	0.5
8	☐			288.89	0.0010	P	16.1

$$y = 0.0067 * x + 2.0206E-005$$

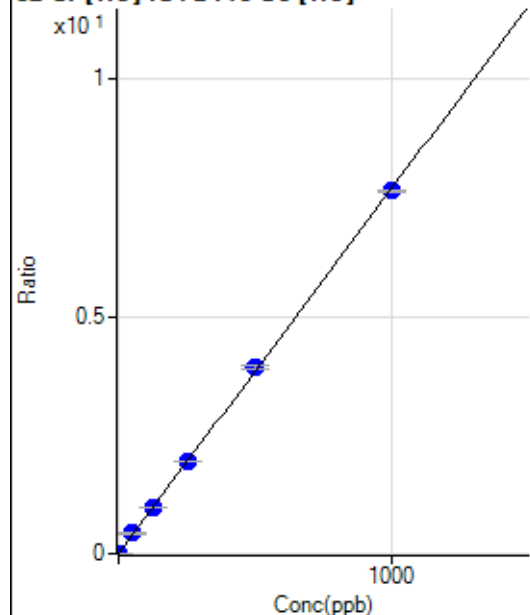
$$R = 0.9999$$

$$DL = 0.01208$$

$$BEC = 0.003032$$

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	1120.06	0.0034	P	9.5
2	☐	2.000	1.953	5965.70	0.0184	P	0.4
3	☐	50.000	54.998	129209.71	0.4261	P	9.8
4	☐	125.000	125.297	305246.00	0.9664	P	0.6
5	☐	250.000	251.509	593461.95	1.9365	P	1.3
6	☐	500.000	510.893	1160434.44	3.9302	P	2.5
7	☐	1000.000	993.889	2282491.06	7.6426	P	0.8
8	☐			9164.03	0.0305	P	2.8

$$y = 0.0077 * x + 0.0034$$

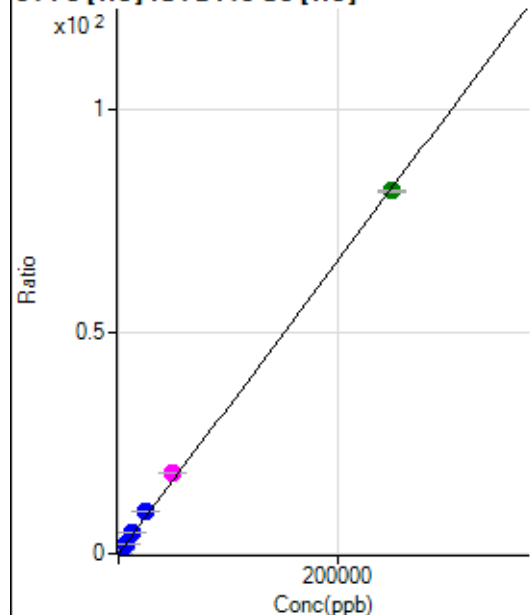
$$R = 0.9999$$

$$DL = 0.1253$$

$$BEC = 0.4396$$

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	1227.99	0.0037	P	2.5
2	☐	50.000	56.380	7222.54	0.0223	P	3.7
3	☐	2500.000	3126.157	313317.42	1.0328	P	9.1
4	☐	6250.000	7145.160	744075.95	2.3558	P	0.9
5	☐	12500.000	14259.542	1439693.82	4.6978	P	0.7
6	☐	25000.000	29058.270	2825572.06	9.5695	P	2.2
7	☐	50000.000	55026.353	5410969.22	18.1179	M	1.2
8	☐	250000.00	248472.28	24564968.90	81.7988	A	0.5

$$y = 3.2919E-004 * x + 0.0037$$

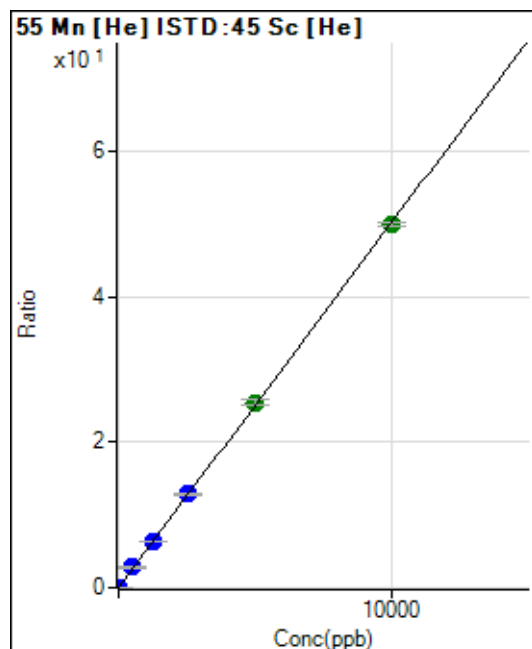
$$R = 0.9997$$

$$DL = 0.8312$$

$$BEC = 11.25$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	84.44	0.0003	P	12.8
2	☐	1.000	0.961	1649.00	0.0051	P	4.1
3	☐	500.000	558.799	852028.39	2.8090	P	9.3
4	☐	1250.000	1275.526	2025087.66	6.4116	P	0.6
5	☐	2500.000	2559.589	3942835.67	12.8659	P	1.2
6	☐	5000.000	5078.942	7537572.04	25.5294	A	3.1
7	☐	10000.000	9939.501	14920895.47	49.9608	A	1.0
8	☐			8281.28	0.0276	P	1.4

$$y = 0.0050 * x + 2.5479E-004$$

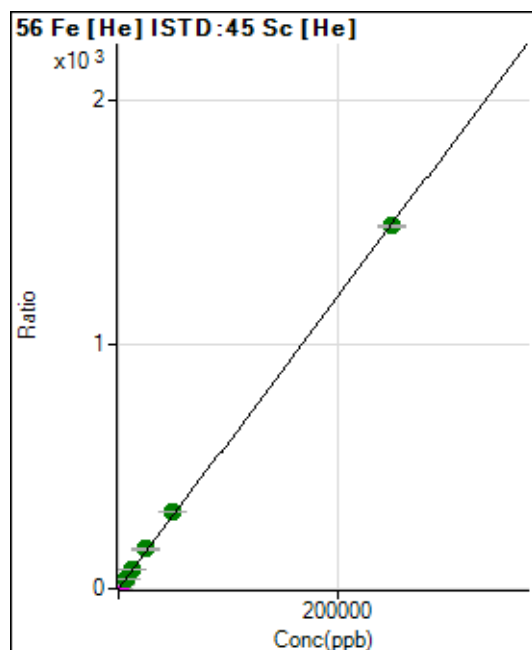
$$R = 0.9999$$

$$DL = 0.01953$$

$$BEC = 0.05069$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	6308.85	0.0190	P	3.1
2	☐	50.000	53.154	109064.01	0.3362	P	1.4
3	☐	2500.000	3011.511	5452615.46	17.9881	M	10.5
4	☐	6250.000	6649.584	12537760.12	39.6958	A	0.8
5	☐	12500.000	13401.480	24511131.10	79.9831	A	1.5
6	☐	25000.000	27290.251	48082442.74	162.8548	A	3.3
7	☐	50000.000	53295.036	94977538.24	318.0204	A	0.4
8	☐	250000.00	249051.78	446281395.1	1,486.063	A	0.5

$$y = 0.0060 * x + 0.0190$$

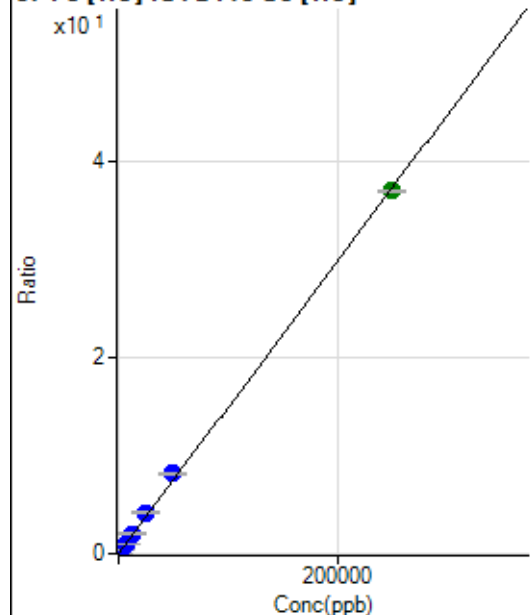
$$R = 0.9999$$

$$DL = 0.2927$$

$$BEC = 3.188$$

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	394.46	0.0012	P	14.9
2	☐	50.000	53.230	2955.90	0.0091	P	7.3
3	☐	2500.000	3027.583	137037.80	0.4519	P	9.7
4	☐	6250.000	6904.637	325033.88	1.0291	P	1.3
5	☐	12500.000	13795.967	629778.35	2.0550	P	0.8
6	☐	25000.000	28219.401	1240754.90	4.2023	P	2.7
7	☐	50000.000	54768.299	2435413.31	8.1547	P	1.0
8	☐	250000.00	248637.95	11116546.08	37.0168	A	0.2

$$y = 1.4887E-004 * x + 0.0012$$

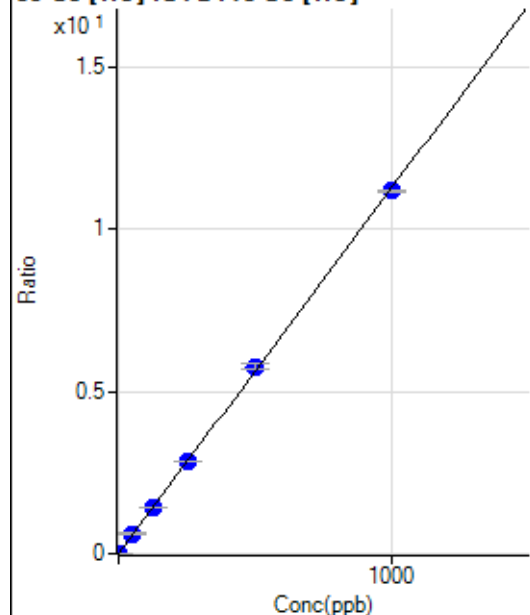
R = 0.9998

DL = 3.557

BEC = 7.983

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	66.67	0.0002	P	25.4
2	☐	1.000	0.965	3586.03	0.0111	P	4.6
3	☐	50.000	55.204	188418.70	0.6214	P	9.8
4	☐	125.000	126.522	449708.14	1.4238	P	1.0
5	☐	250.000	252.543	870907.27	2.8418	P	1.2
6	☐	500.000	512.574	1702987.00	5.7677	P	2.5
7	☐	1000.000	992.627	3335759.81	11.1693	P	0.3
8	☐			4809.72	0.0160	P	1.7

$$y = 0.0113 * x + 2.0079E-004$$

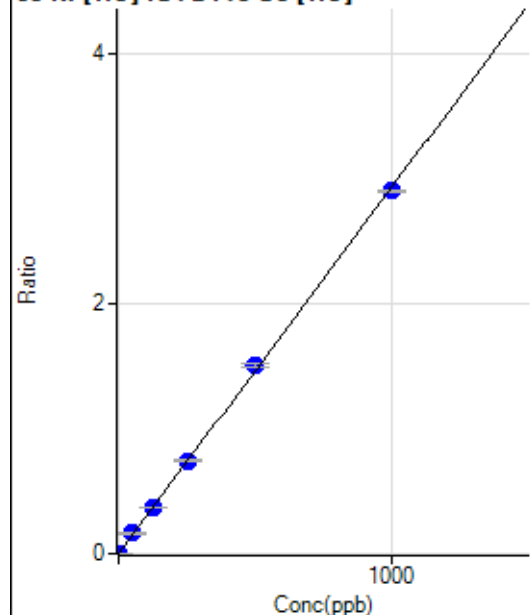
R = 0.9999

DL = 0.01362

BEC = 0.01784

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	71.11	0.0002	P	19.4
2	☐	1.000	1.022	1041.16	0.0032	P	2.0
3	☐	50.000	56.155	49916.77	0.1647	P	10.5
4	☐	125.000	127.358	117882.99	0.3732	P	1.1
5	☐	250.000	254.543	228544.32	0.7457	P	0.6
6	☐	500.000	514.221	444757.35	1.5063	P	2.6
7	☐	1000.000	991.151	867046.36	2.9032	P	0.4
8	☐			2465.79	0.0082	P	1.8

$$y = 0.0029 * x + 2.1456E-004$$

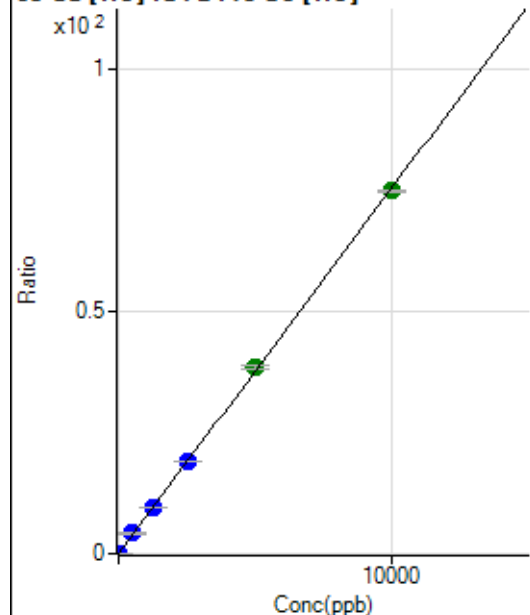
$$R = 0.9998$$

$$DL = 0.04262$$

$$BEC = 0.07326$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	1370.08	0.0041	P	6.1
2	☐	2.000	2.250	6843.88	0.0211	P	2.4
3	☐	500.000	556.013	1271989.36	4.1950	P	9.9
4	☐	1250.000	1262.837	3007641.35	9.5226	P	1.0
5	☐	2500.000	2513.079	5806176.37	18.9461	P	1.0
6	☐	5000.000	5123.221	11403909.00	38.6197	A	1.8
7	☐	10000.000	9930.714	22355543.28	74.8555	A	0.7
8	☐			9212.98	0.0307	P	2.1

