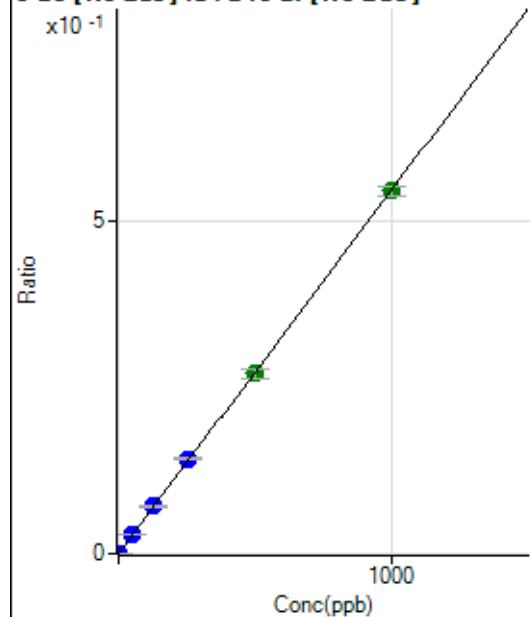


Calibration for 005CALS.d

Batch Folder: D:\Agilent\ICPMH\1\DATA\P7082423 MS.b\
 Analysis File: P7082423 MS.batch.bin
 DA Date-Time: 2023-08-25 00:55:02
 Calibration Title:
 Calibration Method: External Calibration
 VIS Interpolation Fit:

Level	Standard Data File	Sample Name	Acq. Date-Time
1	004CALB.d	S00	2023-08-24 12:44:37
2	005CALS.d	S01	2023-08-24 12:47:51
3	007CALS.d	S02	2023-08-24 12:54:22
4	008CALS.d	S03	2023-08-24 12:57:40
5	009CALS.d	S04	2023-08-24 13:00:37
6	010CALS.d	S05	2023-08-24 13:03:29
7	011CALS.d	S06	2023-08-24 13:06:13
8	012CALS.d	S07	2023-08-24 13:09:01
9	013CALS.d	S08	2023-08-24 13:11:46

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	157.78	0.0000	P	24.5
2	☐	0.100	0.124	461.12	0.0001	P	3.8
3	☐	1.000	1.089	3080.33	0.0006	P	3.1
4	☐	50.000	52.789	141429.71	0.0288	P	2.5
5	☐	125.000	131.511	346629.78	0.0717	P	4.6
6	☐	250.000	260.856	685344.81	0.1422	P	1.4
7	☐	500.000	496.270	1296852.72	0.2704	A	5.7
8	☐	1000.000	998.197	2541038.14	0.5439	A	2.7
9	☐			873.37	0.0002	P	27.9

$$y = 5.4485E-004 * x + 3.2204E-005$$

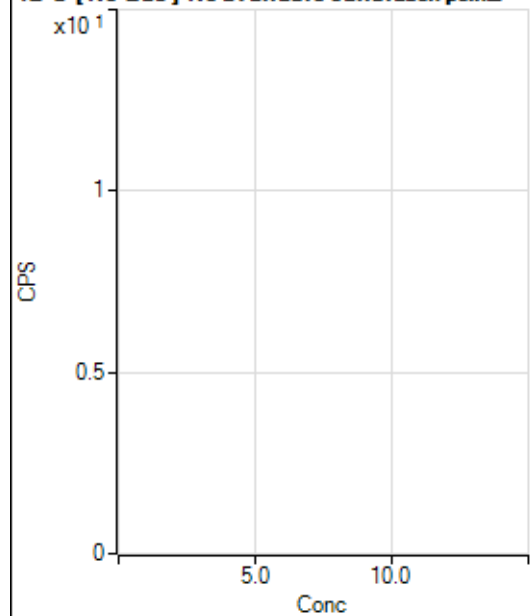
$$R = 0.9999$$

$$DL = 0.04346$$

$$BEC = 0.05911$$

Weight: <None>

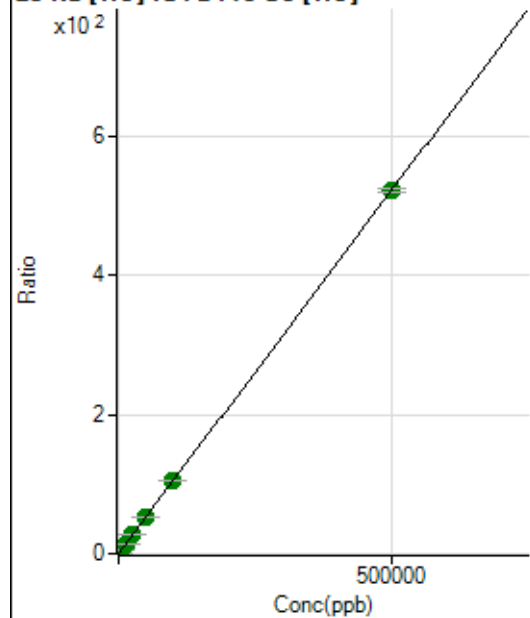
Min Conc: 0

12 C [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐						
2	☐						
3	☐						
4	☐						
5	☐						
6	☐						
7	☐						
8	☐						
9	☐						

12 C [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐						
2	☐						
3	☐						
4	☐						
5	☐						
6	☐						
7	☐						
8	☐						
9	☐						

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	27184.05	0.0317	P	0.6
2	☐	50.000	45.864	68532.59	0.0796	P	0.9
3	☐	500.000	499.441	477459.23	0.5538	P	0.5
4	☐	5000.000	5117.614	4559690.11	5.3817	A	0.7
5	☐	12500.000	13625.339	11520631.36	14.2757	A	6.4
6	☐	25000.000	25822.709	22310388.28	27.0269	A	0.7
7	☐	50000.000	51471.706	43886999.90	53.8406	A	0.2
8	☐	100000.00	101345.25	87739986.47	105.9788	A	0.7
9	☐	500000.00	499513.33	414930060.4	522.2271	A	0.9

$$y = 0.0010 * x + 0.0317$$

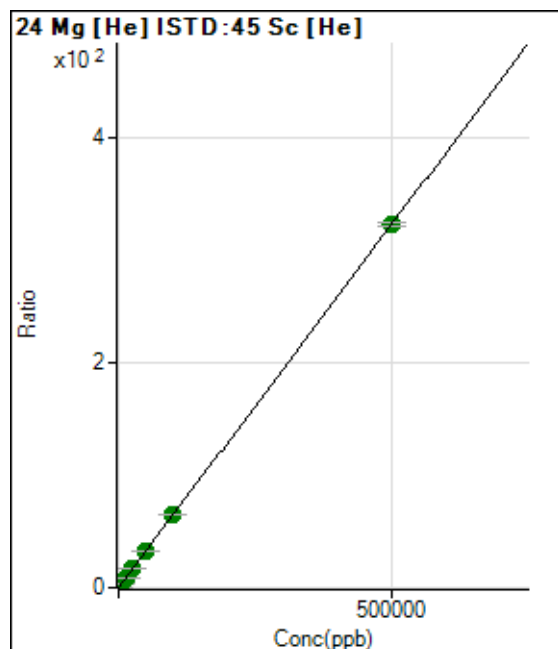
$$R = 1.0000$$

$$DL = 0.5813$$

$$BEC = 30.28$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	682.24	0.0008	P	7.9
2	☐	50.000	46.835	26716.57	0.0310	P	0.6
3	☐	500.000	499.134	278528.04	0.3230	P	0.5
4	☐	5000.000	5169.707	2828562.08	3.3385	A	0.1
5	☐	12500.000	13612.366	7095433.57	8.7893	A	5.5
6	☐	25000.000	25736.646	13717380.63	16.6171	A	0.6
7	☐	50000.000	51347.493	27022460.99	33.1521	A	1.0
8	☐	100000.00	100835.27	53898456.97	65.1028	A	0.6
9	☐	500000.00	499631.85	256300238.4	322.5769	A	1.0

$$y = 6.4563\text{E-}004 * x + 7.9455\text{E-}004$$

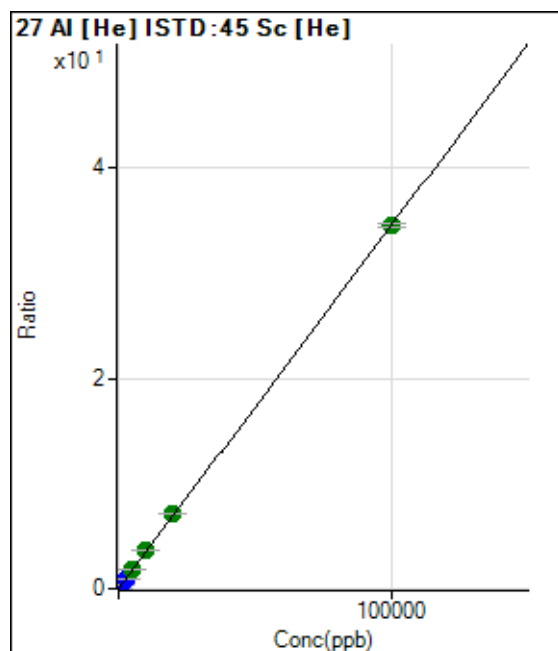
$$R = 1.0000$$

$$DL = 0.2926$$

$$BEC = 1.231$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	346.67	0.0004	P	7.0
2	☐	2.000	2.071	964.49	0.0011	P	12.6
3	☐	20.000	21.393	6728.21	0.0078	P	6.4
4	☐	1000.000	1064.980	312373.51	0.3687	P	1.4
5	☐	2500.000	2812.817	785635.08	0.9732	P	5.6
6	☐	5000.000	5227.462	1492758.66	1.8084	A	1.7
7	☐	10000.000	10477.699	2954148.15	3.6242	A	0.7
8	☐	20000.000	20600.835	5899117.76	7.1254	A	0.7
9	☐	100000.00	99812.219	27428662.37	34.5214	A	1.1

$$y = 3.4586\text{E-}004 * x + 4.0380\text{E-}004$$

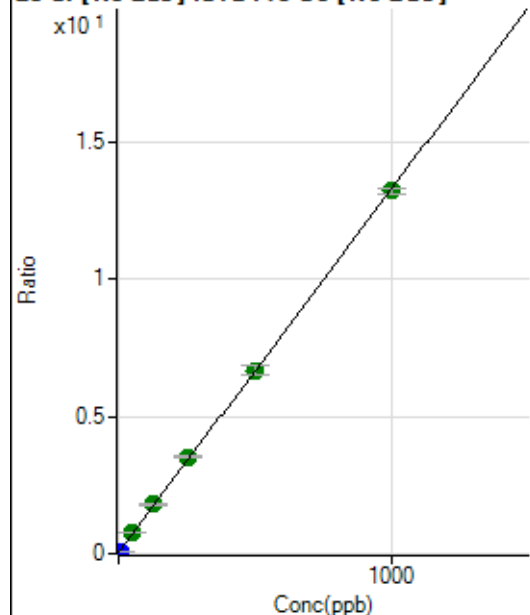
$$R = 1.0000$$

$$DL = 0.2469$$

$$BEC = 1.168$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	518749.00	0.0480	P	0.7
2	☐	1.000	0.210	529824.07	0.0508	P	9.3
3	☐	10.000	0.483	591145.48	0.0544	P	1.1
4	☐	50.000	54.505	8344383.14	0.7702	A	1.6
5	☐	125.000	131.959	19622979.43	1.7965	A	2.9
6	☐	250.000	263.349	37772667.21	3.5374	A	1.4
7	☐	500.000	501.487	70902810.61	6.6927	A	5.4
8	☐	1000.000	994.920	138029754.6	13.2306	A	1.7
9	☐			1990116.18	0.1983	A	6.9

$$y = 0.0132 * x + 0.0480$$

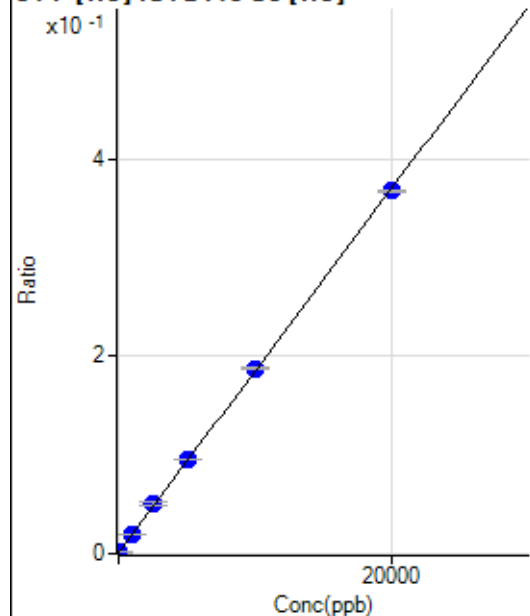
$$R = 0.9998$$

$$DL = 0.077$$

$$BEC = 3.626$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	-7.982	632.24	0.0007	P	10.2
2	☐	0.000	-7.303	644.47	0.0007	P	5.5
3	☐	0.000	15.285	1004.49	0.0012	P	10.9
4	☐	1000.000	1026.585	16792.67	0.0198	P	6.0
5	☐	2500.000	2700.543	40930.18	0.0507	P	6.5
6	☐	5000.000	5143.396	79081.67	0.0958	P	1.2
7	☐	10000.000	10122.322	152984.12	0.1877	P	1.1
8	☐	20000.000	19876.593	304411.34	0.3677	P	0.6
9	☐			733.36	0.0009	P	15.4

$$y = 1.8454E-005 * x + 8.8339E-004$$

$$R = 0.9999$$

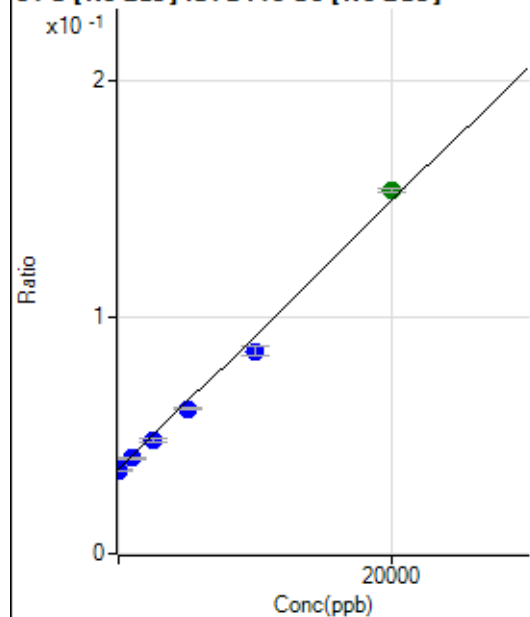
$$DL = 13.21$$

$$BEC = 47.87$$

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	-42.110	381850.19	0.0354	P	1.3
2	☐	0.000	108.198	377789.83	0.0362	P	7.9
3	☐	0.000	-66.087	382569.83	0.0352	P	0.3
4	☐	1000.000	836.589	437211.24	0.0404	P	0.9
5	☐	2500.000	2181.480	524232.13	0.0480	P	2.5
6	☐	5000.000	4528.979	654742.32	0.0613	P	1.2
7	☐	10000.000	8836.442	908875.83	0.0858	P	4.3
8	☐	20000.000	20747.520	1600226.87	0.1534	A	1.2
9	☐			328718.48	0.0328	P	1.0

$$y = 5.6765E-006 * x + 0.0356$$

$$R = 0.9973$$

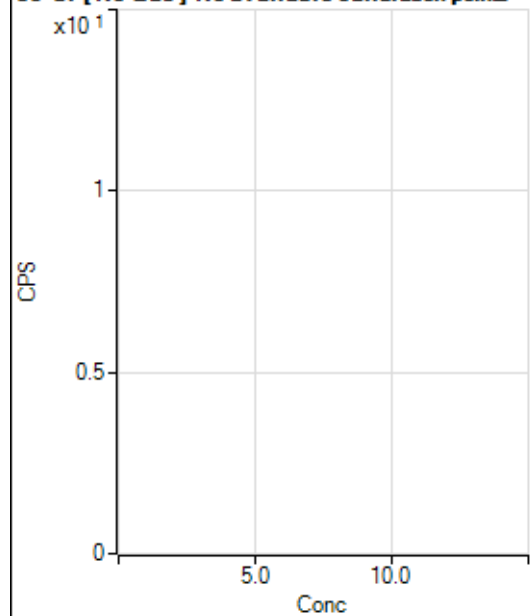
$$DL = 601.5$$

$$BEC = 6273$$

Weight: <None>

Min Conc: 0

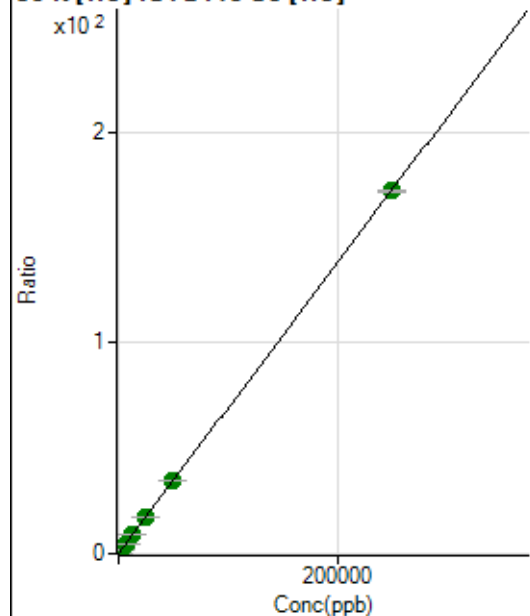
35 Cl [No Gas] No available calibration points