$$y = 0.0075 * x + 0.0041$$

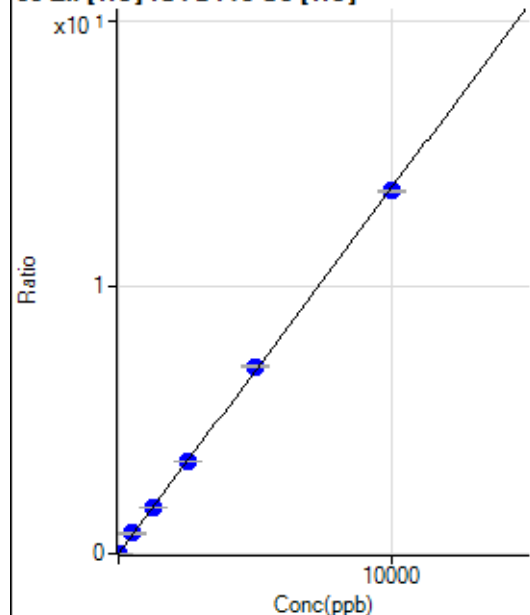
$$R = 0.9999$$

$$DL = 0.09999$$

$$BEC = 0.5482$$

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	404.46	0.0012	P	14.1
2	☐	2.000	1.931	1255.62	0.0039	P	8.6
3	☐	500.000	555.849	231713.55	0.7641	P	9.7
4	☐	1250.000	1268.308	550175.37	1.7419	P	1.4
5	☐	2500.000	2532.186	1065433.44	3.4766	P	0.9
6	☐	5000.000	5126.041	2077736.01	7.0366	P	2.0
7	☐	10000.000	9923.852	4068060.95	13.6214	P	0.5
8	☐			4201.76	0.0140	P	2.3

$$y = 0.0014 * x + 0.0012$$

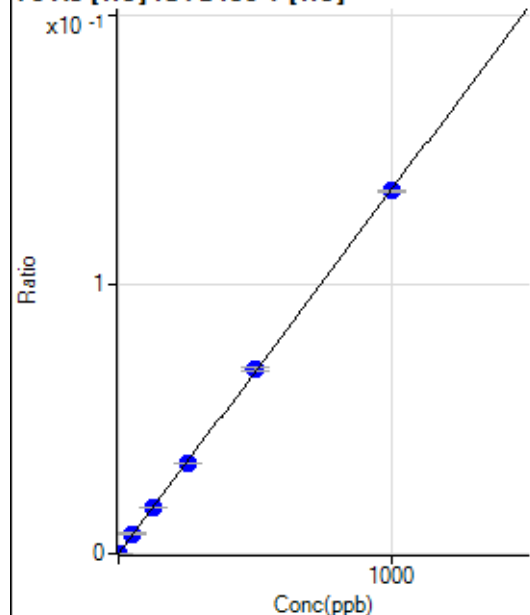
$$R = 0.9999$$

$$DL = 0.3762$$

$$BEC = 0.8891$$

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	14.81	0.0000	P	25.4
2	☐	1.000	0.950	332.72	0.0001	P	6.3
3	☐	50.000	54.872	17322.07	0.0074	P	10.5
4	☐	125.000	125.226	40982.83	0.0169	P	0.9
5	☐	250.000	249.311	79662.19	0.0337	P	0.8
6	☐	500.000	506.722	157098.38	0.0684	P	2.9
7	☐	1000.000	996.539	311770.69	0.1346	P	0.5
8	☐			155.56	0.0001	P	7.2

$$y = 1.3502E-004 * x + 5.8815E-006$$

$$R = 1.0000$$

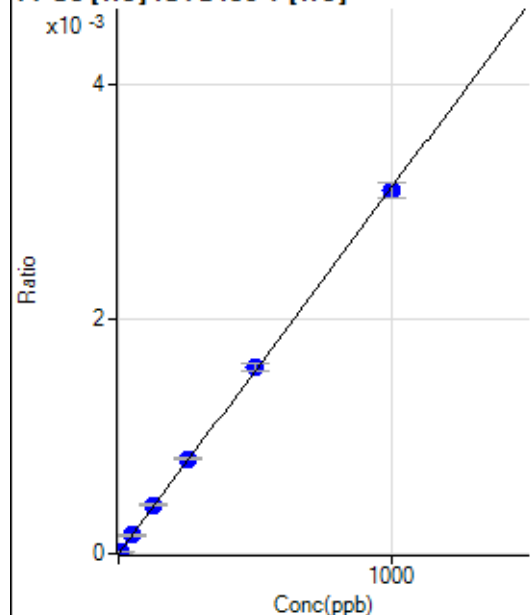
$$DL = 0.03321$$

$$BEC = 0.04356$$

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	☐	5.000	3.590	28.89	0.0000	P	28.6
3	☐	50.000	49.860	365.56	0.0002	P	15.7
4	☐	125.000	133.203	1007.82	0.0004	P	1.4
5	☐	250.000	258.820	1911.26	0.0008	P	2.2
6	☐	500.000	510.788	3659.39	0.0016	P	4.0
7	☐	1000.000	991.390	7166.28	0.0031	P	4.1
8	☐			6.67	0.0000	P	50.1

$$y = 3.1193\text{E-}006 * x + 4.3470\text{E-}007$$

$$R = 0.9998$$

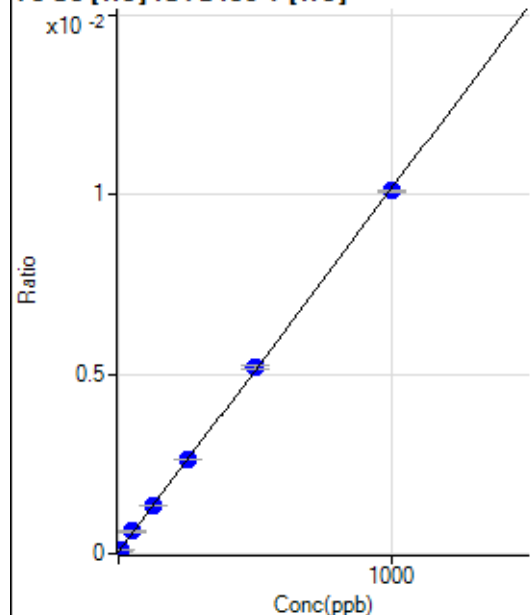
$$DL = 0.7241$$

$$BEC = 0.1394$$

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	138.28	0.0001	P	15.5
2	☐	5.000	5.297	269.14	0.0001	P	17.3
3	☐	50.000	56.423	1461.81	0.0006	P	11.5
4	☐	125.000	125.503	3212.10	0.0013	P	1.1
5	☐	250.000	253.288	6198.27	0.0026	P	1.3
6	☐	500.000	510.506	11996.97	0.0052	P	1.9
7	☐	1000.000	993.540	23437.45	0.0101	P	0.6
8	☐			135.19	0.0001	P	6.3

$$y = 1.0126\text{E-}005 * x + 5.4784\text{E-}005$$

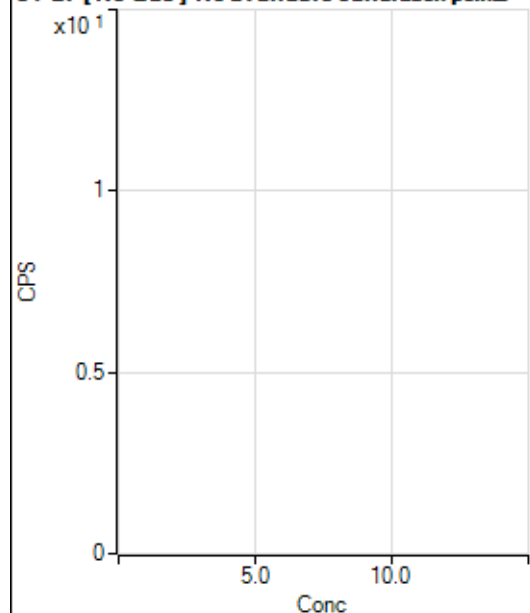
$$R = 0.9999$$

$$DL = 2.514$$

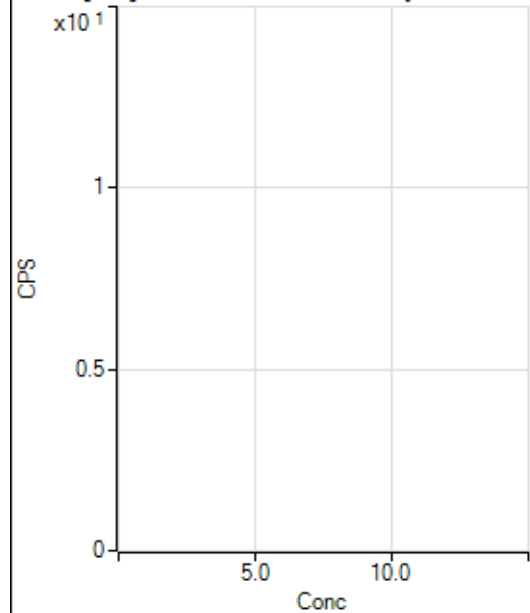
$$BEC = 5.41$$

Weight: <None>

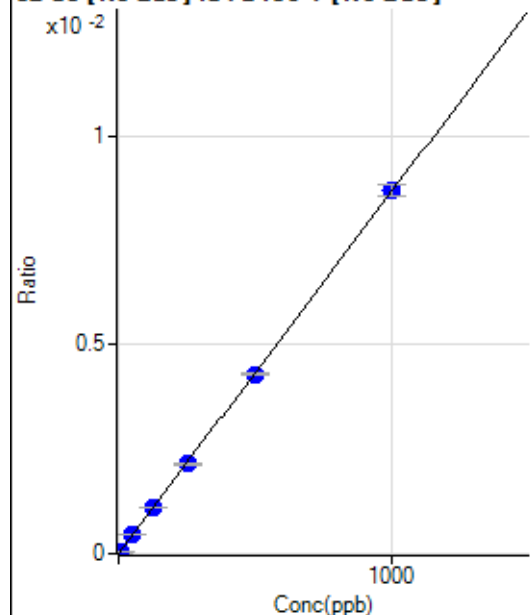
Min Conc: 0

81 Br [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			3044.85		P	3.0
2	☐			3072.64		P	4.9
3	☐			3025.40		P	3.3
4	☐			2886.48		P	5.0
5	☐			2942.05		P	8.0
6	☐			2917.06		P	1.0
7	☐			2714.22		P	4.7
8	☐			2655.87		P	4.2

81 Br [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			90.09		P	19.2
2	☐			50.05		P	34.6
3	☐			40.04		P	90.1
4	☐			43.38		P	70.5
5	☐			56.72		P	20.4
6	☐			83.42		P	42.1
7	☐			60.06		P	101.4
8	☐			86.75		P	75.1

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	-77.76	0.0000	P	-166.
2	☐	5.000	4.499	293.73	0.0000	P	17.3
3	☐	50.000	52.579	4155.65	0.0004	P	3.3
4	☐	125.000	126.751	10092.81	0.0011	P	2.4
5	☐	250.000	246.946	19647.67	0.0021	P	1.7
6	☐	500.000	495.165	39105.06	0.0043	P	1.1
7	☐	1000.000	1002.835	77293.82	0.0087	P	3.1
8	☐			23.37	0.0000	P	347.8

$$y = 8.6843E-006 * x - 8.1596E-006$$

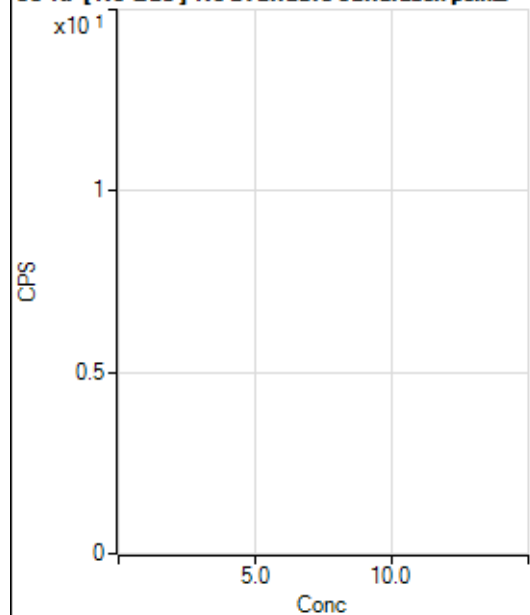
$$R = 1.0000$$

$$DL = 4.692$$

$$BEC = -0.9396$$

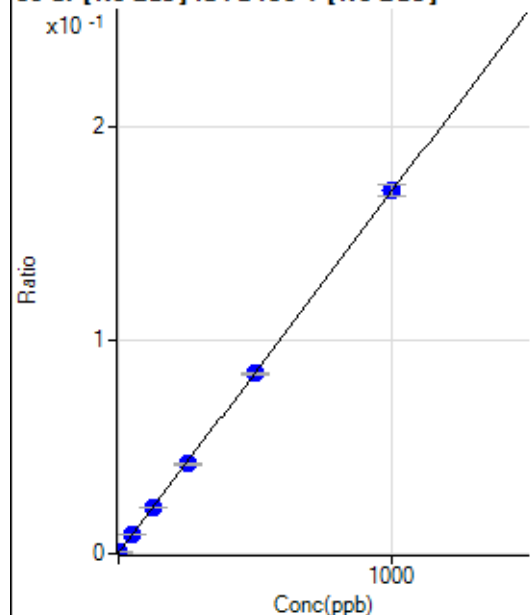
Weight: <None>

Min Conc: 0

83 Kr [No Gas] No available calibration points

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐			1941.26		P	3.0
2	☐			1932.37		P	4.1
3	☐			1839.02		P	3.0
4	☐			1836.80		P	5.6
5	☐			1751.23		P	4.4
6	☐			1666.78		P	2.1
7	☐			1725.68		P	2.6
8	☐			1684.56		P	5.1

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	2783.67	0.0003	P	5.6
2	☐	1.000	1.066	4528.61	0.0005	P	2.2
3	☐	50.000	52.025	84333.21	0.0091	P	1.2
4	☐	125.000	127.401	201875.55	0.0219	P	0.6
5	☐	250.000	246.664	386652.58	0.0420	P	1.4
6	☐	500.000	496.178	767773.85	0.0843	P	1.0
7	☐	1000.000	1002.343	1509620.69	0.1699	P	3.2
8	☐			10259.45	0.0012	P	4.8

$$y = 1.6925\text{E-}004 * x + 2.9567\text{E-}004$$

$$R = 1.0000$$

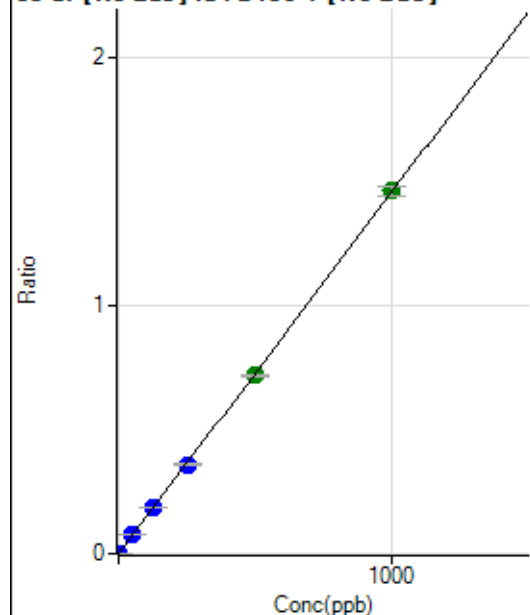
$$DL = 0.2926$$

$$BEC = 1.747$$

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	83.34	0.0000	P	27.4
2	☐	1.000	0.945	13159.13	0.0014	P	3.1
3	☐	50.000	51.762	697984.25	0.0753	P	0.7
4	☐	125.000	126.490	1699873.89	0.1840	P	0.5
5	☐	250.000	245.865	3289956.49	0.3577	P	1.6
6	☐	500.000	492.539	6529140.68	0.7166	A	0.9
7	☐	1000.000	1004.490	12984543.95	1.4615	A	2.8
8	☐			67168.44	0.0077	P	0.4

$$y = 0.0015 * x + 8.8680\text{E-}006$$

$$R = 0.9999$$

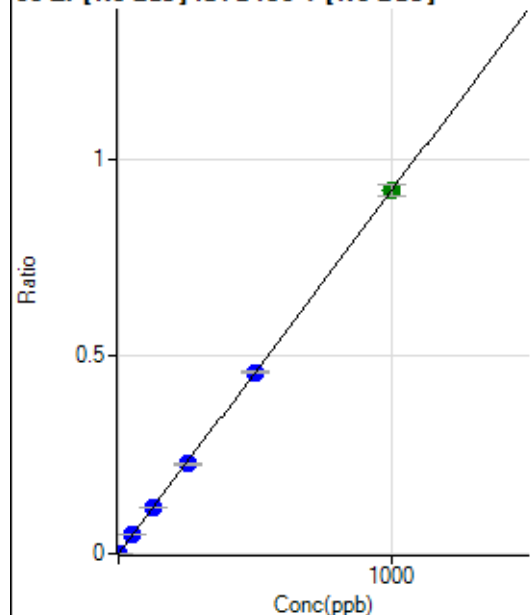
$$DL = 0.005008$$

$$BEC = 0.006095$$

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	388.91	0.0000	P	20.4
2	☐	1.000	0.906	8308.18	0.0009	P	1.4
3	☐	50.000	51.076	434993.21	0.0469	P	0.3
4	☐	125.000	127.173	1078939.63	0.1168	P	0.3
5	☐	250.000	247.872	2093659.34	0.2277	P	1.5
6	☐	500.000	500.758	4189836.60	0.4599	P	0.6
7	☐	1000.000	999.828	8156768.07	0.9182	A	3.1
8	☐			2933.71	0.0003	P	3.4

$$y = 9.1827\text{E-}004 * x + 4.1260\text{E-}005$$

$$R = 1.0000$$

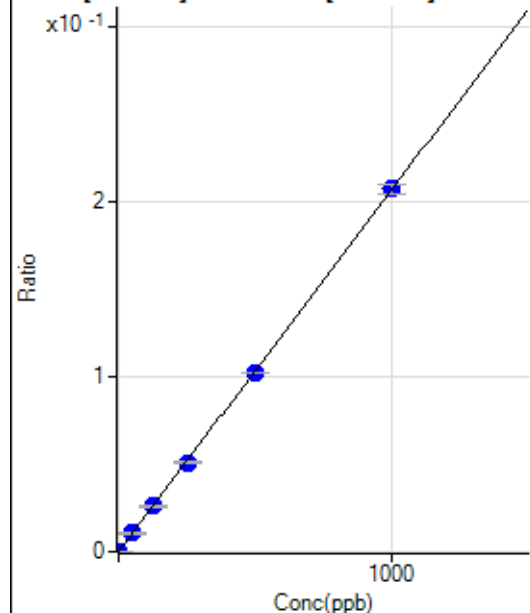
$$DL = 0.02747$$

$$BEC = 0.04493$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	72.23	0.0000	P	17.9
2	☐	1.000	0.872	1789.05	0.0002	P	8.5
3	☐	50.000	50.580	96940.00	0.0105	P	1.0
4	☐	125.000	125.168	238998.01	0.0259	P	0.8
5	☐	250.000	246.882	469304.47	0.0510	P	2.1
6	☐	500.000	494.620	931444.43	0.1022	P	0.7
7	☐	1000.000	1003.419	1842363.99	0.2074	P	2.9
8	☐			666.70	0.0001	P	9.6

$$y = 2.0667\text{E-}004 * x + 7.6709\text{E-}006$$

$$R = 1.0000$$

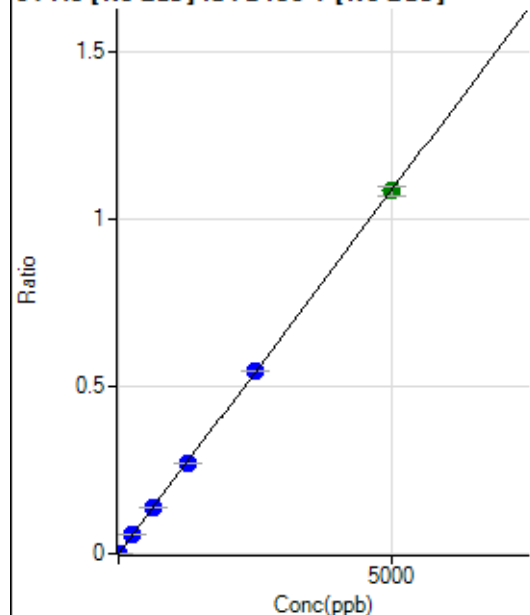
$$DL = 0.01996$$

$$BEC = 0.03712$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	108.34	0.0000	P	56.5
2	☐	5.000	4.767	9937.06	0.0010	P	6.2
3	☐	250.000	259.411	521232.54	0.0562	P	0.2
4	☐	625.000	636.565	1274672.44	0.1380	P	0.2
5	☐	1250.000	1247.852	2488068.13	0.2705	P	0.8
6	☐	2500.000	2511.197	4960091.56	0.5444	P	0.6
7	☐	5000.000	4993.023	9616504.90	1.0824	A	2.6
8	☐			3050.42	0.0004	P	4.6

$$y = 2.1679\text{E-}004 * x + 1.1533\text{E-}005$$

$$R = 1.0000$$

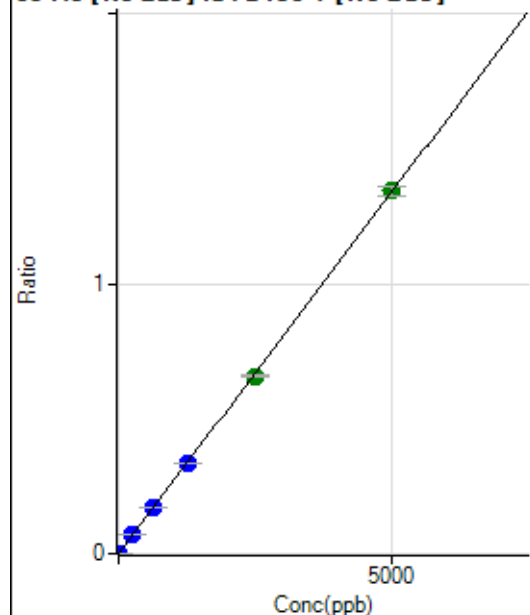
$$DL = 0.09011$$

$$BEC = 0.0532$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	33.34	0.0000	P	85.3
2	☐	5.000	4.818	12302.82	0.0013	P	1.3
3	☐	250.000	261.570	648956.59	0.0700	P	0.2
4	☐	625.000	638.969	1580047.28	0.1711	P	0.6
5	☐	1250.000	1250.180	3078287.11	0.3347	P	0.7
6	☐	2500.000	2457.534	5994643.88	0.6579	A	1.0
7	☐	5000.000	5018.863	11936687.51	1.3437	A	2.9
8	☐			3561.65	0.0004	P	1.1

$$y = 2.6772\text{E-}004 * x + 3.5135\text{E-}006$$

$$R = 0.9999$$

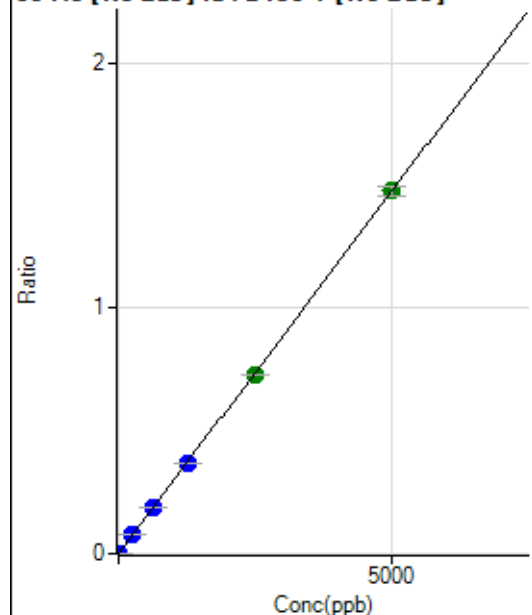
$$DL = 0.03358$$

$$BEC = 0.01312$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	100.00	0.0000	P	51.0
2	☐	5.000	4.773	13501.22	0.0014	P	4.4
3	☐	250.000	261.471	715172.19	0.0772	P	0.5
4	☐	625.000	639.065	1742033.89	0.1886	P	0.3
5	☐	1250.000	1254.802	3405929.52	0.3703	P	0.8
6	☐	2500.000	2473.419	6650598.02	0.7300	A	0.7
7	☐	5000.000	5009.758	13135375.55	1.4785	A	2.5
8	☐			4553.63	0.0005	P	7.9

$$y = 2.9512\text{E-}004 * x + 1.0626\text{E-}005$$

$$R = 1.0000$$

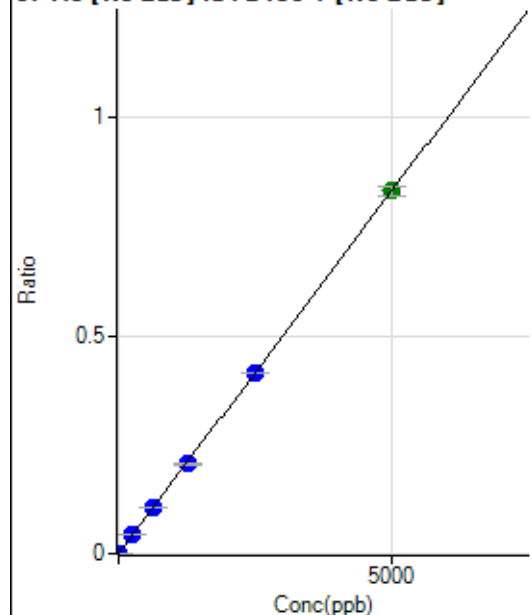
$$DL = 0.05511$$

$$BEC = 0.03601$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	33.33	0.0000	P	99.4
2	☐	5.000	4.848	7705.03	0.0008	P	5.7
3	☐	250.000	259.423	400048.03	0.0432	P	0.9
4	☐	625.000	635.718	977006.73	0.1058	P	0.1
5	☐	1250.000	1243.946	1903623.79	0.2070	P	1.7
6	☐	2500.000	2489.918	3774815.32	0.4143	P	0.5
7	☐	5000.000	5004.744	7398222.22	0.8328	A	2.8
8	☐			2258.57	0.0003	P	7.1