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐						
2	☐						
3	☐						
4	☐						
5	☐						
6	☐						
7	☐						
8	☐						
9	☐						

35 Cl [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐						
2	☐						
3	☐						
4	☐						
5	☐						
6	☐						
7	☐						
8	☐						
9	☐						

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	88072.73	0.1026	P	0.9
2	☐	50.000	45.806	115467.08	0.1341	P	0.6
3	☐	500.000	508.554	390448.71	0.4529	P	0.5
4	☐	2500.000	2582.765	1594012.44	1.8815	A	1.2
5	☐	6250.000	6734.640	3825823.55	4.7413	A	6.7
6	☐	12500.000	12833.334	7381446.14	8.9420	A	1.0
7	☐	25000.000	25443.074	14368222.01	17.6274	A	1.0
8	☐	50000.000	50457.099	28858259.29	34.8568	A	0.6
9	☐	250000.00	249834.64	136806473.5	172.1854	A	0.3

$$y = 6.8879E-004 * x + 0.1026$$

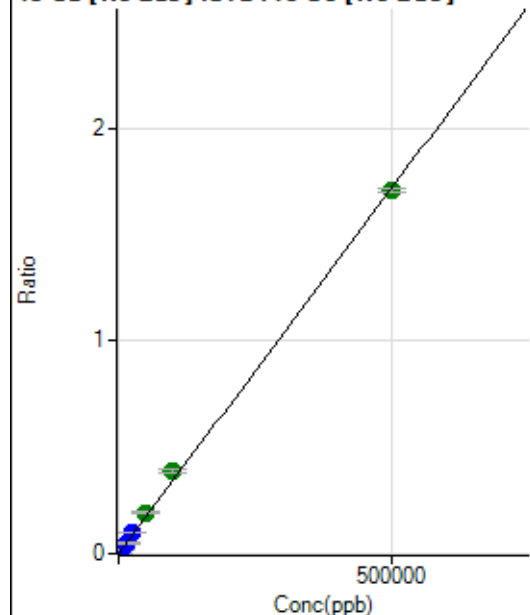
$$R = 1.0000$$

$$DL = 4.048$$

$$BEC = 148.9$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1924.59	0.0002	P	6.2
2	☐	50.000	49.043	3612.69	0.0003	P	10.5
3	☐	500.000	491.663	20283.63	0.0019	P	1.4
4	☐	5000.000	5757.816	216281.96	0.0200	P	2.6
5	☐	12500.000	14199.194	534889.29	0.0490	P	3.5
6	☐	25000.000	28513.496	1048183.27	0.0982	P	1.8
7	☐	50000.000	55688.000	2029360.86	0.1915	A	5.3
8	☐	100000.00	112430.69	4032286.54	0.3865	A	3.7
9	☐	500000.00	496719.33	17115792.66	1.7071	A	1.0

$$y = 3.4365E-006 * x + 1.7829E-004$$

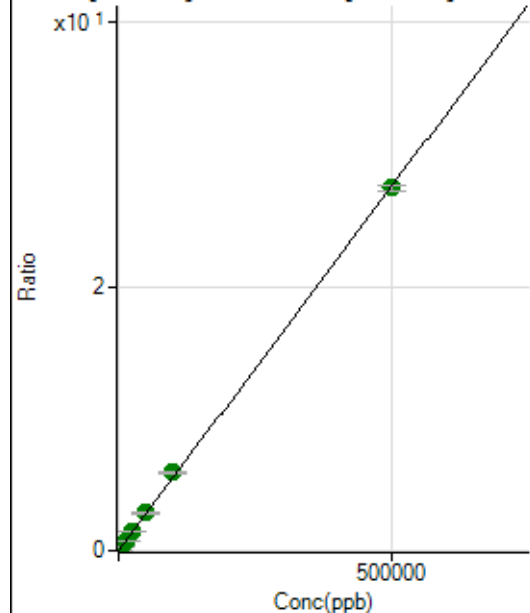
$$R = 0.9996$$

$$DL = 9.689$$

$$BEC = 51.88$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	15262.24	0.0014	P	2.3
2	☐	50.000	48.749	42703.29	0.0041	P	10.8
3	☐	500.000	492.580	310198.84	0.0286	P	1.3
4	☐	5000.000	5438.201	3263154.53	0.3012	A	1.4
5	☐	12500.000	13430.279	8101805.71	0.7418	A	3.3
6	☐	25000.000	26970.239	15890346.98	1.4882	A	2.0
7	☐	50000.000	52537.668	30699532.60	2.8976	A	5.1
8	☐	100000.00	107110.98	61612912.41	5.9059	A	2.1
9	☐	500000.00	498197.89	275332171.4	27.4648	A	1.5

$$y = 5.5125E-005 * x + 0.0014$$

$$R = 0.9999$$

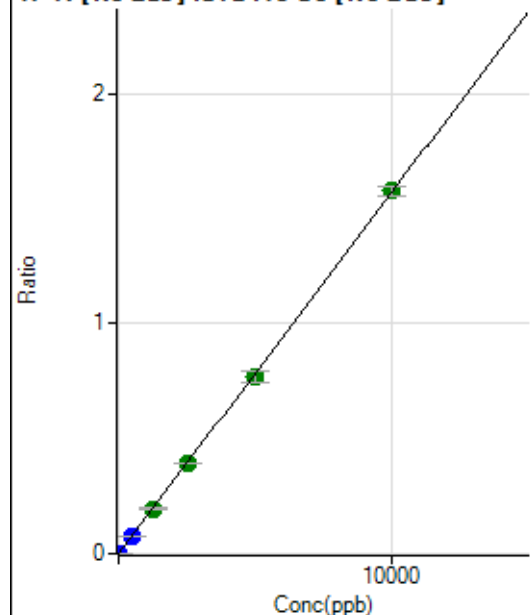
$$DL = 1.759$$

$$BEC = 25.64$$

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	201.11	0.0000	P	6.0
2	☐	0.500	0.477	972.26	0.0001	P	12.5
3	☐	5.000	4.926	8589.19	0.0008	P	1.4
4	☐	500.000	493.236	838062.37	0.0774	P	1.9
5	☐	1250.000	1241.981	2126906.45	0.1948	A	4.5
6	☐	2500.000	2510.603	4203933.62	0.3937	A	1.0
7	☐	5000.000	4896.206	8132729.33	0.7677	A	5.8
8	☐	10000.000	10050.587	16440438.37	1.5759	A	2.3
9	☐			3372.71	0.0003	P	45.6

$$y = 1.5680\text{E-}004 * x + 1.8624\text{E-}005$$

$$R = 0.9999$$

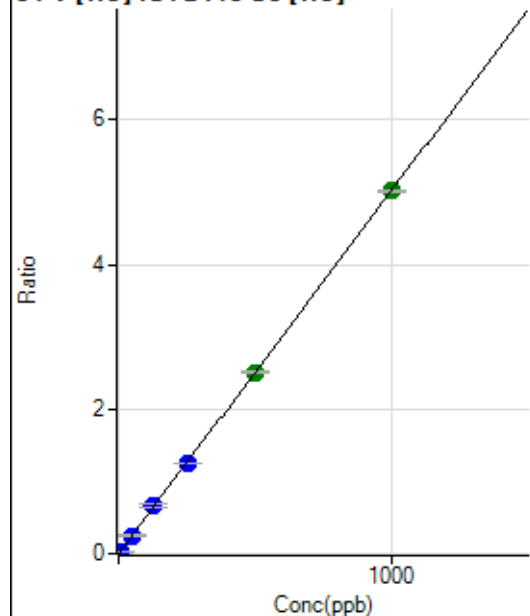
$$DL = 0.0214$$

$$BEC = 0.1188$$

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	96.67	0.0001	P	14.0
2	☐	0.500	0.445	2021.27	0.0023	P	2.0
3	☐	5.000	4.791	20827.80	0.0242	P	1.6
4	☐	50.000	49.993	212642.78	0.2510	P	1.9
5	☐	125.000	131.315	531980.06	0.6592	P	6.3
6	☐	250.000	248.544	1029837.38	1.2475	P	0.1
7	☐	500.000	500.328	2046908.77	2.5112	A	1.5
8	☐	1000.000	999.412	4152801.57	5.0161	A	0.8
9	☐			2139.63	0.0027	P	34.6

$$y = 0.0050 * x + 1.1260\text{E-}004$$

$$R = 1.0000$$

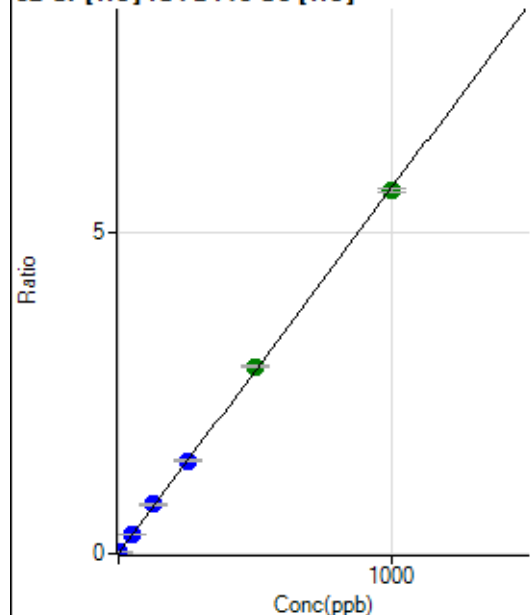
$$DL = 0.009397$$

$$BEC = 0.02243$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	3108.13	0.0036	P	6.9
2	☐	0.200	0.207	4127.27	0.0048	P	1.5
3	☐	2.000	2.074	13274.82	0.0154	P	2.2
4	☐	50.000	51.350	250065.96	0.2952	P	1.9
5	☐	125.000	134.333	618551.10	0.7664	P	6.1
6	☐	250.000	254.368	1195272.03	1.4480	P	0.7
7	☐	500.000	511.111	2368561.98	2.9058	A	1.0
8	☐	1000.000	992.118	4666786.98	5.6370	A	1.1
9	☐			18120.79	0.0228	P	5.4

$$y = 0.0057 * x + 0.0036$$

$$R = 0.9999$$

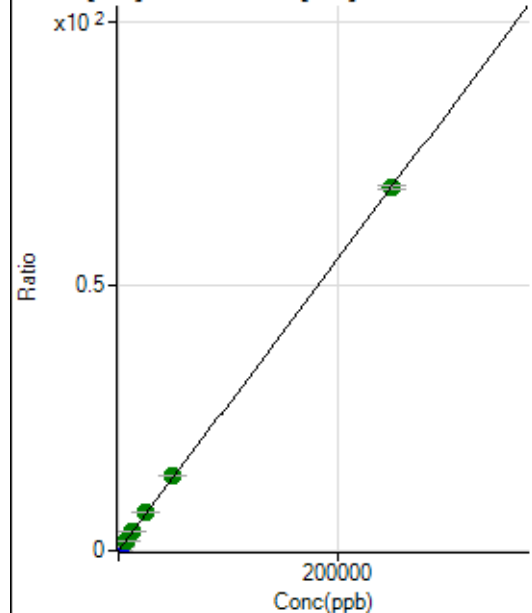
$$DL = 0.1329$$

$$BEC = 0.6376$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	2347.99	0.0027	P	7.8
2	☐	5.000	5.933	3758.29	0.0044	P	0.6
3	☐	50.000	55.533	15513.64	0.0180	P	1.9
4	☐	2500.000	2762.417	645368.01	0.7618	P	1.2
5	☐	6250.000	7051.020	1566612.15	1.9402	A	4.9
6	☐	12500.000	13282.390	3015059.33	3.6524	A	0.2
7	☐	25000.000	26418.615	5919205.88	7.2620	A	1.2
8	☐	50000.000	51574.034	11734613.30	14.1741	A	1.0
9	☐	250000.00	249481.56	54468948.63	68.5546	A	0.9

$$y = 2.7478E-004 * x + 0.0027$$

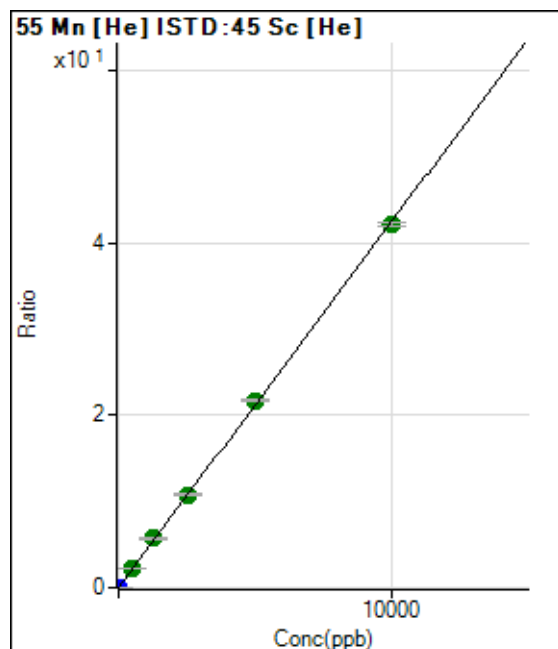
$$R = 1.0000$$

$$DL = 2.338$$

$$BEC = 9.954$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	374.46	0.0004	P	9.4
2	☐	0.100	0.098	733.36	0.0009	P	6.5
3	☐	1.000	1.073	4306.21	0.0050	P	1.3
4	☐	500.000	511.715	1840860.46	2.1732	A	2.8
5	☐	1250.000	1355.774	4649032.85	5.7572	A	4.7
6	☐	2500.000	2546.373	8925575.42	10.8125	A	0.7
7	☐	5000.000	5118.495	17716340.99	21.7339	A	0.4
8	☐	10000.000	9915.352	34855396.15	42.1017	A	1.0
9	☐			18871.03	0.0238	P	35.1

$$y = 0.0042 * x + 4.3621E-004$$

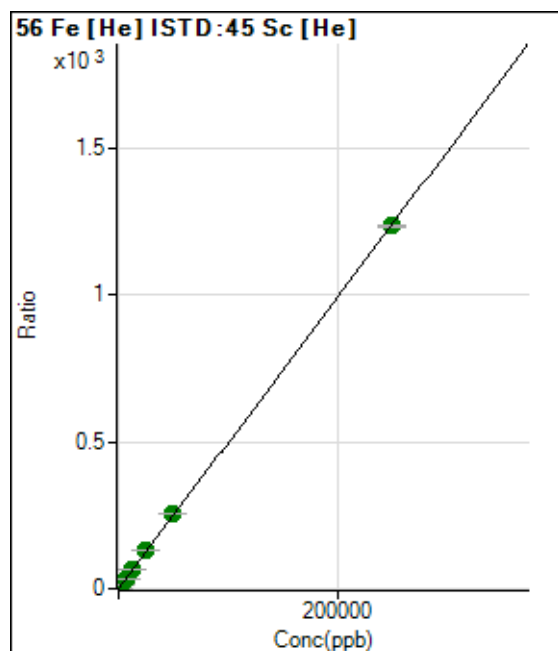
$$R = 0.9998$$

$$DL = 0.02883$$

$$BEC = 0.1027$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	20379.44	0.0237	P	0.5
2	☐	5.000	5.034	41887.07	0.0487	P	0.7
3	☐	50.000	54.359	252480.25	0.2928	P	0.2
4	☐	2500.000	2623.143	11019415.95	13.0093	A	2.8
5	☐	6250.000	6970.772	27871503.47	34.5317	A	6.0
6	☐	12500.000	13153.608	53770949.75	65.1391	A	1.1
7	☐	25000.000	26219.258	105820007.3	129.8190	A	0.4
8	☐	50000.000	51352.319	210484852.4	254.2371	A	0.3
9	☐	250000.00	249555.67	981581478.7	1,235.418	A	0.7