$$y = 1.6640\text{E-}004 * x + 3.5086\text{E-}006$$

$$R = 1.0000$$

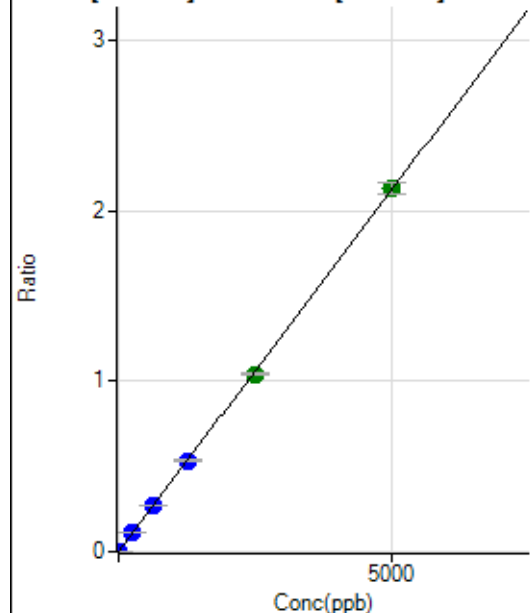
$$DL = 0.06287$$

$$BEC = 0.02109$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	47.22	0.0000	P	26.6
2	☐	5.000	4.799	19435.88	0.0020	P	1.7
3	☐	250.000	262.074	1031539.59	0.1113	P	0.6
4	☐	625.000	641.246	2515472.32	0.2724	P	0.3
5	☐	1250.000	1256.009	4906246.81	0.5335	P	1.5
6	☐	2500.000	2457.509	9510392.49	1.0438	A	0.9
7	☐	5000.000	5017.109	18930300.42	2.1310	A	3.1
8	☐			5751.32	0.0007	P	2.1

$$y = 4.2474\text{E-}004 * x + 5.0085\text{E-}006$$

$$R = 0.9999$$

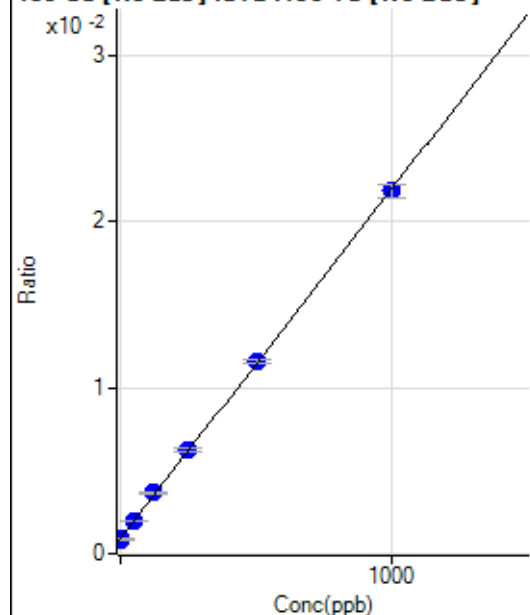
$$DL = 0.009409$$

$$BEC = 0.01179$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	5234.43	0.0009	P	3.6
2	☐	1.000	-1.502	5184.43	0.0009	P	4.2
3	☐	50.000	52.764	11855.25	0.0020	P	2.3
4	☐	125.000	131.885	21881.14	0.0037	P	2.8
5	☐	250.000	253.700	37514.07	0.0062	P	4.1
6	☐	500.000	508.989	70592.36	0.0116	P	1.9
7	☐	1000.000	993.585	132707.35	0.0219	P	3.6
8	☐			4850.94	0.0009	P	2.9

$$y = 2.1110\text{E-}005 * x + 8.8759\text{E-}004$$

$$R = 0.9999$$

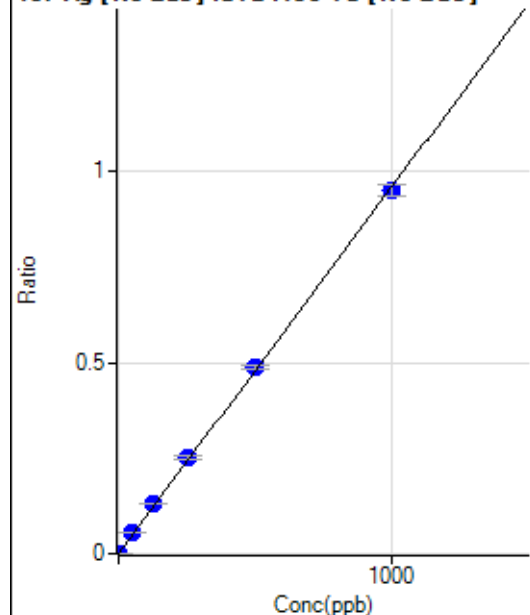
$$DL = 4.594$$

$$BEC = 42.05$$

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	61.11	0.0000	P	32.2
2	☐	1.000	0.952	5584.57	0.0009	P	1.5
3	☐	50.000	56.137	318500.23	0.0538	P	0.3
4	☐	125.000	135.237	771765.02	0.1295	P	1.7
5	☐	250.000	261.912	1507602.10	0.2508	P	2.9
6	☐	500.000	510.509	2967065.84	0.4889	P	1.6
7	☐	1000.000	990.181	5756667.84	0.9483	P	3.3
8	☐			2453.07	0.0004	P	6.3

$$y = 9.5769\text{E-}004 * x + 1.0377\text{E-}005$$

$$R = 0.9998$$

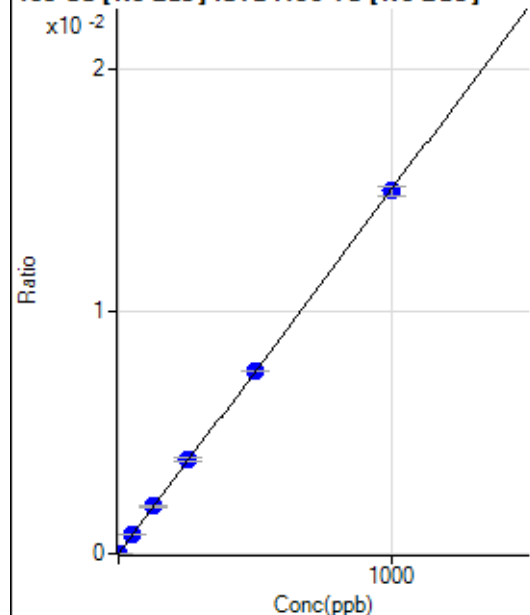
$$DL = 0.01046$$

$$BEC = 0.01084$$

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	43.06	0.0000	P	64.5
2	☐	1.000	1.117	145.84	0.0000	P	13.9
3	☐	50.000	52.765	4731.40	0.0008	P	4.2
4	☐	125.000	131.064	11757.73	0.0020	P	3.5
5	☐	250.000	258.086	23313.73	0.0039	P	3.2
6	☐	500.000	501.591	45719.05	0.0075	P	0.9
7	☐	1000.000	996.286	90787.82	0.0150	P	2.6
8	☐			97.22	0.0000	P	24.2

$$y = 1.5002\text{E-}005 * x + 7.3005\text{E-}006$$

$$R = 1.0000$$

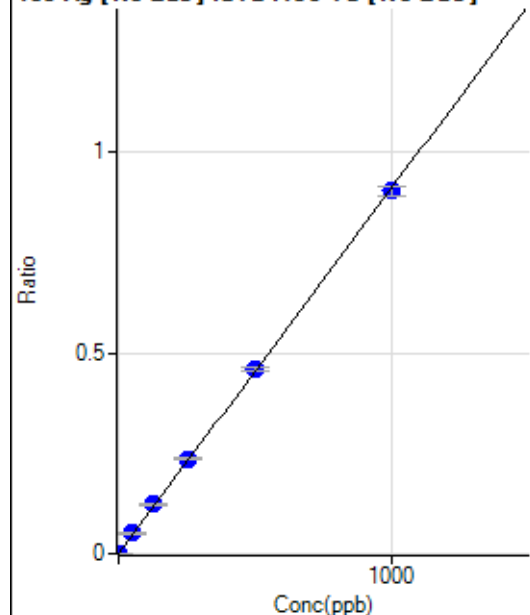
$$DL = 0.9411$$

$$BEC = 0.4866$$

Weight: <None>

Min Conc: 0

109 Ag [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	43.3
2	☐	1.000	1.025	5676.28	0.0009	P	6.8
3	☐	50.000	55.327	298442.90	0.0504	P	0.7
4	☐	125.000	134.970	732409.90	0.1229	P	2.1
5	☐	250.000	259.747	1421671.56	0.2365	P	2.9
6	☐	500.000	506.609	2799821.74	0.4613	P	1.7
7	☐	1000.000	992.746	5488687.66	0.9040	P	2.5
8	☐			2130.78	0.0004	P	2.5

$$y = 9.1065\text{E-}004 * x + 3.7688\text{E-}006$$

$$R = 0.9999$$

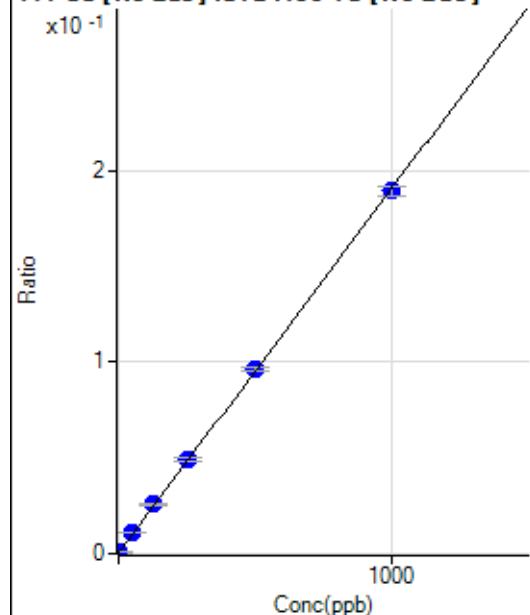
$$DL = 0.005378$$

$$BEC = 0.004139$$

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	2073.35	0.0004	P	2.5
2	☐	1.000	1.097	3391.22	0.0006	P	0.7
3	☐	50.000	54.451	63377.25	0.0107	P	0.8
4	☐	125.000	134.122	153966.74	0.0258	P	2.0
5	☐	250.000	257.362	296010.17	0.0493	P	4.0
6	☐	500.000	504.993	584520.94	0.0963	P	2.0
7	☐	1000.000	994.300	1149343.92	0.1893	P	2.7
8	☐			2308.45	0.0004	P	4.7

$$y = 1.9005\text{E-}004 * x + 3.5158\text{E-}004$$

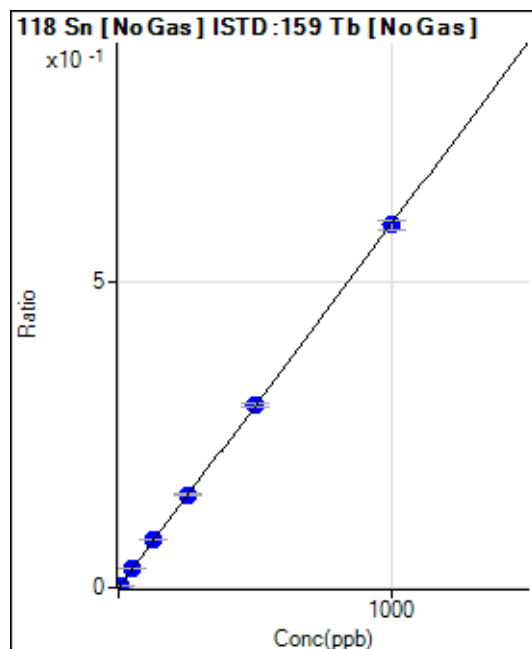
$$R = 0.9999$$

$$DL = 0.1383$$

$$BEC = 1.85$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	350.01	0.0001	P	4.8
2	☐	5.000	4.932	18139.93	0.0030	P	1.1
3	☐	50.000	53.831	190197.84	0.0321	P	0.2
4	☐	125.000	131.668	467519.14	0.0785	P	1.4
5	☐	250.000	255.338	914054.01	0.1521	P	3.3
6	☐	500.000	500.267	1807916.97	0.2979	P	1.9
7	☐	1000.000	997.508	3605993.14	0.5940	P	2.9
8	☐			2314.14	0.0004	P	8.0

$$y = 5.9541\text{E-}004 * x + 5.9363\text{E-}005$$

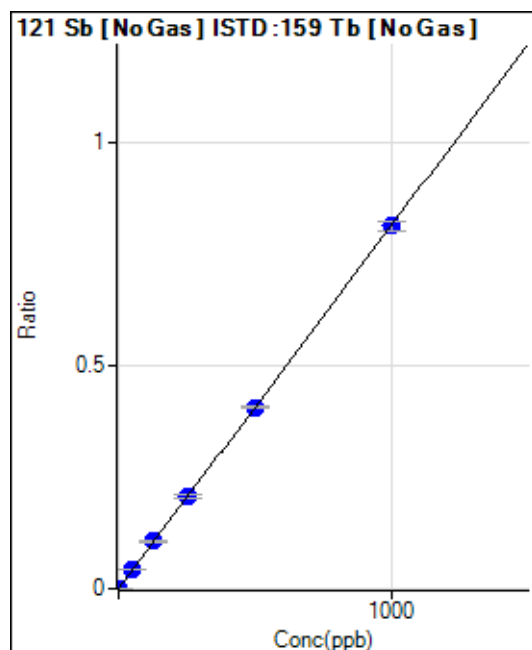
$$R = 1.0000$$

$$DL = 0.01425$$

$$BEC = 0.0997$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	63.89	0.0000	P	15.7
2	☐	2.000	1.847	9189.41	0.0015	P	3.4
3	☐	50.000	53.510	258572.24	0.0437	P	0.9
4	☐	125.000	130.579	634698.98	0.1065	P	1.7
5	☐	250.000	253.644	1243213.13	0.2069	P	3.7
6	☐	500.000	499.751	2473595.26	0.4076	P	1.8
7	☐	1000.000	998.341	4943245.51	0.8143	P	2.9
8	☐			2947.62	0.0005	P	6.8

$$y = 8.1560\text{E-}004 * x + 1.0840\text{E-}005$$

$$R = 1.0000$$

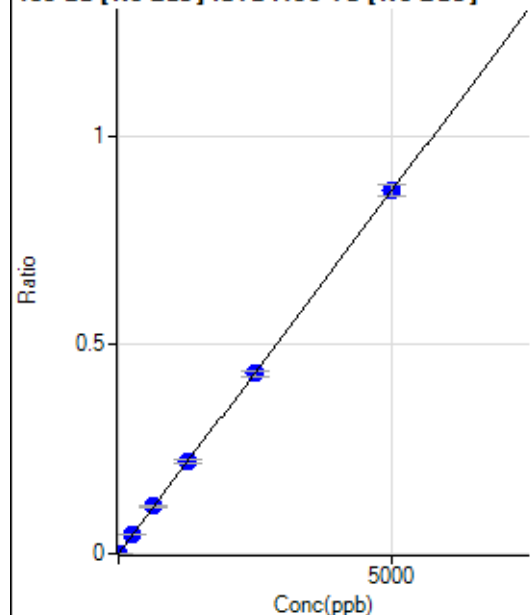
$$DL = 0.00627$$

$$BEC = 0.01329$$

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	116.0
2	☐	10.000	9.854	10379.15	0.0017	P	3.0
3	☐	250.000	266.277	273696.95	0.0462	P	1.5
4	☐	625.000	649.768	671934.82	0.1128	P	1.3
5	☐	1250.000	1264.813	1318896.47	0.2195	P	3.6
6	☐	2500.000	2480.963	2612298.02	0.4305	P	2.3
7	☐	5000.000	5001.906	5269034.45	0.8679	P	3.0
8	☐			1341.77	0.0002	P	2.6

$$y = 1.7352\text{E-}004 * x + 4.2588\text{E-}006$$

$$R = 1.0000$$

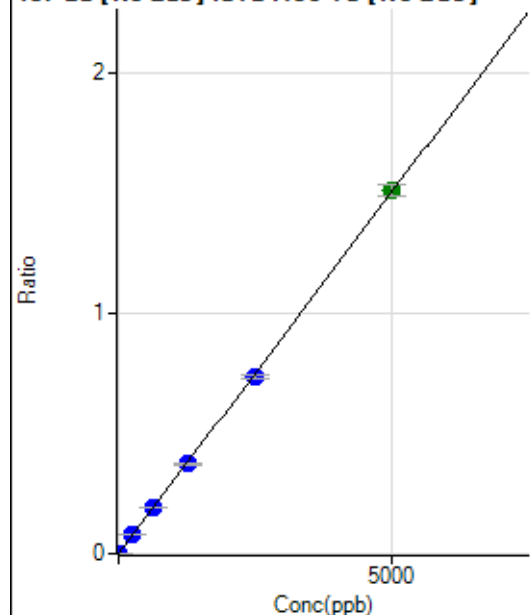
$$DL = 0.08538$$

$$BEC = 0.02454$$

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	47.22	0.0000	P	51.0
2	☐	10.000	9.610	17530.99	0.0029	P	1.4
3	☐	250.000	263.498	468998.81	0.0792	P	0.7
4	☐	625.000	639.250	1144497.05	0.1921	P	1.8
5	☐	1250.000	1242.064	2242690.37	0.3732	P	3.6
6	☐	2500.000	2453.320	4473561.47	0.7371	P	1.7
7	☐	5000.000	5022.869	9161734.67	1.5092	A	3.2
8	☐			2297.47	0.0004	P	1.5

$$y = 3.0046\text{E-}004 * x + 8.0081\text{E-}006$$

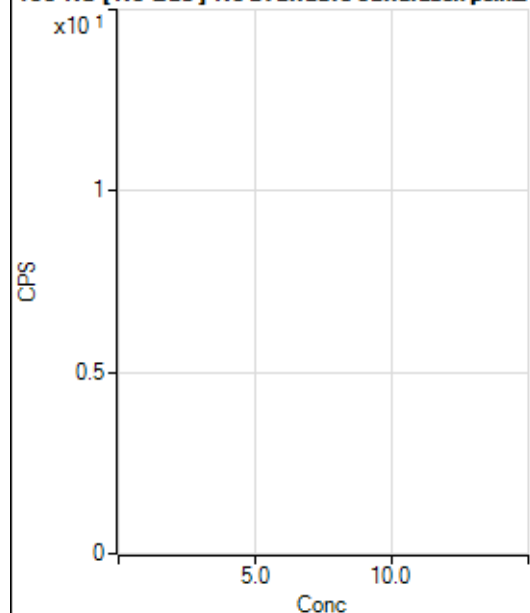
$$R = 0.9999$$

$$DL = 0.04076$$

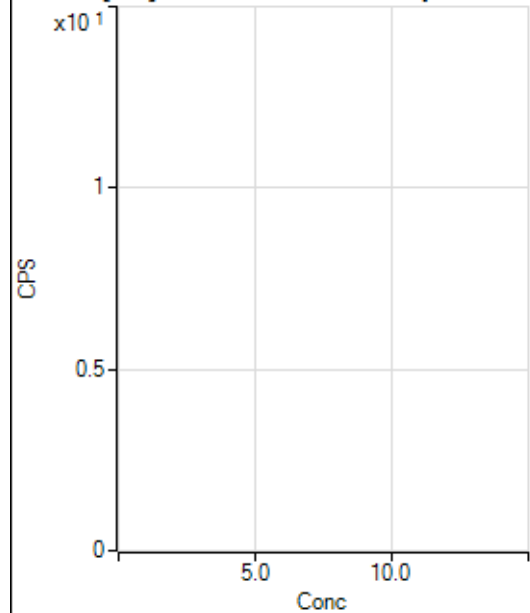
$$BEC = 0.02665$$

Weight: <None>

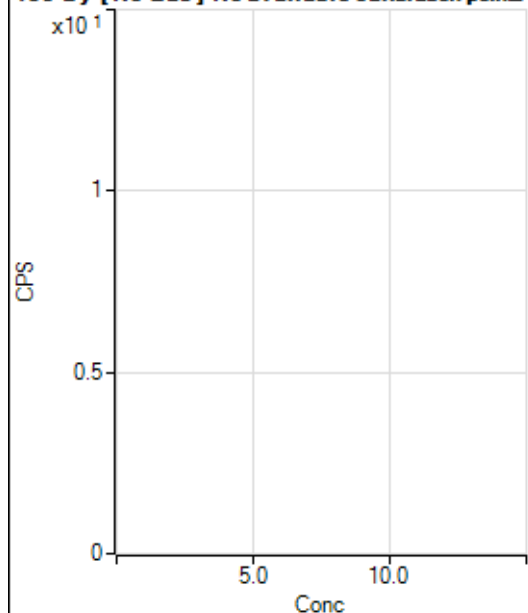
Min Conc: 0

150 Nd [No Gas] No available calibration points

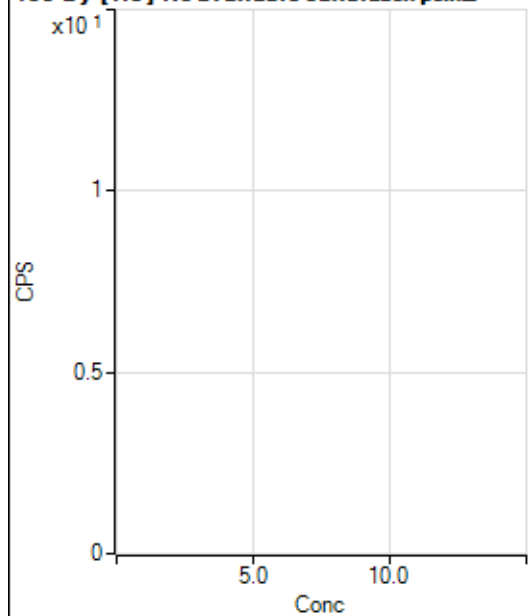
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			8.89		P	114.5
2	☐			4.44		P	173.2
3	☐			20.00		P	33.4
4	☐			44.45		P	45.8
5	☐			68.89		P	45.7
6	☐			126.67		P	21.1
7	☐			280.01		P	28.9
8	☐			17.78		P	57.3

150 Nd [He] No available calibration points

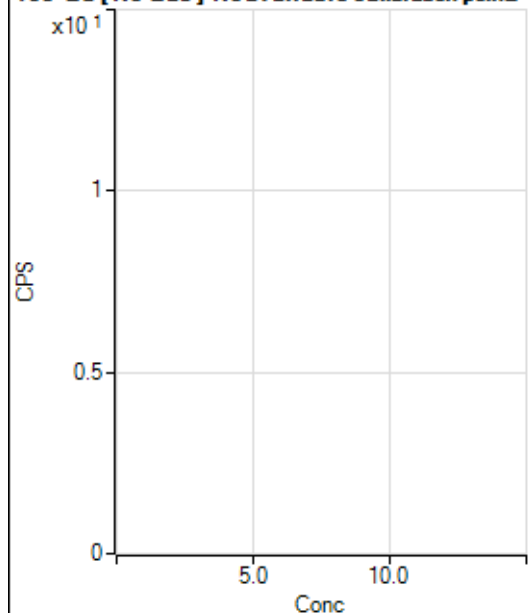
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			1.11		P	173.2
2	☐			1.11		P	173.2
3	☐			5.55		P	124.9
4	☐			5.56		P	91.6
5	☐			16.67		P	52.9
6	☐			28.89		P	63.6
7	☐			46.67		P	18.9
8	☐			5.56		P	91.6

156 Dy [No Gas] No available calibration points

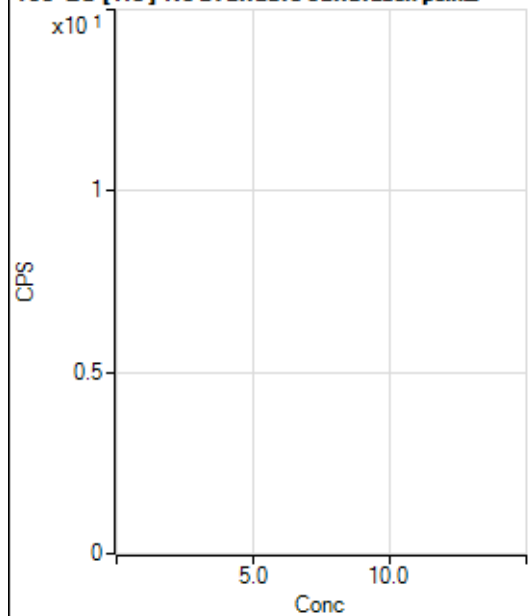
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			13.89		P	91.6
2	☐			11.11		P	173.2
3	☐			8.33		P	173.2
4	☐			25.00		P	0.0
5	☐			36.11		P	48.0
6	☐			75.00		P	40.1
7	☐			166.67		P	30.4
8	☐			1063.96		P	7.1

156 Dy [He] No available calibration points

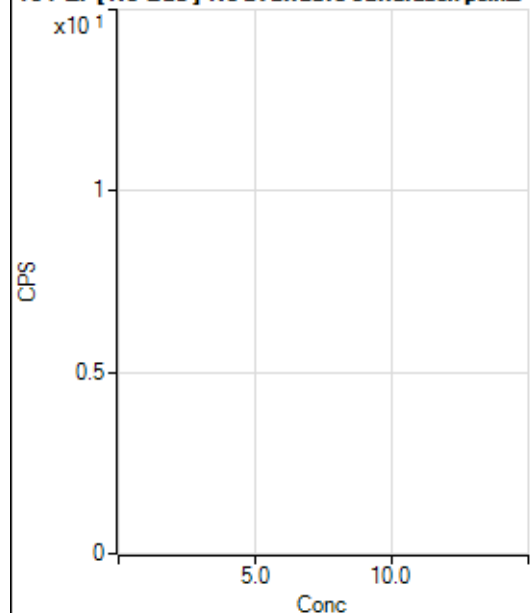
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			6.67		P	100.0
2	☐			3.33		P	100.1
3	☐			11.11		P	121.3
4	☐			14.45		P	48.0
5	☐			28.89		P	24.0
6	☐			54.45		P	24.7
7	☐			101.11		P	19.0
8	☐			823.37		P	6.1