$$y = 0.0050 * x + 0.0237$$

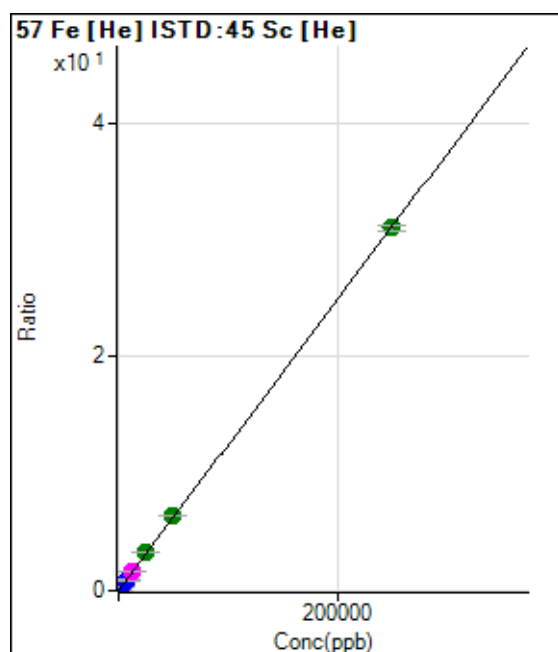
$$R = 1.0000$$

$$DL = 0.07121$$

$$BEC = 4.794$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1258.95	0.0015	P	3.3
2	☐	5.000	4.711	1766.79	0.0021	P	2.0
3	☐	50.000	57.294	7407.45	0.0086	P	3.0
4	☐	2500.000	2714.589	287226.02	0.3391	P	2.9
5	☐	6250.000	7128.187	716772.06	0.8881	P	6.0
6	☐	12500.000	13162.336	1352609.81	1.6386	M	2.0
7	☐	25000.000	26366.811	2674305.79	3.2809	A	1.5
8	☐	50000.000	50974.435	5250295.10	6.3416	A	0.1
9	☐	250000.00	249611.21	24668622.41	31.0476	A	1.3

$$y = 1.2438\text{E-}004 * x + 0.0015$$

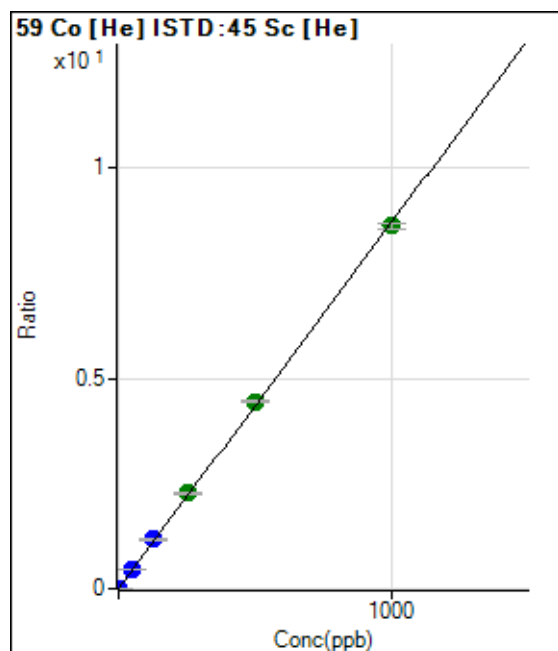
$$R = 1.0000$$

$$DL = 1.149$$

$$BEC = 11.79$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	391.12	0.0005	P	8.8
2	☐	0.100	0.093	1090.05	0.0013	P	3.6
3	☐	1.000	1.014	7998.87	0.0093	P	1.2
4	☐	50.000	51.614	380768.56	0.4494	P	1.5
5	☐	125.000	135.154	949419.61	1.1761	P	5.5
6	☐	250.000	260.344	1869775.25	2.2651	A	0.9
7	☐	500.000	511.103	3624302.27	4.4463	A	0.5
8	☐	1000.000	990.513	7133429.06	8.6165	A	1.3
9	☐			7956.83	0.0100	P	7.9

$$y = 0.0087 * x + 4.5542\text{E-}004$$

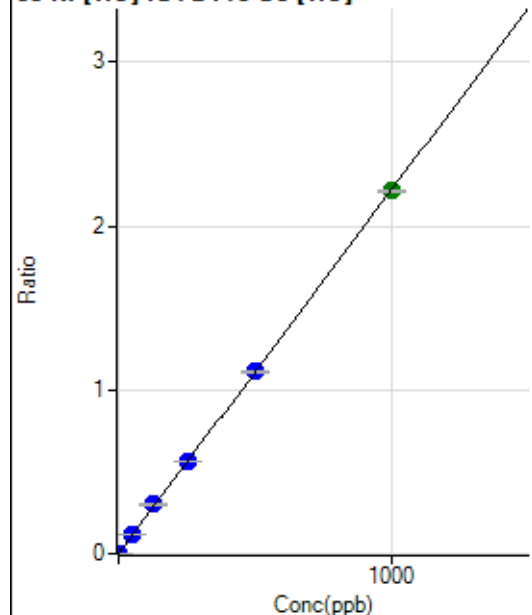
$$R = 0.9998$$

$$DL = 0.01377$$

$$BEC = 0.05236$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	505.57	0.0006	P	9.1
2	☒	0.100					
3	☐	1.000	1.113	2638.04	0.0031	P	4.6
4	☐	50.000	52.289	98794.94	0.1166	P	2.1
5	☐	125.000	135.725	243607.09	0.3018	P	5.6
6	☐	250.000	254.849	467337.77	0.5661	P	0.7
7	☐	500.000	500.011	904910.77	1.1102	P	1.2
8	☐	1000.000	997.327	1832837.44	2.2138	A	0.5
9	☐			4015.02	0.0051	P	3.9

$$y = 0.0022 * x + 5.8886E-004$$

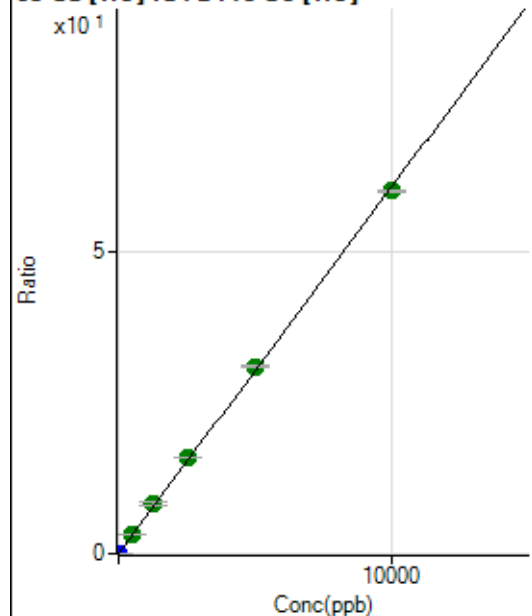
$$R = 0.9999$$

$$DL = 0.0724$$

$$BEC = 0.2654$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	876.70	0.0010	P	4.0
2	☐	0.200	0.196	1903.48	0.0022	P	5.9
3	☐	2.000	2.113	11927.08	0.0138	P	0.7
4	☐	500.000	535.873	2753137.11	3.2505	A	3.2
5	☐	1250.000	1377.182	6741769.55	8.3522	A	5.8
6	☐	2500.000	2616.742	13099618.55	15.8689	A	0.9
7	☐	5000.000	5108.521	25251818.79	30.9790	A	0.7
8	☐	10000.000	9898.863	49696587.59	60.0276	A	0.8
9	☐			9852.30	0.0124	P	16.4

$$y = 0.0061 * x + 0.0010$$

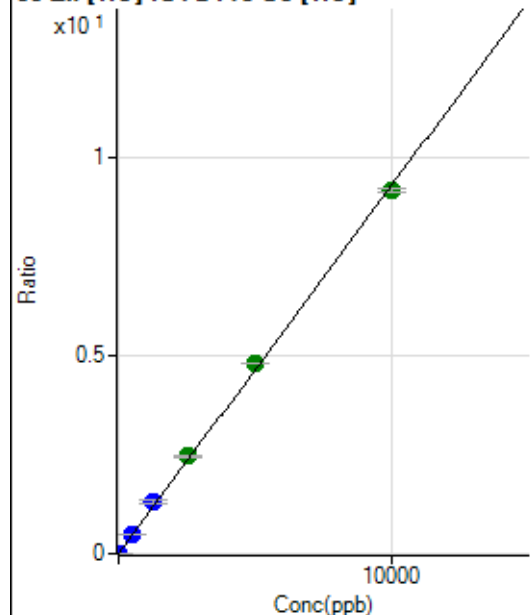
$$R = 0.9998$$

$$DL = 0.02045$$

$$BEC = 0.1684$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1700.11	0.0020	P	2.1
2	☒	0.200					
3	☐	2.000	2.335	3581.57	0.0042	P	2.3
4	☐	500.000	539.108	426846.48	0.5039	P	2.1
5	☐	1250.000	1408.032	1059533.86	1.3129	P	6.3
6	☐	2500.000	2645.800	2035012.30	2.4653	A	1.7
7	☐	5000.000	5169.496	3924650.95	4.8149	A	0.9
8	☐	10000.000	9857.093	7599241.83	9.1791	A	1.0
9	☐			9228.52	0.0116	P	1.6

$$y = 9.3102\text{E-}004 * x + 0.0020$$

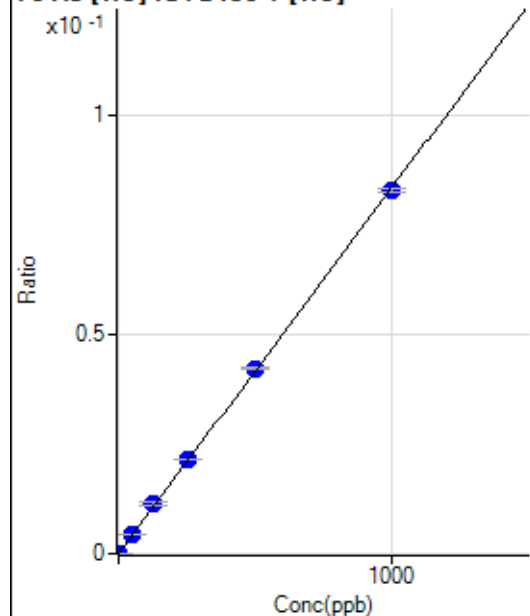
$$R = 0.9996$$

$$DL = 0.1363$$

$$BEC = 2.127$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	10.00	0.0000	P	33.2
2	☐	0.100	0.126	76.66	0.0000	P	15.2
3	☐	1.000	1.116	605.58	0.0001	P	10.8
4	☐	50.000	52.694	27599.05	0.0044	P	2.9
5	☐	125.000	137.776	68801.64	0.0115	P	5.4
6	☐	250.000	258.494	133221.44	0.0216	P	0.5
7	☐	500.000	507.315	261796.87	0.0423	P	0.7
8	☐	1000.000	992.487	519142.29	0.0828	P	1.1
9	☐			134.45	0.0000	P	10.2

$$y = 8.3410\text{E-}005 * x + 1.5927\text{E-}006$$

$$R = 0.9999$$

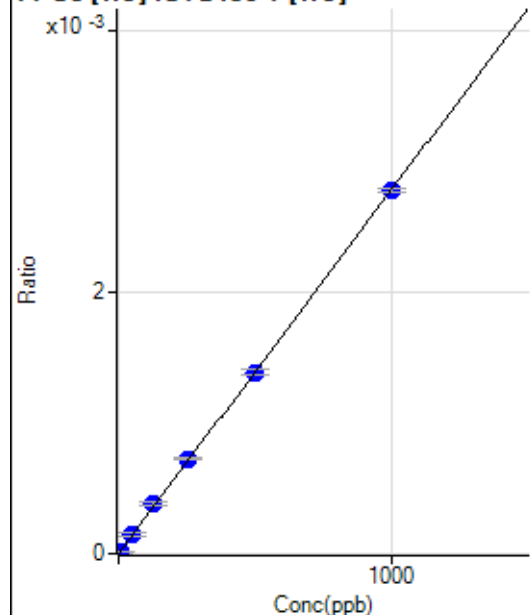
$$DL = 0.01905$$

$$BEC = 0.0191$$

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	2.22	0.0000	P	86.6
2	☐	0.500	-0.001	2.22	0.0000	P	86.6
3	☐	5.000	3.926	72.22	0.0000	P	30.7
4	☐	50.000	52.741	926.71	0.0001	P	13.0
5	☐	125.000	137.422	2294.64	0.0004	P	7.9
6	☐	250.000	260.974	4495.17	0.0007	P	3.5
7	☐	500.000	496.917	8568.13	0.0014	P	3.1
8	☐	1000.000	997.114	17425.88	0.0028	P	1.0
9	☐			95.55	0.0000	P	14.1

$$y = 2.7865\text{E-}006 * x + 3.5127\text{E-}007$$

$$R = 0.9999$$

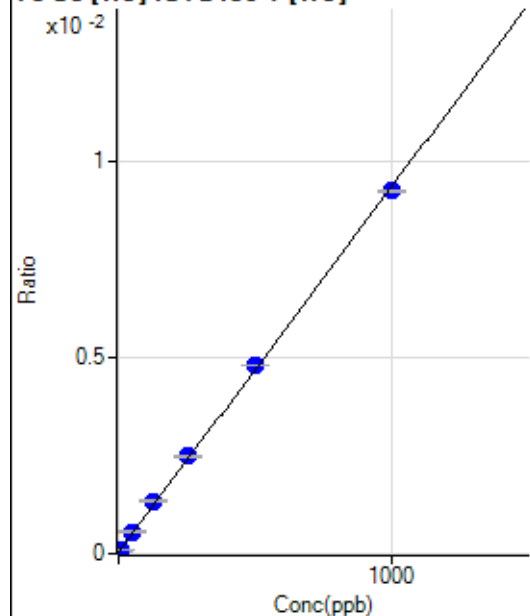
$$DL = 0.3275$$

$$BEC = 0.1261$$

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	271.12	0.0000	P	9.7
2	☐	0.500	0.886	325.56	0.0001	P	10.5
3	☐	5.000	5.368	595.58	0.0001	P	8.6
4	☐	50.000	54.820	3474.89	0.0006	P	6.5
5	☐	125.000	139.950	8056.72	0.0013	P	6.3
6	☐	250.000	262.900	15389.18	0.0025	P	1.2
7	☐	500.000	510.846	29692.09	0.0048	P	0.5
8	☐	1000.000	989.240	58029.83	0.0093	P	0.6
9	☐			590.02	0.0001	P	15.7

$$y = 9.3104\text{E-}006 * x + 4.3149\text{E-}005$$

$$R = 0.9997$$

$$DL = 1.347$$

$$BEC = 4.634$$

Weight: <None>

Min Conc: 0

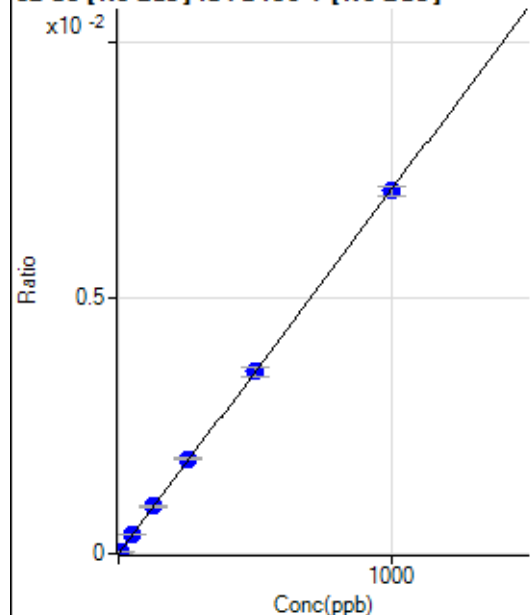
81 Br [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			26348.08		P	1.4
2	☐			26267.93		P	0.6
3	☐			26480.64		P	1.5
4	☐			25663.58		P	1.7
5	☐			26082.05		P	1.0
6	☐			25653.55		P	1.3
7	☐			25560.06		P	0.5
8	☐			26757.77		P	0.7
9	☐			31007.07		P	0.8

81 Br [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			158.89		P	19.8
2	☐			111.11		P	18.1
3	☐			136.67		P	24.8
4	☐			115.56		P	14.2
5	☐			113.34		P	24.1
6	☐			136.67		P	8.8
7	☐			151.12		P	7.1
8	☐			180.00		P	1.9
9	☐			1024.49		P	4.1

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	8.93	0.0000	P	478.
2	☒	0.500					
3	☐	5.000	5.457	1083.59	0.0000	P	3.6
4	☐	50.000	54.582	10595.26	0.0004	P	1.5
5	☐	125.000	130.962	26014.28	0.0009	P	2.6
6	☐	250.000	260.329	51496.00	0.0019	P	2.5
7	☐	500.000	499.700	98381.11	0.0036	P	4.9
8	☐	1000.000	996.591	195570.14	0.0071	P	2.9
9	☐			1224.64	0.0000	P	7.0

$$y = 7.1077\text{E-}006 * x + 3.2387\text{E-}007$$

$$R = 0.9999$$

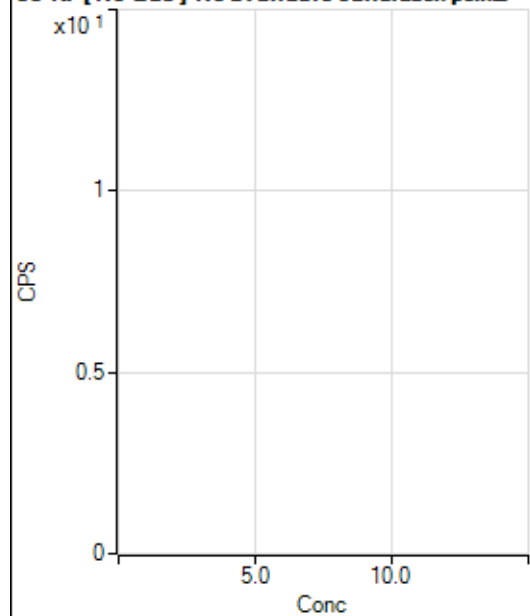
$$DL = 0.6545$$

$$BEC = 0.04557$$

Weight: <None>

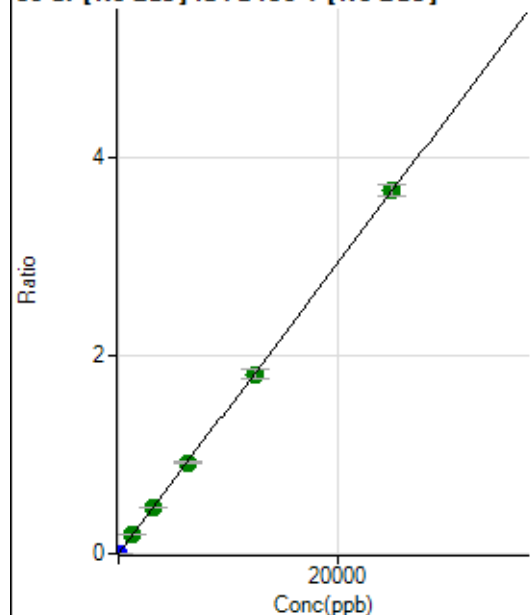
Min Conc: 0

83 Kr [No Gas] No available calibration points



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			210.00		P	17.2
2	☐			205.56		P	18.2
3	☐			200.00		P	13.6
4	☐			192.23		P	6.1
5	☐			220.00		P	6.6
6	☐			215.56		P	4.7
7	☐			218.89		P	10.7
8	☐			204.45		P	18.0
9	☐			265.56		P	8.4

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	354.45	0.0000	P	8.2
2	☐	0.100	0.107	746.70	0.0000	P	12.1
3	☐	1.000	0.990	4364.02	0.0002	P	2.7
4	☐	1250.000	1291.517	5147486.93	0.1886	A	1.6
5	☐	3125.000	3173.639	12949399.53	0.4635	A	2.9
6	☐	6250.000	6273.829	25497289.62	0.9163	A	2.3
7	☐	12500.000	12367.918	50025489.25	1.8063	A	5.4
8	☐	25000.000	25051.928	101012007.3	3.6588	A	3.1
9	☐			17956.40	0.0007	P	54.2

$$y = 1.4605E-004 * x + 1.2935E-005$$

$$R = 1.0000$$

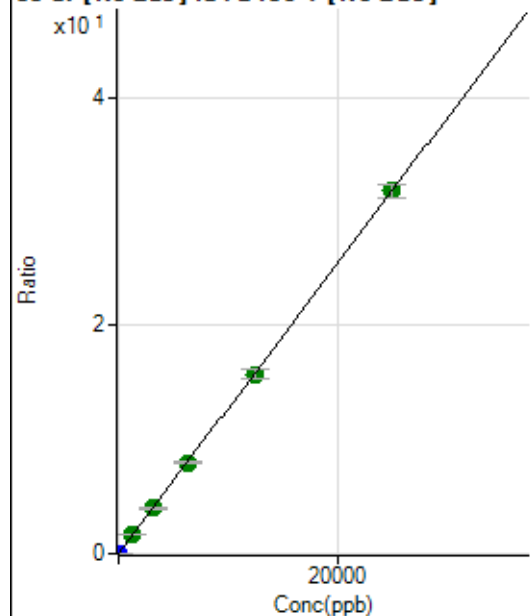
$$DL = 0.02166$$

$$BEC = 0.08857$$

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	332.23	0.0000	P	8.3
2	☐	0.100	0.097	3546.02	0.0001	P	6.6
3	☐	1.000	0.989	35146.39	0.0013	P	2.3
4	☐	1250.000	1280.138	44397478.78	1.6270	A	0.9
5	☐	3125.000	3162.919	112297736.1	4.0199	A	3.1
6	☐	6250.000	6268.740	221700314.4	7.9672	A	2.3
7	☐	12500.000	12388.316	436079286.8	15.7449	A	5.0
8	☐	25000.000	25044.910	878745062.4	31.8307	A	3.6
9	☐			154004.17	0.0061	P	56.3

$$y = 0.0013 * x + 1.2132E-005$$

$$R = 1.0000$$

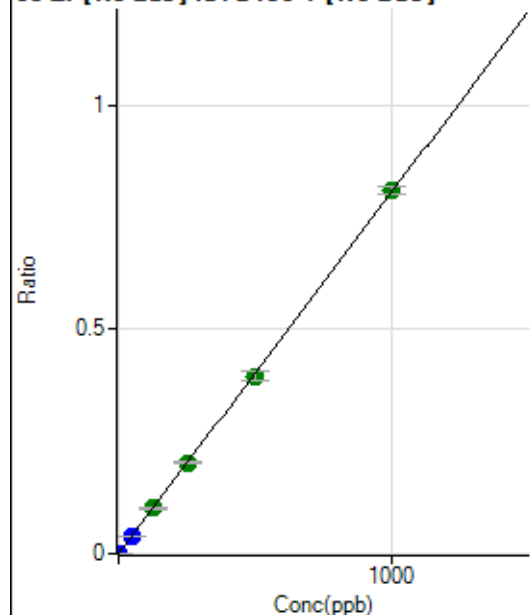
$$DL = 0.002377$$

$$BEC = 0.009546$$

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	1033.38	0.0000	P	3.7
2	☐	0.100	0.091	2906.98	0.0001	P	6.9
3	☐	1.000	0.898	21113.04	0.0008	P	1.6
4	☐	50.000	49.943	1099745.71	0.0403	P	1.5
5	☐	125.000	126.152	2842333.08	0.1017	A	2.6
6	☐	250.000	252.111	5657334.77	0.2033	A	1.9
7	☐	500.000	490.954	10961643.31	0.3958	A	5.9
8	☐	1000.000	1003.854	22345996.61	0.8094	A	2.1
9	☐			11044.39	0.0004	P	19.7

$$y = 8.0621\text{E-}004 * x + 3.7724\text{E-}005$$

$$R = 0.9999$$

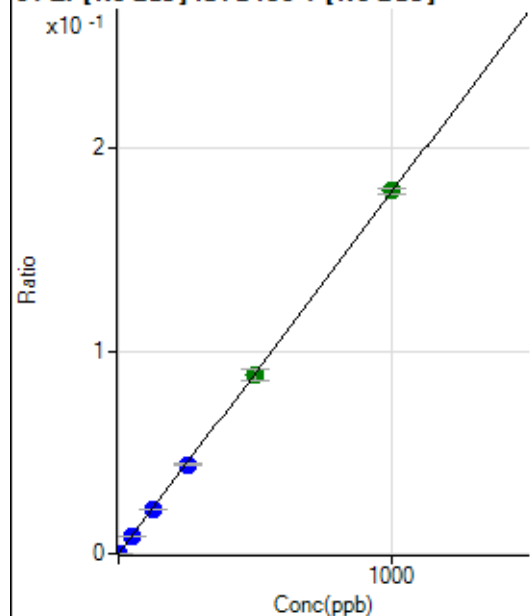
$$DL = 0.005232$$

$$BEC = 0.04679$$

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	213.34	0.0000	P	9.9
2	☐	0.100	0.083	594.46	0.0000	P	5.3
3	☐	1.000	0.878	4551.85	0.0002	P	2.6
4	☐	50.000	50.130	243919.32	0.0089	P	1.4
5	☐	125.000	122.771	611264.21	0.0219	P	2.9
6	☐	250.000	246.043	1219874.59	0.0438	P	3.0
7	☐	500.000	494.097	2437874.25	0.0880	A	5.9
8	☐	1000.000	1004.213	4939828.92	0.1789	A	1.9
9	☐			2398.00	0.0001	P	19.6

$$y = 1.7816\text{E-}004 * x + 7.7899\text{E-}006$$

$$R = 1.0000$$

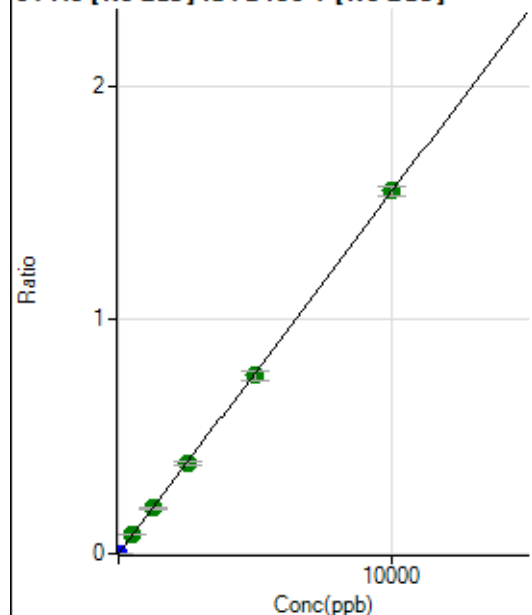
$$DL = 0.01294$$

$$BEC = 0.04372$$

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	465.57	0.0000	P	14.0
2	☐	0.500	0.531	2599.15	0.0001	P	8.2
3	☐	5.000	5.717	24979.14	0.0009	P	1.7
4	☐	500.000	513.695	2169393.47	0.0795	A	1.9
5	☐	1250.000	1255.647	5428214.16	0.1943	A	3.3
6	☐	2500.000	2493.064	10733775.40	0.3858	A	3.0
7	☐	5000.000	4936.736	21156572.88	0.7639	A	5.2
8	☐	10000.000	10031.975	42856337.14	1.5523	A	2.6
9	☐			12230.25	0.0005	P	35.3

$$y = 1.5473\text{E-}004 * x + 1.6993\text{E-}005$$

$$R = 1.0000$$

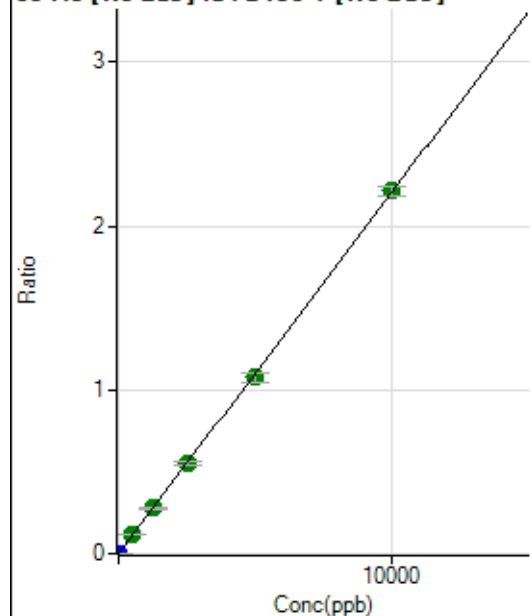
$$DL = 0.04617$$

$$BEC = 0.1098$$

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	192.23	0.0000	P	14.5
2	☐	0.500	0.503	3081.46	0.0001	P	10.9
3	☐	5.000	5.010	30766.78	0.0011	P	0.8
4	☐	500.000	512.995	3082773.22	0.1130	A	1.5
5	☐	1250.000	1258.699	7743455.44	0.2772	A	3.1
6	☐	2500.000	2498.070	15306412.97	0.5501	A	2.7
7	☐	5000.000	4895.676	29855614.28	1.0781	A	5.6
8	☐	10000.000	10050.908	61104301.31	2.2133	A	2.9
9	☐			13505.40	0.0005	P	46.8

$$y = 2.2021\text{E-}004 * x + 7.0139\text{E-}006$$

$$R = 0.9999$$

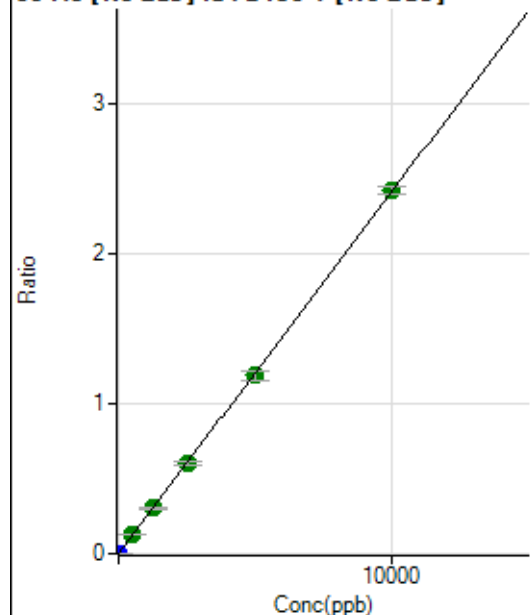
$$DL = 0.01382$$

$$BEC = 0.03185$$

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	270.01	0.0000	P	5.8
2	☐	0.500	0.501	3425.99	0.0001	P	8.6
3	☐	5.000	5.070	34166.52	0.0012	P	2.1
4	☐	500.000	513.983	3384384.12	0.1240	A	1.5
5	☐	1250.000	1255.839	8465544.66	0.3030	A	3.0
6	☐	2500.000	2497.979	16770738.50	0.6027	A	2.9
7	☐	5000.000	4930.485	32947850.34	1.1897	A	5.4
8	☐	10000.000	10033.834	66842473.45	2.4210	A	2.3
9	☐			28530.53	0.0011	P	24.5