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

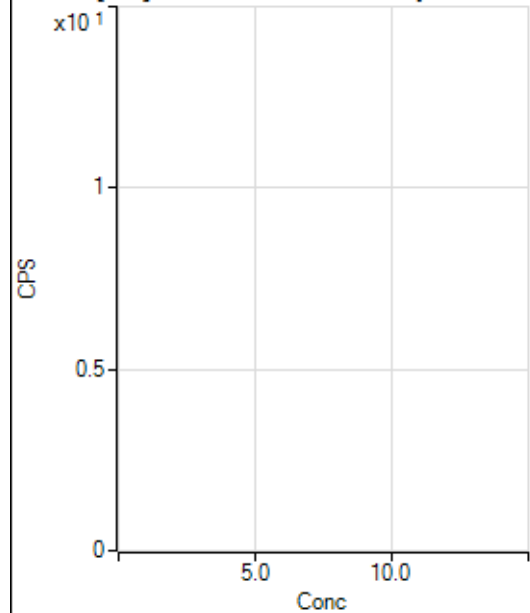
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			50.00		P	60.1
2	☐			61.11		P	20.8
3	☐			69.44		P	48.5
4	☐			108.34		P	33.5
5	☐			69.44		P	70.3
6	☐			111.12		P	26.3
7	☐			116.67		P	31.1
8	☐			1238.99		P	9.8

160 Gd [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			65.56		P	17.9
2	☐			70.00		P	21.8
3	☐			70.00		P	33.3
4	☐			84.44		P	9.1
5	☐			91.11		P	14.8
6	☐			88.89		P	20.7
7	☐			122.23		P	20.5
8	☐			1014.49		P	3.5

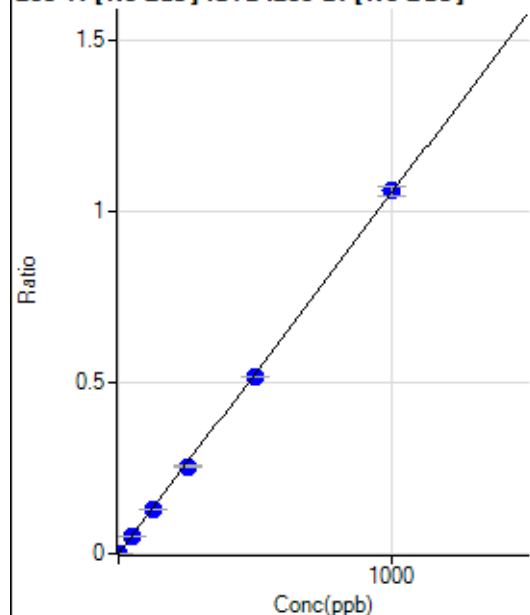
164 Er [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			27.78		P	17.3
2	☐			36.11		P	53.3
3	☐			27.78		P	69.3
4	☐			50.00		P	16.7
5	☐			33.33		P	66.2
6	☐			44.44		P	21.7
7	☐			44.44		P	21.7
8	☐			177.78		P	15.1

164 Er [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			25.55		P	27.1
2	☐			20.00		P	16.7
3	☐			16.67		P	52.9
4	☐			17.78		P	28.6
5	☐			18.89		P	83.4
6	☐			31.11		P	32.7
7	☐			25.55		P	15.1
8	☐			124.45		P	15.2

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	144.45	0.0000	P	10.0
2	☐	1.000	0.898	3614.47	0.0010	P	2.8
3	☐	50.000	50.201	191994.41	0.0528	P	1.0
4	☐	125.000	124.700	476892.82	0.1312	P	0.3
5	☐	250.000	242.530	942216.86	0.2551	P	1.7
6	☐	500.000	491.684	1891072.40	0.5171	P	0.3
7	☐	1000.000	1006.053	3784774.30	1.0580	P	2.5
8	☐			1586.25	0.0005	P	7.4

$$y = 0.0011 * x + 3.9635E-005$$

$$R = 0.9999$$

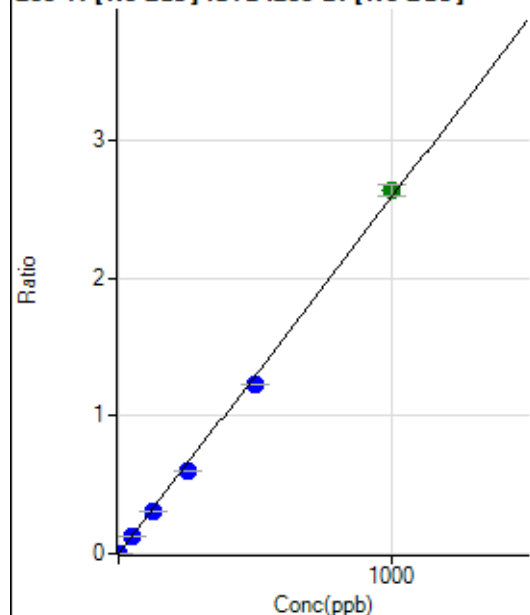
$$DL = 0.0113$$

$$BEC = 0.03769$$

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	291.68	0.0001	P	2.1
2	☐	1.000	0.833	8216.66	0.0022	P	2.9
3	☐	50.000	48.212	454077.97	0.1250	P	0.4
4	☐	125.000	119.658	1127055.73	0.3100	P	0.9
5	☐	250.000	232.771	2227232.02	0.6030	P	1.6
6	☐	500.000	473.777	4487838.51	1.2272	P	0.4
7	☐	1000.000	1018.176	9433153.34	2.6372	A	3.1
8	☐			3486.66	0.0011	P	13.4

$$y = 0.0026 * x + 7.9966E-005$$

$$R = 0.9993$$

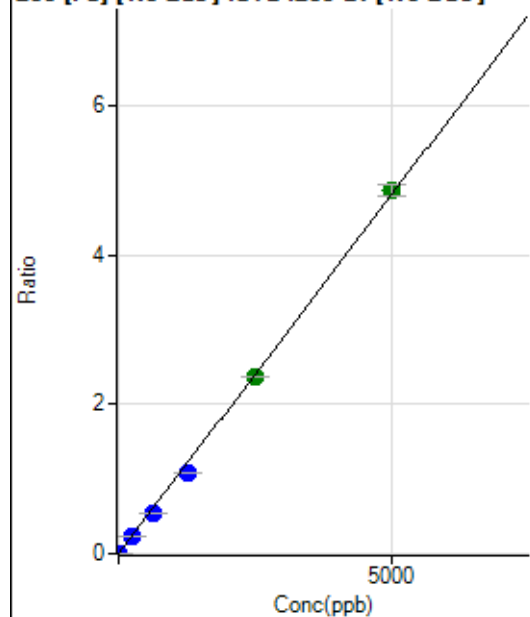
$$DL = 0.001907$$

$$BEC = 0.03087$$

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	246.30	0.0001	P	3.6
2	☐	1.000	0.792	3044.85	0.0008	P	4.4
3	☐	250.000	234.144	818594.34	0.2253	P	0.5
4	☐	625.000	574.718	2009775.65	0.5528	P	0.4
5	☐	1250.000	1121.883	3985692.28	1.0790	P	1.7
6	☐	2500.000	2468.523	8682355.17	2.3742	A	0.4
7	☐	5000.000	5054.846	17389249.00	4.8616	A	3.1
8	☐			17771.32	0.0054	P	1.8

$$y = 9.6175\text{E-}004 * x + 6.7513\text{E-}005$$

$$R = 0.9996$$

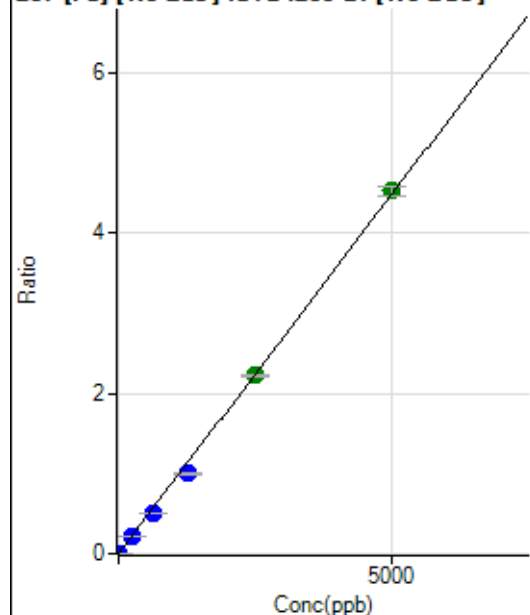
$$DL = 0.007595$$

$$BEC = 0.0702$$

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	233.34	0.0001	P	7.6
2	☐	1.000	0.794	2850.37	0.0008	P	3.9
3	☐	250.000	231.648	755196.88	0.2078	P	1.1
4	☐	625.000	569.050	1855622.48	0.5104	P	0.5
5	☐	1250.000	1113.337	3688361.25	0.9985	P	1.6
6	☐	2500.000	2478.086	8127745.50	2.2225	A	0.4
7	☐	5000.000	5053.034	16210573.05	4.5317	A	2.8
8	☐			16488.21	0.0050	P	1.2

$$y = 8.9682\text{E-}004 * x + 6.3944\text{E-}005$$

$$R = 0.9996$$

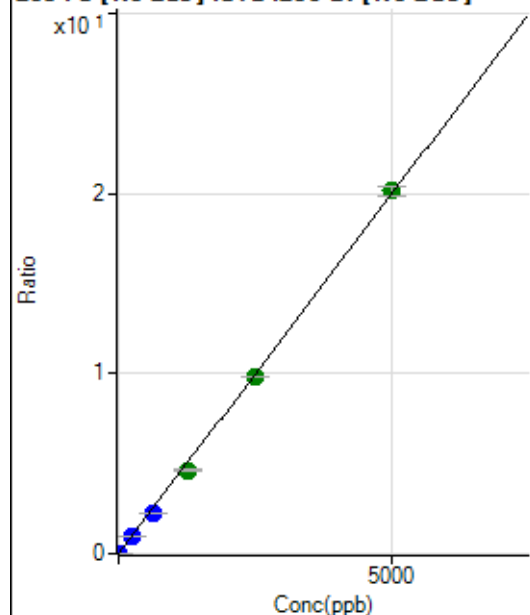
$$DL = 0.01617$$

$$BEC = 0.0713$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	1014.85	0.0003	P	8.4
2	☐	1.000	0.804	12828.62	0.0035	P	1.2
3	☐	250.000	233.283	3389455.29	0.9327	P	0.7
4	☐	625.000	573.016	8327646.87	2.2906	P	0.4
5	☐	1250.000	1162.581	17165425.38	4.6470	A	1.3
6	☐	2500.000	2467.031	36062120.77	9.8609	A	0.4
7	☐	5000.000	5045.673	72140689.58	20.1675	A	2.9
8	☐			72798.66	0.0221	P	0.3

$$y = 0.0040 * x + 2.7839E-004$$

$$R = 0.9998$$

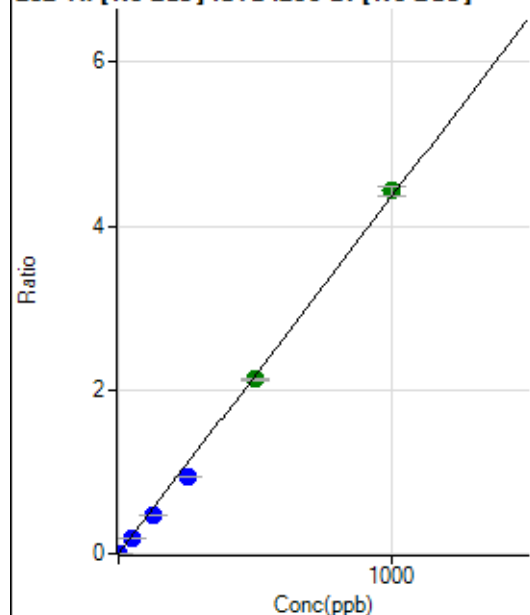
$$DL = 0.01753$$

$$BEC = 0.06965$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	268.53	0.0001	P	12.2
2	☐	1.000	-0.001	257.42	0.0001	P	6.9
3	☐	50.000	43.439	687433.68	0.1892	P	1.2
4	☐	125.000	109.556	1734112.74	0.4770	P	0.9
5	☐	250.000	216.319	3478509.19	0.9417	P	1.5
6	☐	500.000	487.744	7764787.38	2.1233	A	0.4
7	☐	1000.000	1016.808	15833892.14	4.4263	A	2.5
8	☐			3059.66	0.0009	P	8.0

$$y = 0.0044 * x + 7.3604E-005$$

$$R = 0.9993$$

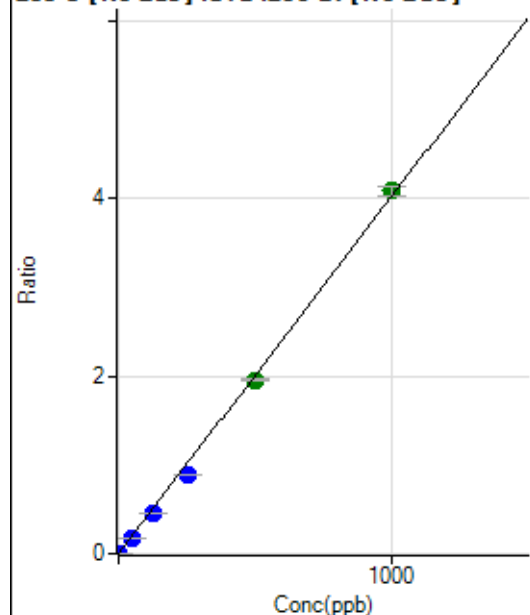
$$DL = 0.006169$$

$$BEC = 0.01691$$

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	8.33	0.0000	P	173.2
2	☐	1.000	0.802	11847.39	0.0032	P	3.4
3	☐	50.000	44.697	652799.05	0.1796	P	1.2
4	☐	125.000	112.243	1639979.23	0.4511	P	1.1
5	☐	250.000	219.958	3265266.48	0.8840	P	1.1
6	☐	500.000	486.430	7148957.89	1.9549	A	0.4
7	☐	1000.000	1016.156	14608612.31	4.0837	A	2.3
8	☐			1986.32	0.0006	P	7.3