$$y = 2.4129E-004 * x + 9.8542E-006$$

$$R = 1.0000$$

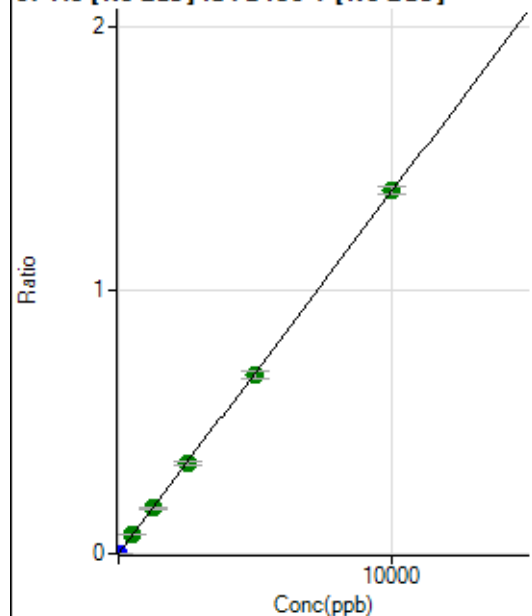
$$DL = 0.0071$$

$$BEC = 0.04084$$

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	110.00	0.0000	P	5.9
2	☐	0.500	0.516	1967.93	0.0001	P	7.0
3	☐	5.000	5.021	19246.12	0.0007	P	2.0
4	☐	500.000	517.044	1940866.00	0.0711	A	1.1
5	☐	1250.000	1259.450	4839915.17	0.1732	A	2.6
6	☐	2500.000	2504.197	9584104.58	0.3445	A	3.3
7	☐	5000.000	4945.433	18843147.36	0.6803	A	4.5
8	☐	10000.000	10024.201	38069897.77	1.3789	A	2.1
9	☐			8443.07	0.0003	P	48.4

$$y = 1.3755E-004 * x + 4.0167E-006$$

$$R = 1.0000$$

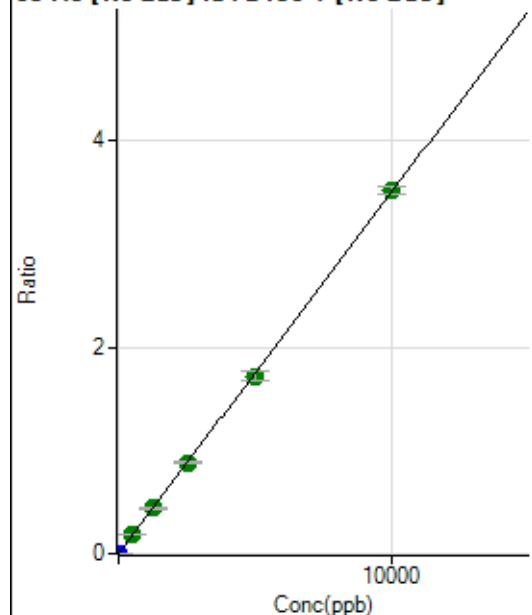
$$DL = 0.005181$$

$$BEC = 0.0292$$

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	291.12	0.0000	P	16.3
2	☐	0.500	0.500	4868.64	0.0002	P	9.7
3	☐	5.000	5.052	49290.59	0.0018	P	1.6
4	☐	500.000	515.273	4921435.14	0.1803	A	0.7
5	☐	1250.000	1262.814	12347641.90	0.4420	A	2.6
6	☐	2500.000	2514.288	24484314.91	0.8800	A	3.0
7	☐	5000.000	4918.225	47679392.62	1.7213	A	4.6
8	☐	10000.000	10034.950	96966850.78	3.5121	A	2.1
9	☐			20656.71	0.0008	P	48.0

$$y = 3.4999\text{E-}004 * x + 1.0634\text{E-}005$$

$$R = 1.0000$$

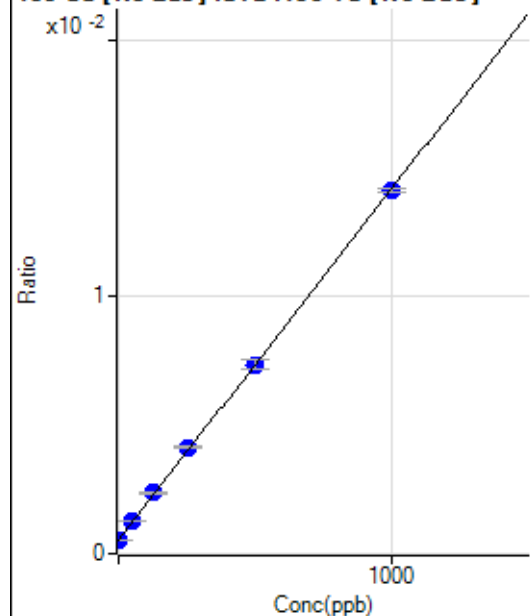
$$DL = 0.01483$$

$$BEC = 0.03038$$

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	12221.91	0.0005	P	3.3
2	☐	0.100	0.036	11712.65	0.0005	P	1.4
3	☐	1.000	0.584	12438.76	0.0005	P	0.9
4	☐	50.000	55.311	29191.60	0.0013	P	0.8
5	☐	125.000	134.760	55098.56	0.0024	P	3.0
6	☐	250.000	264.644	96043.79	0.0042	P	1.9
7	☐	500.000	500.476	173017.75	0.0074	P	5.3
8	☐	1000.000	994.616	329054.02	0.0141	P	1.2
9	☐			11154.36	0.0005	P	1.3

$$y = 1.3663\text{E-}005 * x + 5.3577\text{E-}004$$

$$R = 0.9999$$

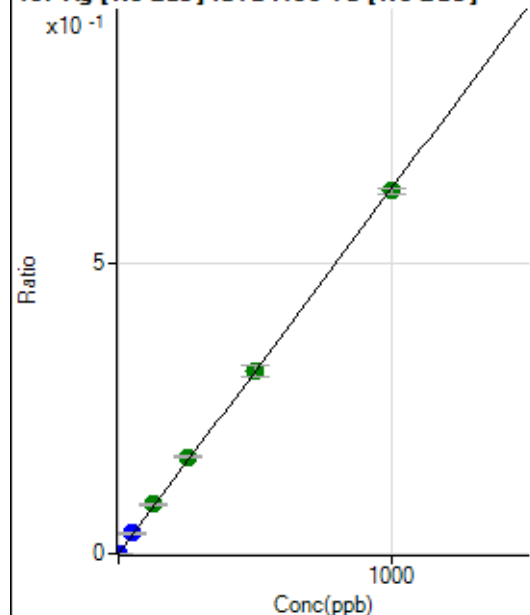
$$DL = 3.843$$

$$BEC = 39.21$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	117.78	0.0000	P	16.3
2	☐	0.100	0.098	1447.87	0.0001	P	19.1
3	☐	1.000	1.072	15497.29	0.0007	P	2.5
4	☐	50.000	55.325	784607.24	0.0347	P	1.4
5	☐	125.000	135.035	1963300.80	0.0847	A	4.0
6	☐	250.000	265.239	3849602.75	0.1664	A	1.7
7	☐	500.000	501.871	7386520.93	0.3149	A	6.0
8	☐	1000.000	993.734	14522848.95	0.6234	A	1.4
9	☐			6450.44	0.0003	P	19.9

$$y = 6.2735\text{E-}004 * x + 5.1672\text{E-}006$$

$$R = 0.9998$$

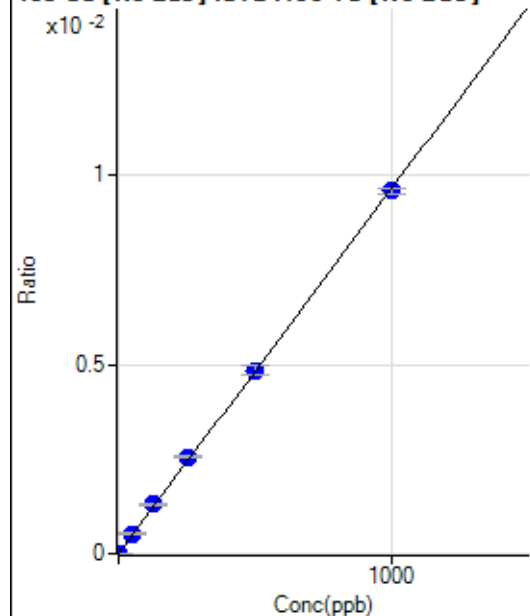
$$DL = 0.004031$$

$$BEC = 0.008237$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	44.45	0.0000	P	59.5
2	☐	0.100	0.046	52.22	0.0000	P	42.5
3	☐	1.000	1.069	280.00	0.0000	P	15.0
4	☐	50.000	54.718	11967.30	0.0005	P	2.1
5	☐	125.000	135.630	30350.71	0.0013	P	3.1
6	☐	250.000	264.352	59005.00	0.0026	P	1.3
7	☐	500.000	501.638	113509.23	0.0048	P	5.7
8	☐	1000.000	994.028	223287.48	0.0096	P	1.4
9	☐			175.56	0.0000	P	21.6

$$y = 9.6407\text{E-}006 * x + 1.9394\text{E-}006$$

$$R = 0.9999$$

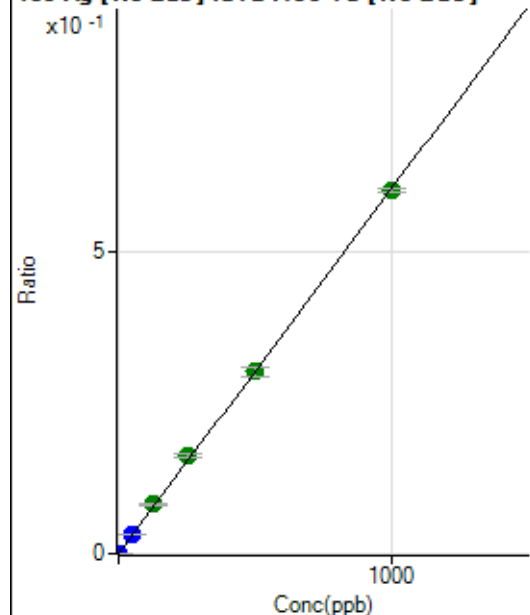
$$DL = 0.3594$$

$$BEC = 0.2012$$

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	36.67	0.0000	P	9.1
2	☐	0.100	0.095	1283.40	0.0001	P	15.4
3	☐	1.000	1.065	14797.65	0.0006	P	2.4
4	☐	50.000	54.928	752257.36	0.0333	P	1.3
5	☐	125.000	135.994	1909734.94	0.0824	A	3.5
6	☐	250.000	268.671	3765860.54	0.1628	A	2.1
7	☐	500.000	499.078	7094909.27	0.3024	A	5.5
8	☐	1000.000	994.172	14032036.18	0.6024	A	1.1
9	☐			6142.54	0.0003	P	22.5

$$y = 6.0589\text{E-}004 * x + 1.6074\text{E-}006$$

$$R = 0.9998$$

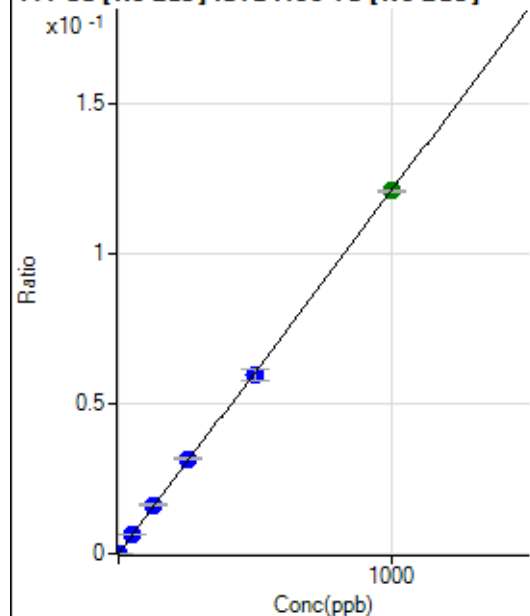
$$DL = 0.0007257$$

$$BEC = 0.002653$$

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	1278.85	0.0001	P	1.9
2	☐	0.100	0.104	1494.71	0.0001	P	5.4
3	☐	1.000	1.093	4310.50	0.0002	P	1.5
4	☐	50.000	54.285	149911.40	0.0066	P	0.9
5	☐	125.000	132.442	373138.36	0.0161	P	3.7
6	☐	250.000	261.541	734275.59	0.0317	P	2.0
7	☐	500.000	493.632	1404219.89	0.0599	P	6.1
8	☐	1000.000	999.154	2821008.98	0.1211	A	0.9
9	☐			2508.20	0.0001	P	9.9

$$y = 1.2115\text{E-}004 * x + 5.6052\text{E-}005$$

$$R = 0.9999$$

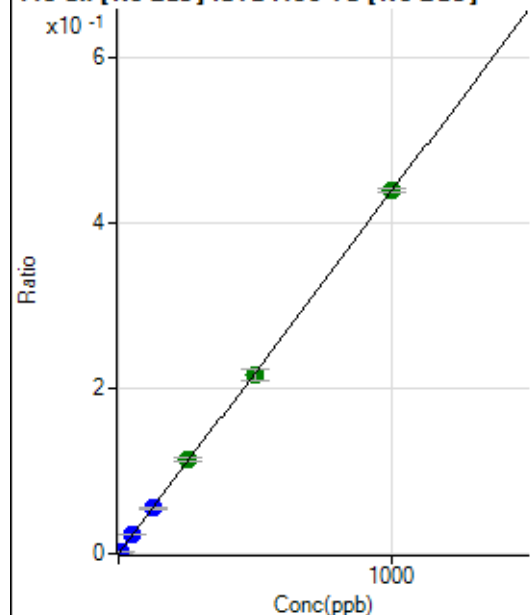
$$DL = 0.02653$$

$$BEC = 0.4627$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1787.96	0.0001	P	5.5
2	☐	0.500	0.623	7727.79	0.0004	P	20.9
3	☐	5.000	4.987	51779.21	0.0023	P	1.0
4	☐	50.000	51.920	516014.32	0.0228	P	1.1
5	☐	125.000	126.605	1287564.36	0.0556	P	3.6
6	☐	250.000	259.530	2632653.73	0.1138	A	2.4
7	☐	500.000	492.332	5062201.45	0.2158	A	6.8
8	☐	1000.000	1001.155	10221564.36	0.4388	A	0.9
9	☐			6553.80	0.0003	P	15.9

$$y = 4.3820\text{E-}004 * x + 7.8404\text{E-}005$$

$$R = 0.9999$$

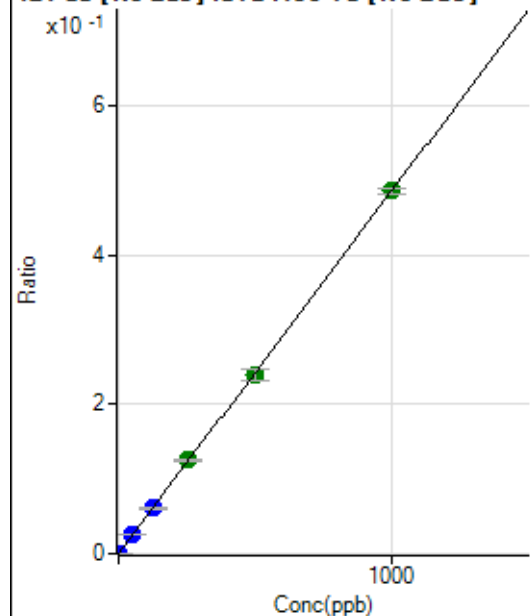
$$DL = 0.02954$$

$$BEC = 0.1789$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	302.23	0.0000	P	17.9
2	☐	0.200	0.195	2346.89	0.0001	P	5.0
3	☐	2.000	1.981	22308.50	0.0010	P	2.2
4	☐	50.000	51.337	563926.23	0.0249	P	1.0
5	☐	125.000	126.068	1419443.68	0.0612	P	3.9
6	☐	250.000	257.507	2893763.36	0.1251	A	2.6
7	☐	500.000	494.053	5630711.24	0.2400	A	5.7
8	☐	1000.000	1000.897	11325797.75	0.4862	A	1.5
9	☐			6815.02	0.0003	P	13.6

$$y = 4.8574\text{E-}004 * x + 1.3228\text{E-}005$$

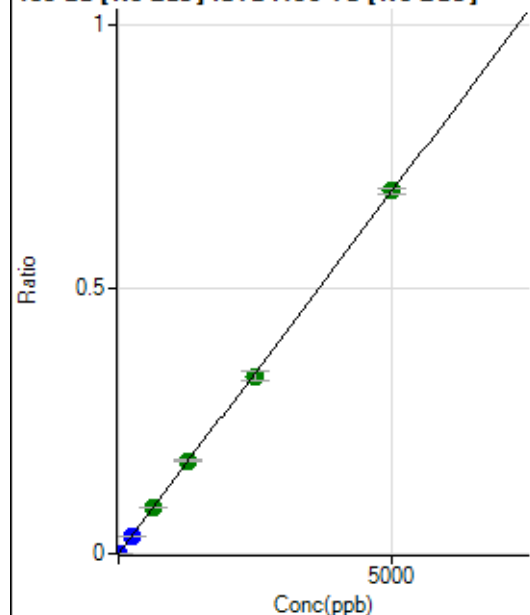
$$R = 0.9999$$

$$DL = 0.01461$$

$$BEC = 0.02723$$

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	174.45	0.0000	P	5.8
2	☐	1.000	0.923	2910.32	0.0001	P	7.1
3	☐	10.000	9.438	29708.81	0.0013	P	1.3
4	☐	250.000	249.396	771259.99	0.0341	P	1.5
5	☐	625.000	640.971	2032402.90	0.0877	A	2.9
6	☐	1250.000	1283.160	4060796.26	0.1755	A	1.7
7	☐	2500.000	2454.924	7879549.54	0.3358	A	5.3
8	☐	5000.000	5012.283	15972202.54	0.6856	A	1.8
9	☐			9600.05	0.0005	P	16.3

$$y = 1.3679\text{E-}004 * x + 7.6459\text{E-}006$$

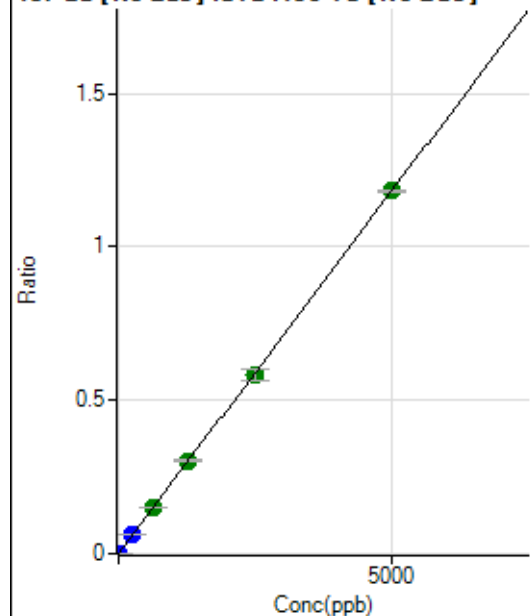
$$R = 0.9999$$

$$DL = 0.00967$$

$$BEC = 0.0559$$

Weight: <None>

Min Conc: 0

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

	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	290.01	0.0000	P	12.2
2	☐	1.000	0.935	5088.73	0.0002	P	3.4
3	☐	10.000	9.629	52314.66	0.0023	P	1.1
4	☐	250.000	252.954	1350677.65	0.0598	P	0.6
5	☐	625.000	639.153	3499054.88	0.1510	A	3.1
6	☐	1250.000	1282.722	7009109.41	0.3030	A	2.0
7	☐	2500.000	2468.331	13678265.21	0.5830	A	5.7
8	☐	5000.000	5005.738	27541818.48	1.1823	A	0.8
9	☐			16427.59	0.0008	P	14.8

$$y = 2.3619\text{E-}004 * x + 1.2714\text{E-}005$$

$$R = 0.9999$$

$$DL = 0.01969$$

$$BEC = 0.05383$$

Weight: <None>

Min Conc: 0

150 Nd [No Gas] No available calibration points

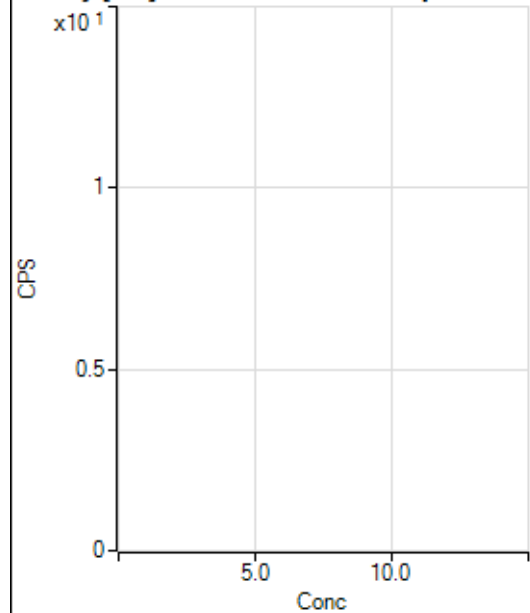
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			20.00		P	28.9
2	☐			14.45		P	26.7
3	☐			11.11		P	69.3
4	☐			83.33		P	21.2
5	☐			211.11		P	13.6
6	☐			423.35		P	12.4
7	☐			807.81		P	7.5
8	☐			1559.00		P	5.0
9	☐			387.79		P	11.2

150 Nd [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			10.00		P	33.3
2	☐			8.89		P	43.3
3	☐			7.78		P	24.7
4	☐			27.78		P	61.6
5	☐			60.00		P	33.8
6	☐			74.44		P	15.7
7	☐			212.23		P	22.8
8	☐			387.79		P	12.0
9	☐			241.11		P	9.8

156 Dy [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			24.45		P	28.4
2	☐			31.11		P	34.4
3	☐			27.78		P	27.7
4	☐			67.78		P	12.4
5	☐			133.34		P	9.0
6	☐			273.34		P	20.1
7	☐			492.24		P	6.6
8	☐			910.04		P	2.8
9	☐			3550.48		P	2.0

156 Dy [He] No available calibration points

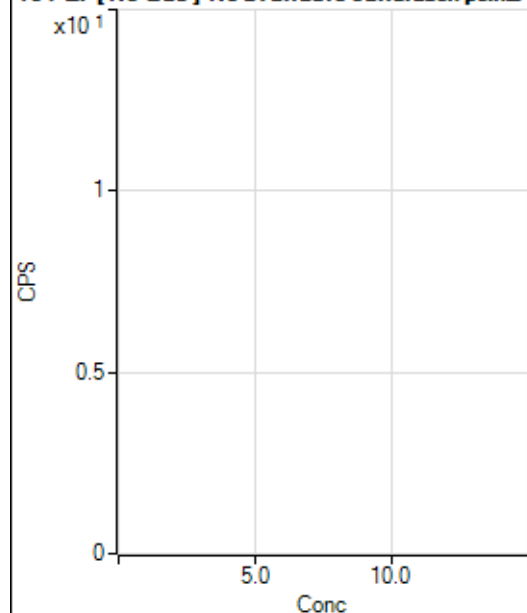
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			27.78		P	30.2
2	☐			15.56		P	32.7
3	☐			17.78		P	39.0
4	☐			84.44		P	21.7
5	☐			116.67		P	5.7
6	☐			251.12		P	4.7
7	☐			522.24		P	5.9
8	☐			992.27		P	8.9
9	☐			2364.67		P	7.2

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

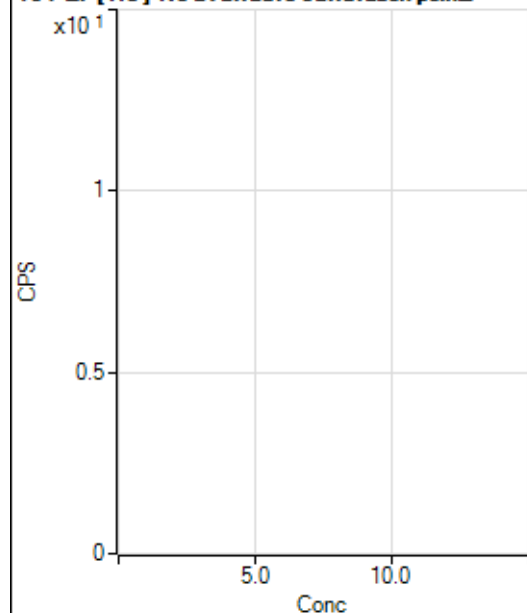
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			171.11		P	5.6
2	☐			175.56		P	18.7
3	☐			167.78		P	14.6
4	☐			207.78		P	5.2
5	☐			254.45		P	8.7
6	☐			323.34		P	3.1
7	☐			576.68		P	7.5
8	☐			936.71		P	9.9
9	☐			4013.95		P	2.1

160 Gd [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			714.47		P	5.1
2	☐			844.48		P	3.3
3	☐			751.14		P	2.2
4	☐			714.47		P	10.8
5	☐			745.58		P	8.0
6	☐			901.15		P	1.2
7	☐			962.26		P	4.1
8	☐			1224.51		P	3.9
9	☐			3283.75		P	3.5

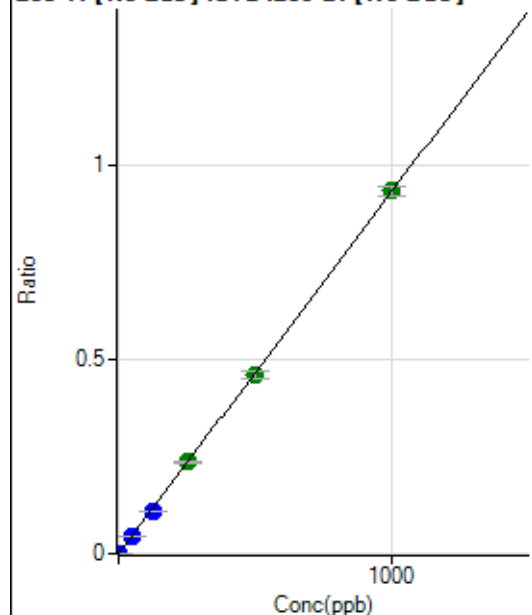
164 Er [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			158.89		P	3.2
2	☐			137.78		P	13.3
3	☐			168.89		P	9.9
4	☐			186.67		P	3.1
5	☐			181.11		P	13.9
6	☐			224.45		P	6.0
7	☐			285.56		P	13.6
8	☐			402.23		P	10.0
9	☐			485.57		P	7.7

164 Er [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			97.78		P	18.8
2	☐			111.11		P	6.9
3	☐			96.67		P	24.9
4	☐			121.11		P	6.9
5	☐			111.11		P	9.6
6	☐			156.67		P	14.9
7	☐			200.00		P	16.7
8	☐			301.12		P	15.1
9	☐			312.23		P	9.0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	541.13	0.0000	P	12.1
2	☐	0.100	0.097	1610.11	0.0001	P	9.0
3	☐	1.000	0.897	11277.00	0.0009	P	2.3
4	☐	50.000	47.637	564011.45	0.0445	P	1.6
5	☐	125.000	116.949	1426346.26	0.1091	P	2.4
6	☐	250.000	253.530	3032474.26	0.2364	A	1.9
7	☐	500.000	494.142	5924580.60	0.4607	A	4.3
8	☐	1000.000	1003.171	11738466.36	0.9353	A	2.7
9	☐			2987.05	0.0003	P	34.0

$$y = 9.3227\text{E-}004 * x + 4.3030\text{E-}005$$

$$R = 0.9999$$

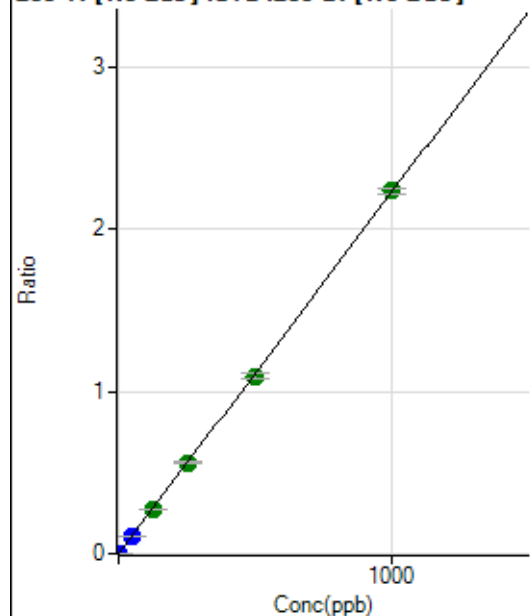
$$DL = 0.01682$$

$$BEC = 0.04616$$

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	1252.29	0.0001	P	2.5
2	☐	0.100	0.090	3643.85	0.0003	P	7.7
3	☐	1.000	0.898	26918.94	0.0021	P	2.6
4	☐	50.000	47.435	1341419.98	0.1057	P	1.6
5	☐	125.000	122.687	3573952.00	0.2733	A	2.2
6	☐	250.000	251.287	7179965.17	0.5597	A	1.5
7	☐	500.000	490.813	14057954.93	1.0930	A	3.1
8	☐	1000.000	1004.689	28082577.08	2.2373	A	1.3
9	☐			6835.31	0.0007	P	34.8

$$y = 0.0022 * x + 9.9558\text{E-}005$$

$$R = 0.9999$$

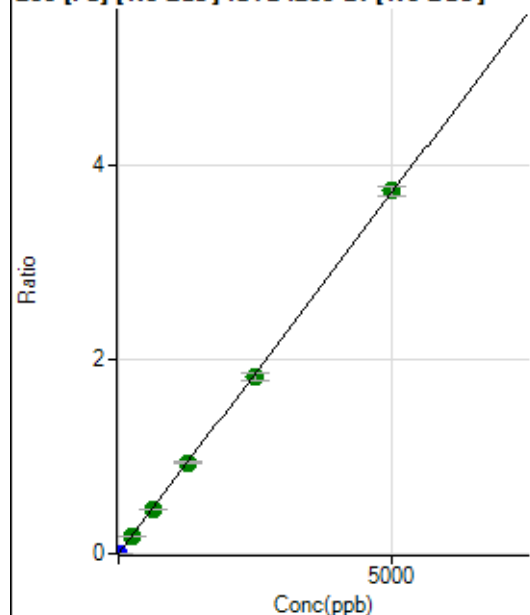
$$DL = 0.003418$$

$$BEC = 0.04471$$

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	1202.29	0.0001	P	1.8
2	☐	0.100	0.096	2017.95	0.0002	P	10.5
3	☐	1.000	0.905	9853.64	0.0008	P	1.2
4	☐	250.000	250.327	2361289.77	0.1861	A	1.2
5	☐	625.000	616.714	5994161.09	0.4584	A	2.0
6	☐	1250.000	1255.013	11963283.30	0.9326	A	2.5
7	☐	2500.000	2443.629	23350817.15	1.8159	A	4.3
8	☐	5000.000	5027.952	46895651.52	3.7362	A	2.5
9	☐			24354.70	0.0024	P	17.4

$$y = 7.4306E-004 * x + 9.5576E-005$$

$$R = 0.9999$$

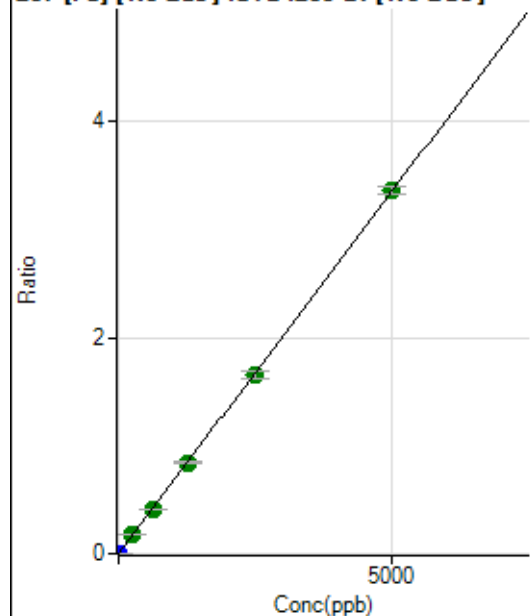
$$DL = 0.007126$$

$$BEC = 0.1286$$

Weight: <None>

Min Conc: 0

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



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1035.61	0.0001	P	7.8
2	☐	0.100	0.093	1752.35	0.0001	P	9.4
3	☐	1.000	0.879	8602.80	0.0007	P	1.3
4	☐	250.000	254.812	2165159.55	0.1707	A	1.6
5	☐	625.000	617.712	5408600.47	0.4136	A	1.8
6	☐	1250.000	1256.966	10794519.98	0.8415	A	1.9
7	☐	2500.000	2465.302	21222652.46	1.6503	A	4.1
8	☐	5000.000	5016.278	42146625.76	3.3579	A	2.2
9	☐			21001.28	0.0021	P	17.3