$$y = 0.0040 * x + 2.2736E-006$$

$$R = 0.9994$$

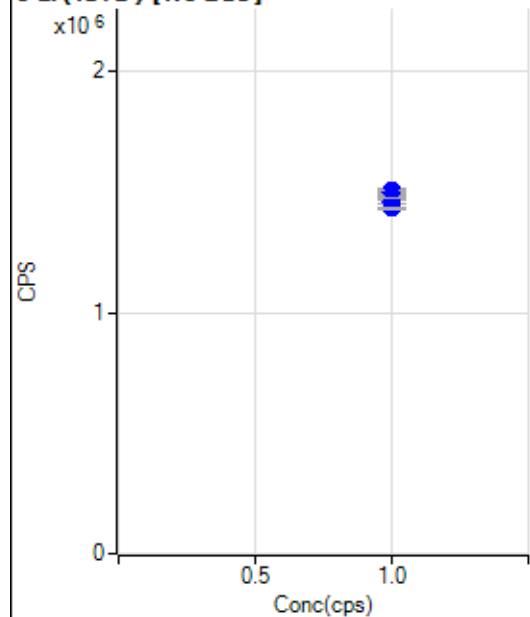
$$DL = 0.00294$$

$$BEC = 0.0005657$$

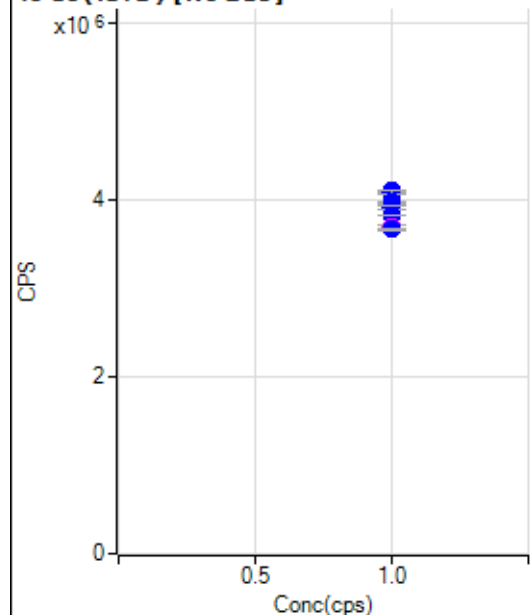
Weight: <None>

Min Conc: 0

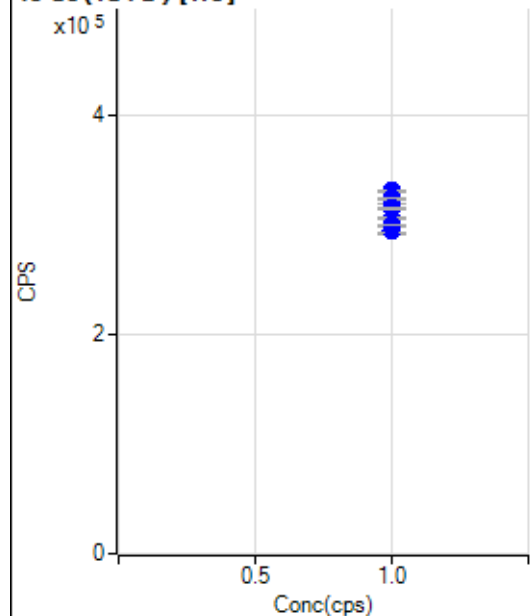
6 Li (ISTD) [No Gas]



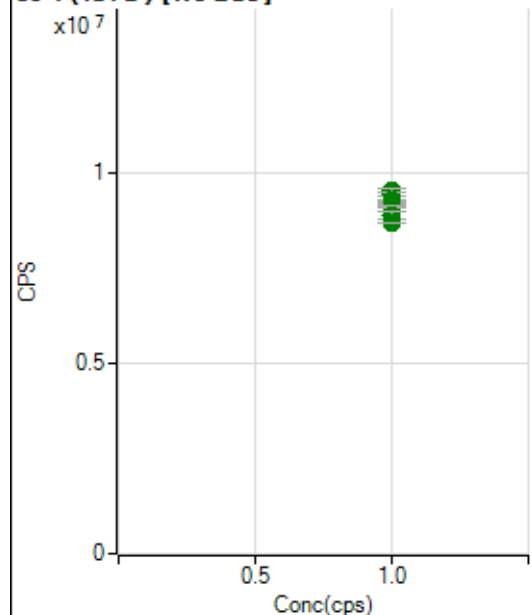
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	1.000		1498556.58		P	0.5
2	☐	1.000		1503901.71		P	1.2
3	☐	1.000		1469735.17		P	0.2
4	☐	1.000		1470779.06		P	0.4
5	☐	1.000		1498802.95		P	0.9
6	☐	1.000		1481339.79		P	0.5
7	☐	1.000		1462629.06		P	1.3
8	☐	1.000		1431941.51		P	0.2

45 Sc (ISTD) [No Gas]

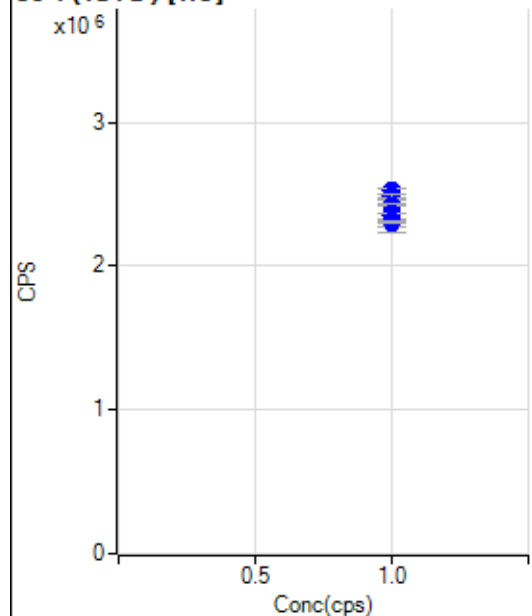
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4098090.63		P	0.4
2	☐	1.000		4084012.02		P	0.9
3	☐	1.000		3980393.72		P	0.1
4	☐	1.000		3938854.87		P	0.9
5	☐	1.000		3907041.44		P	1.0
6	☐	1.000		3817105.33		P	0.1
7	☐	1.000		3685131.64		M	1.4
8	☐	1.000		3662880.22		P	0.6

45 Sc (ISTD) [He]

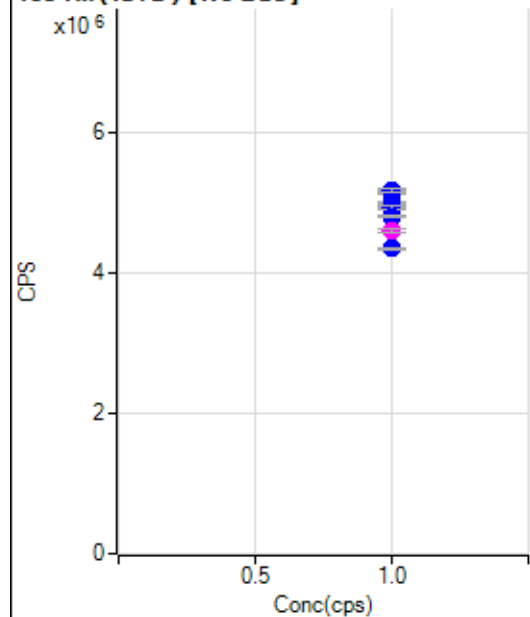
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		331659.52		P	0.8
2	☐	1.000		324432.64		P	0.5
3	☐	1.000		305062.51		P	9.2
4	☐	1.000		315850.33		P	0.4
5	☐	1.000		306466.59		P	0.9
6	☐	1.000		295345.11		P	1.8
7	☐	1.000		298652.69		P	0.4
8	☐	1.000		300310.33		P	0.1

89 Y (ISTD) [No Gas]

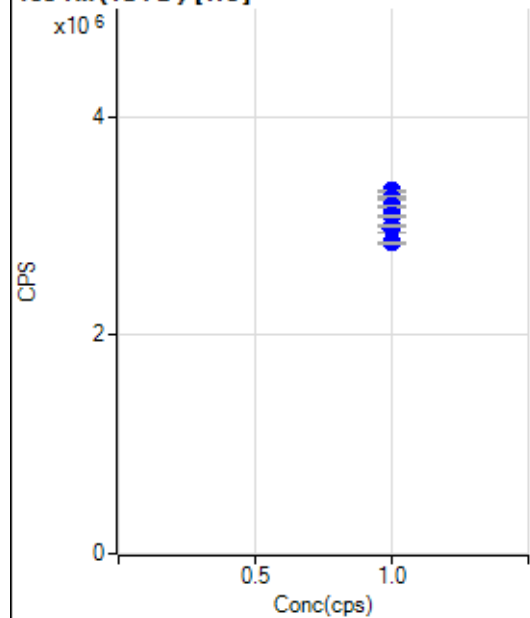
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		9418404.37		A	1.4
2	☐	1.000		9513352.50		A	1.0
3	☐	1.000		9266578.40		A	0.4
4	☐	1.000		9235870.84		A	1.3
5	☐	1.000		9197256.88		A	0.6
6	☐	1.000		9110993.89		A	0.8
7	☐	1.000		8887578.62		A	2.3
8	☐	1.000		8681553.76		A	0.3

89 Y (ISTD) [He]

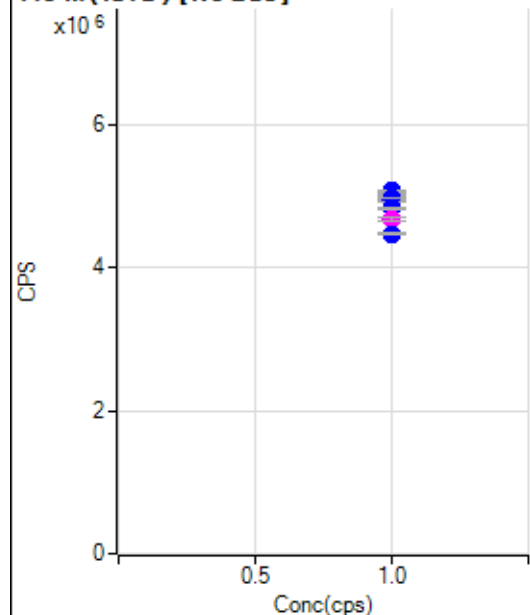
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		2521358.02		P	1.3
2	☐	1.000		2480710.19		P	1.2
3	☐	1.000		2352209.03		P	9.8
4	☐	1.000		2422978.33		P	0.3
5	☐	1.000		2366050.22		P	0.2
6	☐	1.000		2296861.08		P	2.2
7	☐	1.000		2316929.15		P	0.4
8	☐	1.000		2309921.11		P	0.6

103 Rh (ISTD) [No Gas]

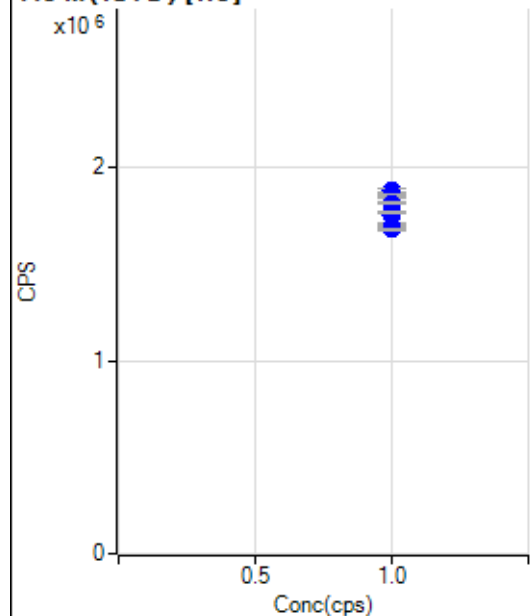
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5156924.47		P	0.8
2	☐	1.000		5178104.05		P	1.0
3	☐	1.000		5022099.96		P	0.4
4	☐	1.000		4976378.57		P	1.1
5	☐	1.000		4933680.52		P	1.2
6	☐	1.000		4811490.17		P	0.8
7	☐	1.000		4605849.38		M	1.5
8	☐	1.000		4356606.92		P	0.8

103 Rh (ISTD) [He]

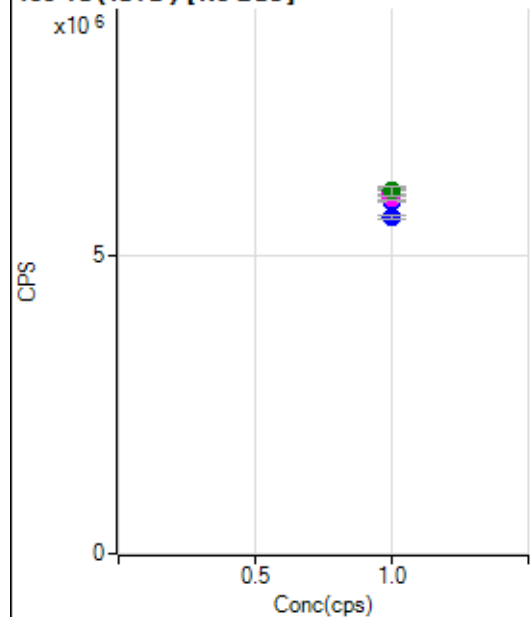
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		3320651.13		P	0.9
2	☐	1.000		3263888.39		P	0.7
3	☐	1.000		3090661.93		P	9.2
4	☐	1.000		3180907.97		P	0.4
5	☐	1.000		3094054.95		P	0.5
6	☐	1.000		2981809.16		P	2.3
7	☐	1.000		2997404.82		P	0.7
8	☐	1.000		2849762.70		P	0.6