$$y = 6.6939E-004 * x + 8.2305E-005$$

$$R = 1.0000$$

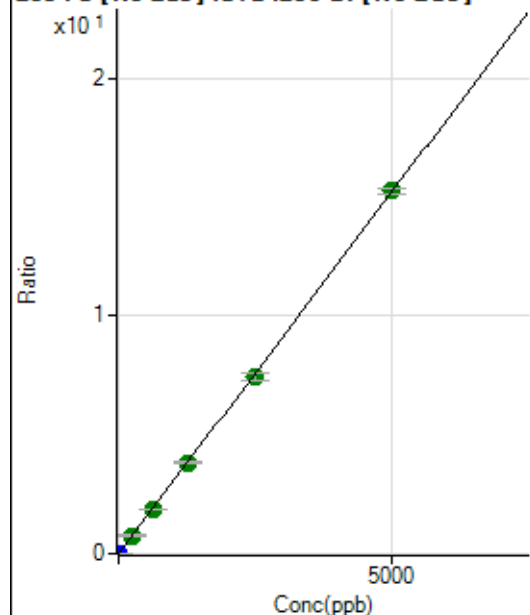
$$DL = 0.02864$$

$$BEC = 0.123$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	4852.63	0.0004	P	1.6
2	☐	0.100	0.090	7994.33	0.0007	P	8.0
3	☐	1.000	0.893	39776.63	0.0031	P	1.5
4	☐	250.000	252.582	9750843.83	0.7685	A	0.9
5	☐	625.000	617.428	24558750.95	1.8780	A	2.4
6	☐	1250.000	1256.157	49006147.33	3.8204	A	2.1
7	☐	2500.000	2452.878	95922389.96	7.4596	A	4.5
8	☐	5000.000	5022.839	191729352.4	15.2749	A	1.5
9	☐			97110.17	0.0095	P	16.9

$$y = 0.0030 * x + 3.8576E-004$$

$$R = 0.9999$$

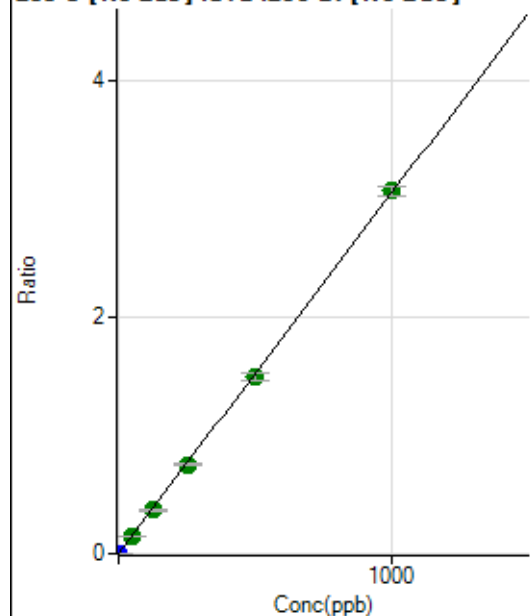
$$DL = 0.006042$$

$$BEC = 0.1269$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1327.86	0.0001	P	3.6
2	☐	0.100	0.087	4491.92	0.0004	P	5.8
3	☐	1.000	0.876	35639.76	0.0028	P	1.6
4	☐	50.000	49.053	1899602.99	0.1497	A	1.8
5	☐	125.000	120.569	4810052.08	0.3679	A	3.5
6	☐	250.000	247.052	9667211.66	0.7536	A	2.2
7	☐	500.000	489.199	19187679.99	1.4922	A	4.7
8	☐	1000.000	1006.739	38540744.43	3.0708	A	2.4
9	☐			7765.00	0.0008	P	44.5

$$y = 0.0031 * x + 1.0557E-004$$

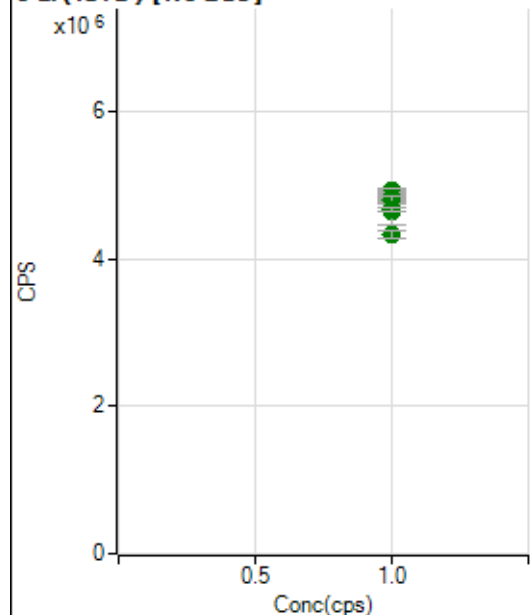
$$R = 0.9999$$

$$DL = 0.003703$$

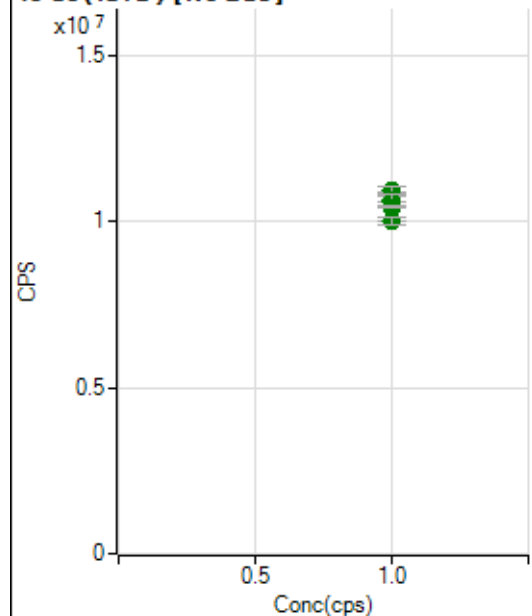
$$BEC = 0.03461$$

Weight: <None>

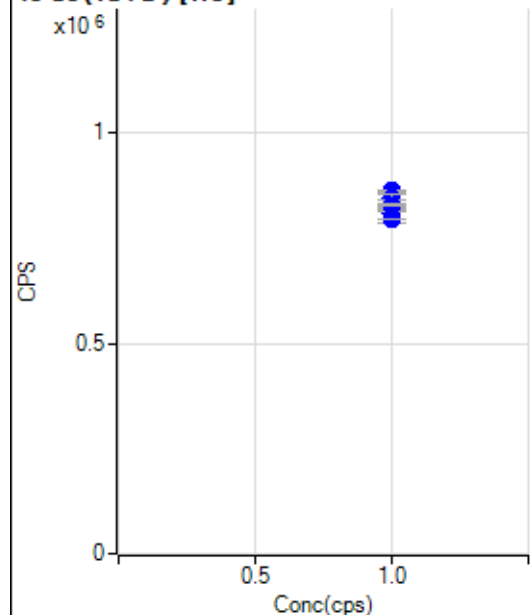
Min Conc: 0

6 Li (ISTD) [No Gas]

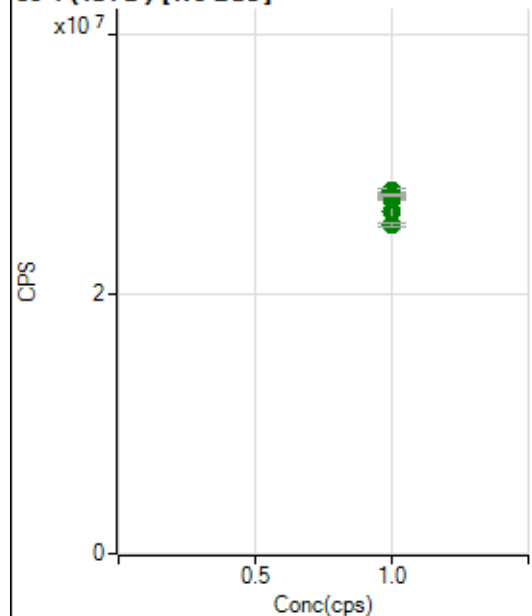
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4891012.32		A	1.5
2	☐	1.000		4638708.37		A	7.9
3	☐	1.000		4924932.95		A	0.8
4	☐	1.000		4913104.62		A	1.7
5	☐	1.000		4839592.25		A	2.8
6	☐	1.000		4821335.66		A	0.8
7	☐	1.000		4800232.64		A	2.5
8	☐	1.000		4672607.46		A	0.9
9	☐	1.000		4327523.79		A	2.2

45 Sc (ISTD) [No Gas]

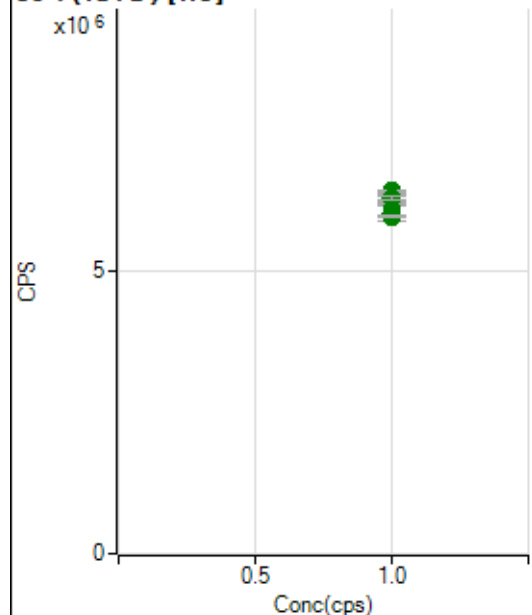
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		10797487.90		A	0.9
2	☐	1.000		10475357.41		A	8.2
3	☐	1.000		10858892.76		A	0.3
4	☐	1.000		10834601.50		A	0.9
5	☐	1.000		10928289.98		A	2.5
6	☐	1.000		10679690.95		A	1.6
7	☐	1.000		10608485.88		A	3.7
8	☐	1.000		10433226.79		A	0.6
9	☐	1.000		10026801.87		A	1.9

45 Sc (ISTD) [He]

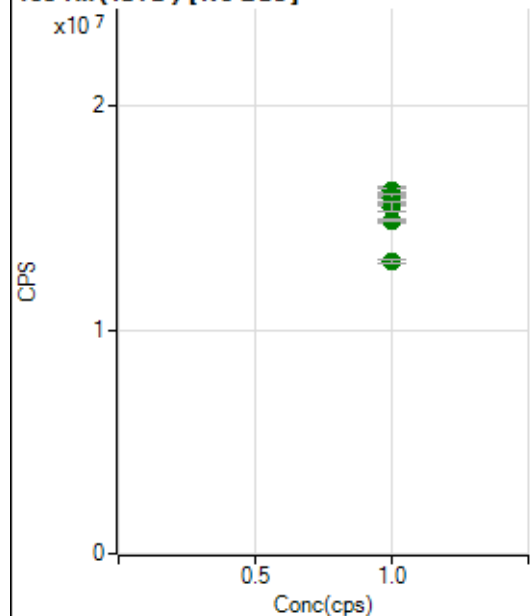
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		858670.24		P	0.4
2	☐	1.000		860916.94		P	0.2
3	☐	1.000		862206.35		P	0.7
4	☐	1.000		847263.50		P	1.6
5	☐	1.000		808913.63		P	5.5
6	☐	1.000		825491.45		P	0.2
7	☐	1.000		815135.02		P	0.6
8	☐	1.000		827916.14		P	0.6
9	☐	1.000		794530.98		P	0.2

89 Y (ISTD) [No Gas]

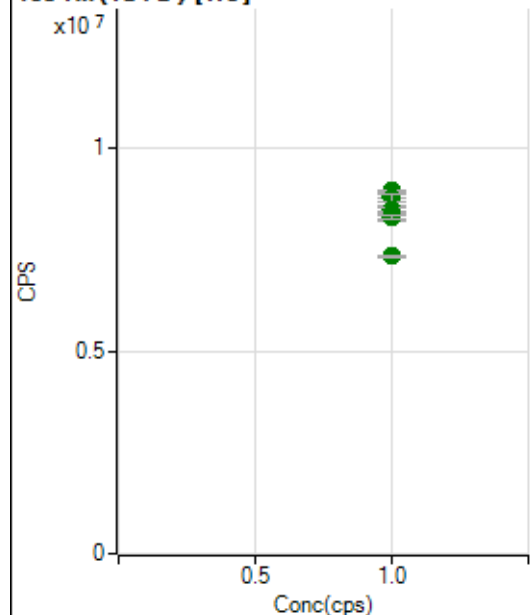
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		27393365.15		A	0.6
2	☐	1.000		26340684.33		A	9.1
3	☐	1.000		27708380.14		A	0.8
4	☐	1.000		27288792.37		A	0.5
5	☐	1.000		27943921.25		A	1.5
6	☐	1.000		27833854.59		A	1.8
7	☐	1.000		27723855.42		A	3.0
8	☐	1.000		27612914.31		A	0.9
9	☐	1.000		25260823.24		A	1.2

89 Y (ISTD) [He]

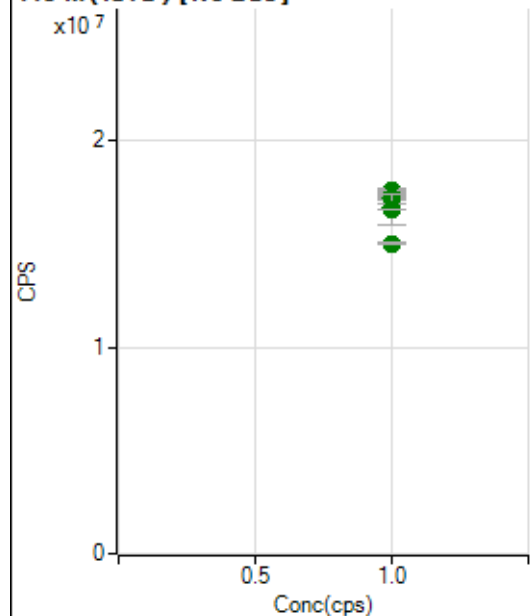
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6281149.63		A	1.1
2	☐	1.000		6335114.70		A	0.4
3	☐	1.000		6397203.58		A	0.7
4	☐	1.000		6279861.78		A	2.5
5	☐	1.000		5996337.34		A	4.8
6	☐	1.000		6178425.32		A	0.4
7	☐	1.000		6186793.66		A	0.6
8	☐	1.000		6271308.66		A	0.7
9	☐	1.000		5935183.18		A	0.6

103 Rh (ISTD) [No Gas]

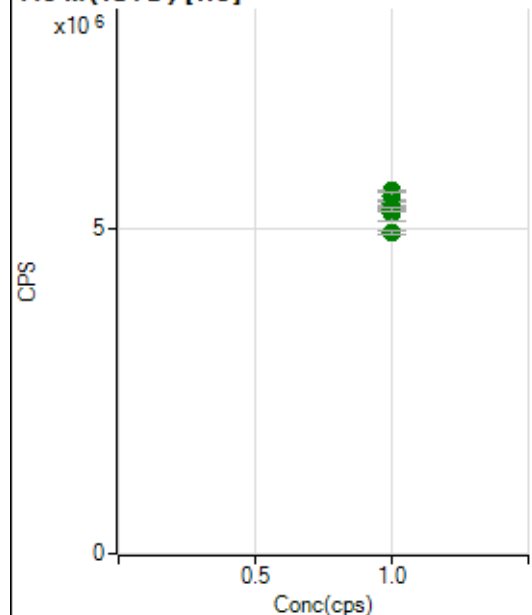
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		15982248.93		A	1.1
2	☐	1.000		15584872.27		A	10.0
3	☐	1.000		16204380.59		A	0.9
4	☐	1.000		16007929.20		A	0.1
5	☐	1.000		15903273.37		A	2.3
6	☐	1.000		15579263.79		A	0.4
7	☐	1.000		15493439.49		A	3.0
8	☐	1.000		14881762.42		A	0.5
9	☐	1.000		13058889.53		A	1.1

103 Rh (ISTD) [He]

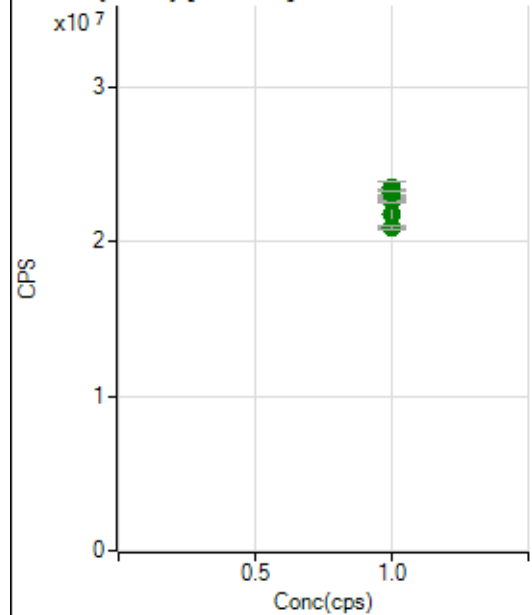
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		8827491.81		A	0.6
2	☐	1.000		8865529.31		A	0.3
3	☐	1.000		8954307.02		A	0.6
4	☐	1.000		8763815.08		A	2.3
5	☐	1.000		8397241.54		A	4.8
6	☐	1.000		8498429.46		A	1.1
7	☐	1.000		8386854.94		A	0.7
8	☐	1.000		8305370.08		A	0.8
9	☐	1.000		7342950.79		A	0.4

115 In (ISTD) [No Gas]

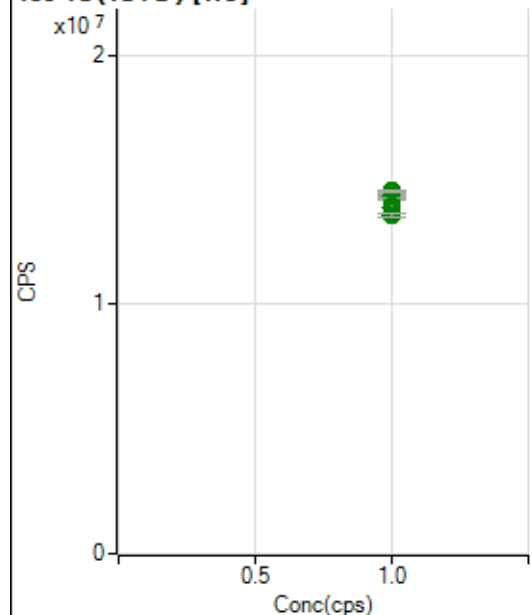
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		17336222.37		A	0.5
2	☐	1.000		16760905.24		A	9.4
3	☐	1.000		17575617.13		A	0.9
4	☐	1.000		17290126.73		A	0.9
5	☐	1.000		17438626.04		A	2.0
6	☐	1.000		17205933.98		A	0.8
7	☐	1.000		17202685.10		A	2.8
8	☐	1.000		16674902.72		A	0.1
9	☐	1.000		15029554.61		A	0.9

115 In (ISTD) [He]

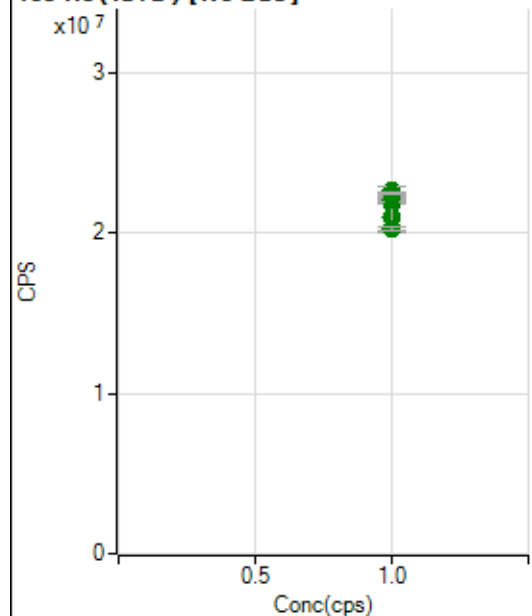
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5564969.44		A	0.6
2	☐	1.000		5563173.51		A	0.6
3	☐	1.000		5579928.87		A	0.7
4	☐	1.000		5497844.54		A	2.0
5	☐	1.000		5239536.46		A	4.8
6	☐	1.000		5380539.27		A	0.6
7	☐	1.000		5326881.70		A	0.8
8	☐	1.000		5302180.02		A	1.0
9	☐	1.000		4941239.06		A	1.0

159 Tb (ISTD) [No Gas]

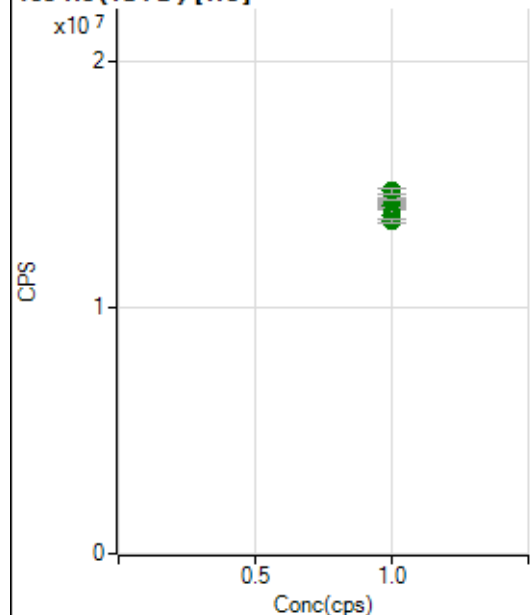
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		22813835.49		A	1.3
2	☐	1.000		21828187.03		A	8.4
3	☐	1.000		22875399.38		A	0.5
4	☐	1.000		22602882.16		A	0.1
5	☐	1.000		23186847.15		A	2.1
6	☐	1.000		23137325.77		A	1.2
7	☐	1.000		23493268.54		A	3.5
8	☐	1.000		23295046.32		A	0.4
9	☐	1.000		20946819.69		A	0.9

159 Tb (ISTD) [He]

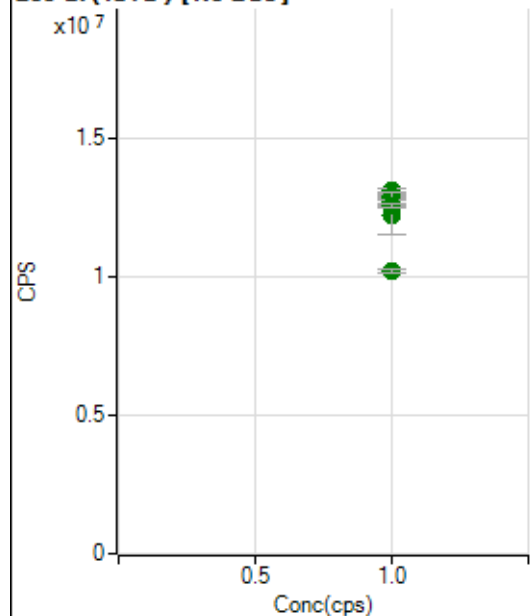
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		14313312.42		A	0.2
2	☐	1.000		14308831.04		A	0.3
3	☐	1.000		14279820.76		A	0.5
4	☐	1.000		14303216.73		A	1.7
5	☐	1.000		13891637.43		A	5.0
6	☐	1.000		14372604.09		A	0.3
7	☐	1.000		14357476.17		A	0.8
8	☐	1.000		14566733.26		A	0.9
9	☐	1.000		13579144.52		A	0.8

165 Ho (ISTD) [No Gas]

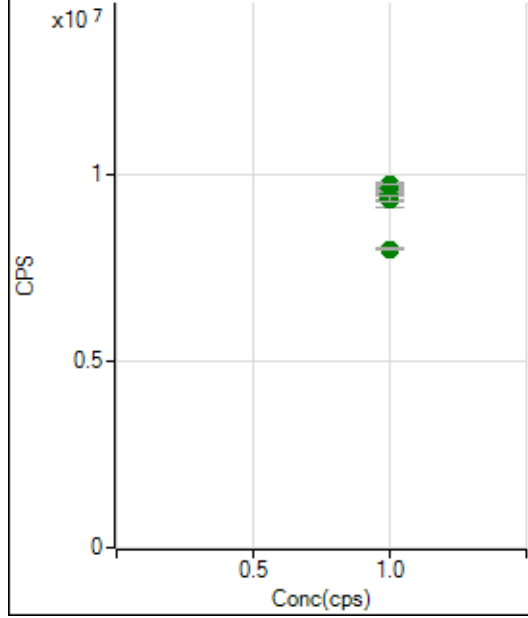
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		21864828.56		A	0.1
2	☐	1.000		20977795.66		A	8.5
3	☐	1.000		22220779.12		A	0.9
4	☐	1.000		22060745.22		A	1.1
5	☐	1.000		22323732.44		A	1.4
6	☐	1.000		22414573.56		A	0.6
7	☐	1.000		22653420.77		A	2.1
8	☐	1.000		22476394.94		A	0.6
9	☐	1.000		20312083.59		A	1.1

165 Ho (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		14056967.15		A	1.3
2	☐	1.000		14162302.85		A	1.4
3	☐	1.000		14253690.62		A	0.6
4	☐	1.000		14320697.29		A	1.7
5	☐	1.000		13767908.55		A	4.6
6	☐	1.000		14282596.59		A	0.3
7	☐	1.000		14404154.92		A	1.0
8	☐	1.000		14727812.98		A	1.3
9	☐	1.000		13487053.41		A	1.3

209 Bi (ISTD) [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		12579577.45		A	0.5
2	☐	1.000		12180958.29		A	10.7
3	☐	1.000		12828967.45		A	0.5
4	☐	1.000		12688951.34		A	1.0
5	☐	1.000		13079731.19		A	1.3
6	☐	1.000		12829807.03		A	1.4
7	☐	1.000		12867136.47		A	2.1
8	☐	1.000		12552368.98		A	1.0
9	☐	1.000		10204047.07		A	1.5

209 Bi (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		9602407.01		A	0.7
2	☐	1.000		9578507.70		A	0.7
3	☐	1.000		9718510.13		A	0.9
4	☐	1.000		9649691.87		A	1.5
5	☐	1.000		9303817.15		A	3.7
6	☐	1.000		9464756.38		A	0.9
7	☐	1.000		9372774.24		A	1.3
8	☐	1.000		9342922.92		A	1.8
9	☐	1.000		7989352.10		A	0.7

US EPA Tune Check Report

Operator Name Jaswal
Acq/Data Batch D:\Agilent\ICPMH\1\DATA\IP7082423 MS.b
Acq. Date-Time 2023-08-24 11:58:32
Report Comment ---
Instrument Name G8403A JP14410463

[No Gas]

Sensitivity

Mass	Conc. [ug/l]	Count	CPS	Resp (Required) [cps/ug/l]	Resp (Flag)	RSD%	RSD% (Required)
9		14287	142866.66			1.785	5.000
24		543219	5432194.87			2.131	5.000
25		71083	710832.44			1.844	5.000
26		81571	815709.80			1.484	5.000
59		116942	1169415.79			1.823	5.000
113		14578	145784.55			1.824	5.000
115		181912	1819115.80			1.944	5.000
206		99055	990548.24			3.342	5.000
207		82116	821162.78			4.378	5.000
208		208707	2087066.78			3.146	5.000
220		0	2.10			77.883	

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

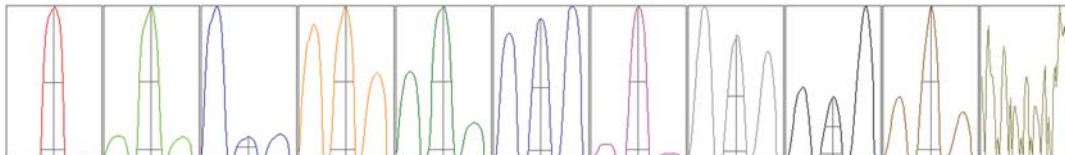
Mass	Rep#1 Count	Rep#2 Count	Rep#3 Count	Rep#4 Count	Rep#5 Count
9	14507	14410	14339	14329	13848
24	550267	550143	543737	548883	523067
25	71727	71960	71310	71643	68776
26	82079	82403	81564	82323	79486
59	118591	118581	116810	117334	113392
113	14766	14737	14551	14711	14127
115	185670	183802	181608	182233	176245
206	102402	100763	98737	99717	93655
207	86609	81919	80482	84341	77231
208	212183	214021	209323	210617	197390

US EPA Tune Check Report

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

Integration Time [sec] 0.1

Resolution/Axis



Mass	Peak Height	Axis	Axis (Required)	Axis (Flag)
9	24344.29	9.00	8.90 - 9.10	
24	945150.98	24.00	23.90 - 24.10	
25	124645.31	25.00	24.90 - 25.10	
26	141940.85	26.00	25.90 - 26.10	
59	202283.02	59.00	58.90 - 59.10	
113	28652.50	113.00	112.90 - 113.10	
115	357226.66	115.00	114.90 - 115.10	
206	201901.27	206.05	205.90 - 206.10	
207	174016.88	207.00	206.90 - 207.10	
208	435024.62	208.05	207.90 - 208.10	
220			-	

Mass	W-50%	W-5%	W-5% (Required)	W-5% (Flag)
9	0.61	0.738	0.900	
24	0.61	0.782	0.900	
25	0.61	0.745	0.900	
26	0.61	0.778	0.900	
59	0.60	0.796	0.900	
113	0.52	0.729	0.900	
115	0.53	0.721	0.900	
206	0.51	0.726	0.900	
207	0.48	0.695	0.900	
208	0.51	0.721	0.900	
220				

Integration Time [sec] 0.1

Acquisition Time [sec] 256.770000000002

Y Axis Linear

Tune Parameters

Plasma Parameters

Plasma Mode --- Nebulizer Gas 0.82 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	1.80 V	Nebulizer Pump	0.10 rps	Plasma Gas	15.0 L/min
Sample Depth	9.0 mm	S/C Temp	2 °C		

Lens Parameters

Extract 1	0.0 V	Omega Lens	9.2 V	Deflect	14.4 V
Extract 2	-145.0 V	Cell Entrance	-30 V	Plate Bias	-35 V
Omega Bias	-75 V	Cell Exit	-50 V		

Cell Parameters

Use Gas	No	3rd Gas Flow	---	Energy Discrimination	5.0 V
He Flow	0.0 mL/min	OctP Bias	-8.0 V		
H2 Flow	---	OctP RF	200 V		

QP Parameters

Mass Gain	131	Axis Gain	0.9973	QP Bias	-3.0 V
Mass Offset	130	Axis Offset	0.15		

Hardware Settings

Torch

Torch H	-1.1 mm	Torch V	1.0 mm
---------	---------	---------	--------

EM

Discriminator	4.8 mV	Analog HV	2296 V	Pulse HV	1486 V
---------------	--------	-----------	--------	----------	--------

[He]

Sensitivity

Mass	Conc. [ug/l]	Count	CPS	Resp (Required) [cps/ug/l]	Resp (Flag)	RSD%	RSD% (Required)
59		37147	371473.10			1.717	
89		402494	4024940.83			1.614	
205		81903	819026.69			1.816	

Mass	RSD% (Flag)
59	
89	
205	

Mass	Rep#1 Count	Rep#2 Count	Rep#3 Count	Rep#4 Count	Rep#5 Count
59	37582	37270	37101	36089	37695
89	405549	404686	399869	392687	409679
205	83177	81032	81828	79948	83528

Integration Time [sec] 0.1

Tune Parameters

Plasma Parameters

Plasma Mode	---	Nebulizer Gas	0.82 L/min	Dilution Gas	0.40 L/min
RF Power	1600 W	Option Gas	---	Auxiliary Gas	0.90 L/min
RF Matching	1.80 V	Nebulizer Pump	0.10 rps	Plasma Gas	15.0 L/min
Sample Depth	9.0 mm	S/C Temp	2 °C		

Lens Parameters

Extract 1	0.0 V	Omega Lens	9.6 V	Deflect	2.0 V
-----------	-------	------------	-------	---------	-------

US EPA Tune Check Report

Extract 2	-145.0 V	Cell Entrance	-40 V	Plate Bias	-60 V
Omega Bias	-75 V	Cell Exit	-60 V		

Cell Parameters

Use Gas	Yes	3rd Gas Flow	---	Energy Discrimination	5.0 V
He Flow	3.9 mL/min	OctP Bias	-18.0 V		
H2 Flow	---	OctP RF	200 V		

QP Parameters

Mass Gain	131	Axis Gain	0.9973	QP Bias	-13.0 V
Mass Offset	130	Axis Offset	0.15		

Hardware Settings

Torch

Torch H	-1.1 mm	Torch V	1.0 mm
---------	---------	---------	--------

EM

Discriminator	4.8 mV	Analog HV	2296 V	Pulse HV	1486 V
---------------	--------	-----------	--------	----------	--------