115 In (ISTD) [No Gas]

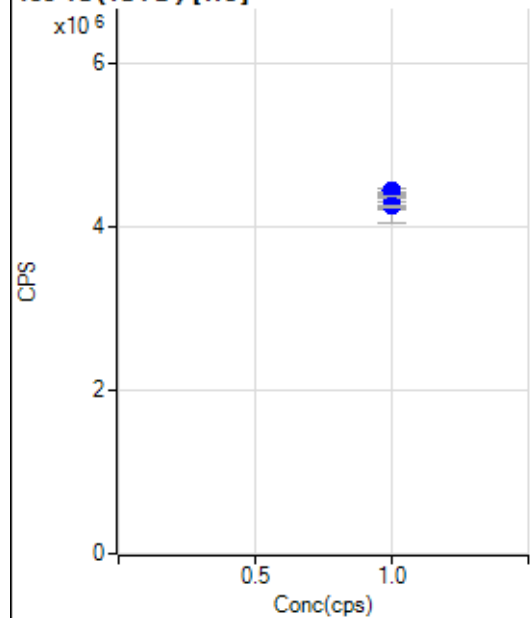
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5046866.25		P	0.8
2	☐	1.000		5065433.54		P	0.8
3	☐	1.000		4972026.60		P	0.9
4	☐	1.000		4952604.02		P	1.2
5	☐	1.000		4931171.42		P	1.1
6	☐	1.000		4820714.21		P	0.7
7	☐	1.000		4673825.80		M	1.4
8	☐	1.000		4468623.21		P	0.8

115 In (ISTD) [He]

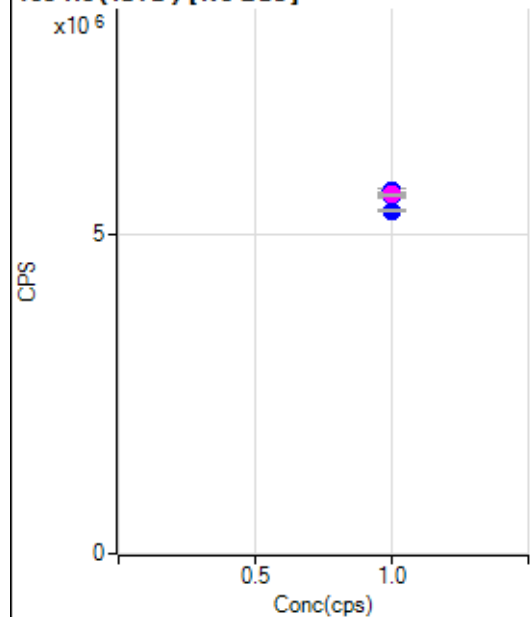
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1880719.16		P	1.0
2	☐	1.000		1859919.46		P	0.6
3	☐	1.000		1755032.74		P	9.6
4	☐	1.000		1816546.73		P	0.4
5	☐	1.000		1765692.00		P	0.7
6	☐	1.000		1696931.76		P	2.3
7	☐	1.000		1699487.28		P	0.6
8	☐	1.000		1680925.78		P	0.8

159 Tb (ISTD) [No Gas]

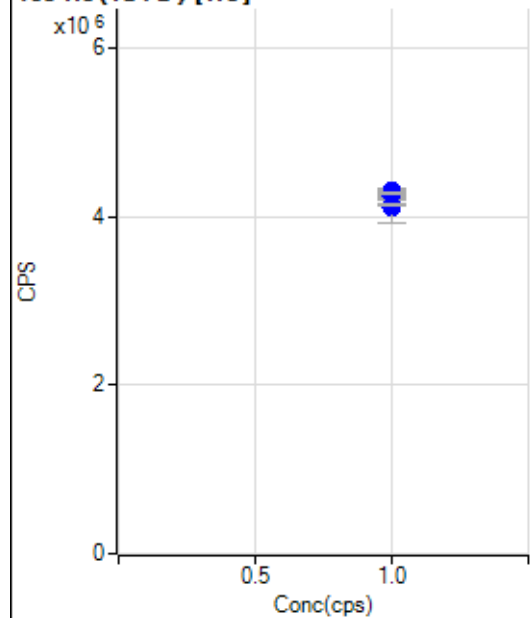
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5897307.41		P	0.7
2	☐	1.000		6055132.62		M	1.3
3	☐	1.000		5923112.13		P	0.5
4	☐	1.000		5959805.33		M	2.0
5	☐	1.000		6013740.60		M	3.1
6	☐	1.000		6070115.75		M	2.4
7	☐	1.000		6073624.84		A	2.4
8	☐	1.000		5636873.74		P	0.9

159 Tb (ISTD) [He]

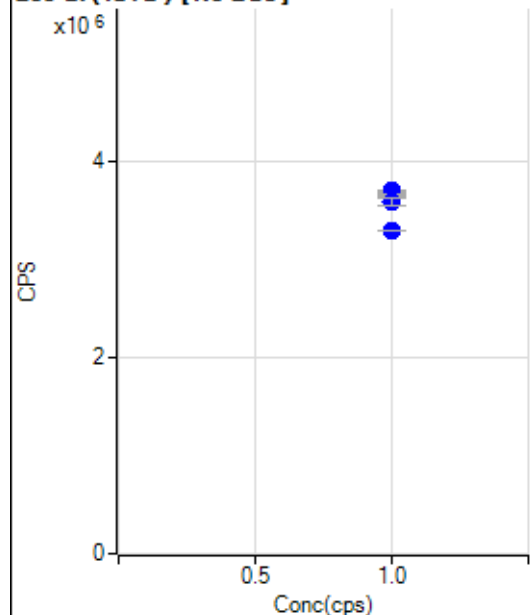
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4439534.28		P	1.2
2	☐	1.000		4415917.85		P	0.6
3	☐	1.000		4248809.14		P	10.0
4	☐	1.000		4422580.53		P	0.1
5	☐	1.000		4358538.82		P	0.6
6	☐	1.000		4258373.69		P	2.1
7	☐	1.000		4370646.67		P	0.4
8	☐	1.000		4248681.92		P	0.8

165 Ho (ISTD) [No Gas]

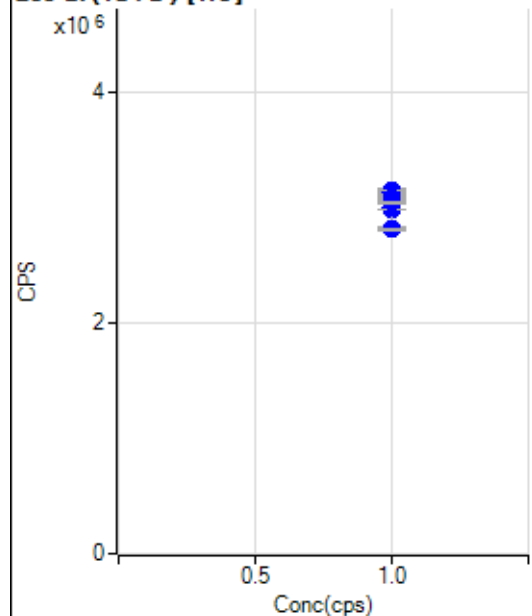
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5574392.14		P	1.1
2	☐	1.000		5628125.68		P	0.8
3	☐	1.000		5617702.35		P	0.4
4	☐	1.000		5605741.06		P	0.7
5	☐	1.000		5667037.28		P	1.0
6	☐	1.000		5634276.17		P	0.9
7	☐	1.000		5603234.08		M	0.3
8	☐	1.000		5361231.34		P	1.1

165 Ho (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4302671.46		P	0.9
2	☐	1.000		4267303.24		P	1.0
3	☐	1.000		4112364.90		P	9.3
4	☐	1.000		4295907.23		P	0.5
5	☐	1.000		4239413.89		P	0.8
6	☐	1.000		4161100.63		P	1.9
7	☐	1.000		4268149.38		P	0.4
8	☐	1.000		4137261.88		P	0.8

209 Bi (ISTD) [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		3647278.00		P	1.3
2	☐	1.000		3674459.39		P	1.0
3	☐	1.000		3634085.33		P	0.5
4	☐	1.000		3635554.74		P	0.6
5	☐	1.000		3694069.39		P	0.8
6	☐	1.000		3657051.58		P	0.6
7	☐	1.000		3578387.52		P	2.1
8	☐	1.000		3289547.28		P	0.4

209 Bi (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		3141773.70		P	1.6
2	☐	1.000		3110033.63		P	1.0
3	☐	1.000		2974486.55		P	9.6
4	☐	1.000		3133733.15		P	0.9
5	☐	1.000		3072964.19		P	0.7
6	☐	1.000		3002974.12		P	2.0
7	☐	1.000		3044618.95		P	0.4
8	☐	1.000		2808819.49		P	0.9

US EPA Tune Check Sample Report

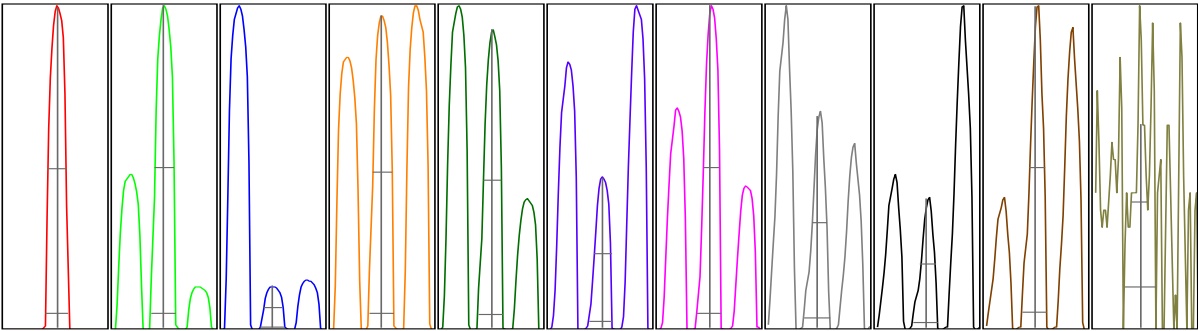
Batch Folder C:\Agilent\ICPMH\1\DATA\P7123120MS.b
Report Comment
Instrument Name G8403A JP14410463

[No Gas]

Mass	Count (Mean)	RSD% (Actual)	RSD% (Required)	RSD% (Flag)
9	3701	1.31	5.00	
24	47223	1.46	5.00	
25	6345	0.82	5.00	
26	7282	1.77	5.00	
59	9238	1.18	5.00	
113	4570	0.86	5.00	
115	14112	4.06	5.00	
206	4802	0.41	5.00	
207	4055	0.75	5.00	
208	10157	0.95	5.00	
220	1	42.43		

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
9	3656	3655	3693	3744	3760
24	46486	46601	47218	48050	47760
25	6290	6301	6341	6412	6383
26	7103	7209	7294	7392	7412
59	9193	9091	9217	9368	9320
113	4610	4522	4543	4609	4567
115	15023	14296	13904	13749	13588
206	4795	4782	4791	4811	4832
207	4047	4015	4043	4092	4078
208	10123	10045	10111	10291	10212
220	1	0	1	1	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	6902	9.10	8.9 - 9.1		0.688	0.900	
24	84457	24.00	23.9 - 24.1		0.731	0.900	
25	11202	25.00	24.9 - 25.1		0.706	0.900	
26	12896	26.00	25.9 - 26.1		0.735	0.900	
59	17313	59.05	58.9 - 59.1		0.728	0.900	
113	9190	113.10	112.9 - 113.1		0.686	0.900	
115	28849	115.05	114.9 - 115.1		0.700	0.900	
206	10647	206.00	205.9 - 206.1		0.759	0.900	
207	9161	207.00	206.9 - 207.1		0.728	0.900	
208	22795	208.00	207.9 - 208.1		0.722	0.900	
220	1	219.90	-		0.916		

X% = 5 Integration Time [sec] = 0.1 Acquisition Time [sec] = 256.8 Y Axis = Linear

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
RF Power	1600	W	Carrier Gas	0.62	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		0.40 L/min

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	11.1	V	Deflect	13.8	V
Extract 2	-180.0	V	Cell Entrance	-30	V	Plate Bias	-35	V
Omega Bias	-90	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	200	V			

[He]

Mass	Count (Mean)	RSD% (Actual)	RSD% (Required)
59	3312	0.42	
89	168780	0.60	
205	5789	0.82	

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
59	3332	3299	3319	3309	3299
89	168465	168653	170310	168955	167519
205	5767	5767	5854	5823	5737

Integration Time [sec] = 0.1

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
RF Power	1600	W	Carrier Gas	0.62	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		0.40 L/min

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	12.3	V	Deflect	2.4	V
Extract 2	-200.0	V	Cell Entrance	-40	V	Plate Bias	-60	V
Omega Bias	-95	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	3.9	mL/min	OctP RF	200	V			