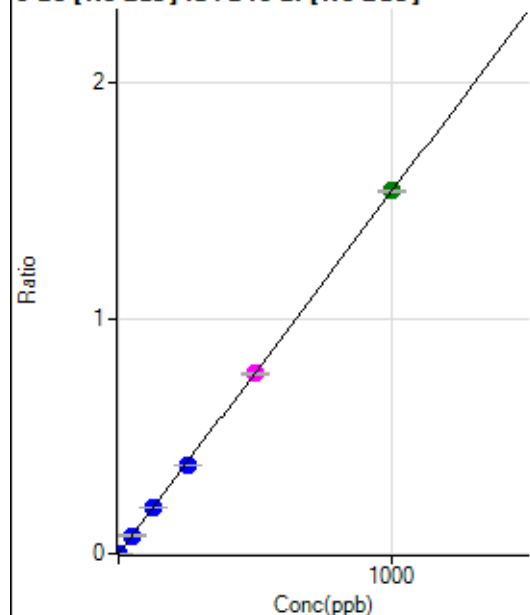


Batch Folder: D:\P8020919-MS.b\
Analysis File: P8020919-MS.batch.bin
DA Date-Time: 2019-02-09 14:46:20
Calibration Title:
Calibration Method: External Calibration
VIS Interpolation Fit:

Level	Standard Data File	Sample Name	Acq. Date-Time
1	003CALB.d	S00	2019-02-09 13:49:07
2			
3	005CALS.d	S02	2019-02-09 13:56:57
4	006CALS.d	S03	2019-02-09 14:00:48
5	007CALS.d	S04	2019-02-09 14:04:38
6	008CALS.d	S05	2019-02-09 14:08:20
7	009CALS.d	S06	2019-02-09 14:11:56
8	010CALS.d	S07	2019-02-09 14:15:26
9	011CALS.d	S08	2019-02-09 14:18:50

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	73.33	0.0001	P	56.0
2	☐	0.100					
3	☐	1.000	0.934	2014.62	0.0015	P	2.0
4	☐	50.000	50.097	103484.65	0.0771	P	1.5
5	☐	125.000	125.109	262933.81	0.1925	P	0.2
6	☐	250.000	245.931	525465.21	0.3783	P	0.7
7	☐	500.000	497.066	1031875.47	0.7645	M	1.4
8	☐	1000.000	1002.466	2085185.30	1.5417	A	0.6
9	☐			272.23	0.0002	P	20.1

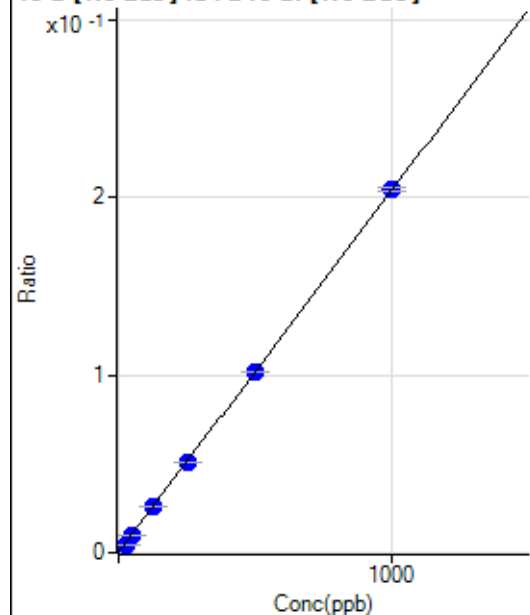
$$y = 0.0015 * x + 5.3458E-005$$

$$R = 1.0000$$

$$DL = 0.05838$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	308.35	0.0002	P	8.8
2	☐	2.500					
3	☐	25.000	21.907	6332.22	0.0047	P	2.5
4	☐	50.000	48.829	13637.53	0.0102	P	0.9
5	☐	125.000	126.429	35447.82	0.0259	P	1.0
6	☐	250.000	247.534	70269.45	0.0506	P	0.7
7	☐	500.000	497.145	136821.76	0.1014	P	0.3
8	☐	1000.000	1002.001	276010.98	0.2041	P	0.9
9	☐			4464.79	0.0034	P	2.1

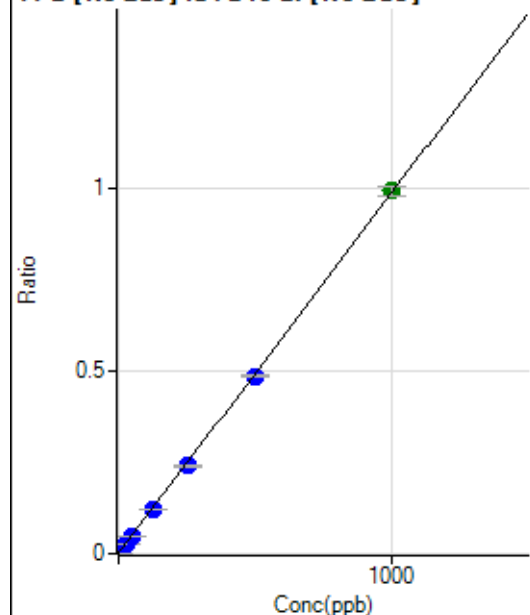
$$y = 2.0344E-004 * x + 2.2467E-004$$

$$R = 1.0000$$

$$DL = 0.2913$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1539.04	0.0011	P	4.4
2	☐	2.500					
3	☐	25.000	23.280	32543.52	0.0241	P	1.3
4	☐	50.000	49.098	66446.14	0.0495	P	1.0
5	☐	125.000	122.460	166384.48	0.1218	P	1.2
6	☐	250.000	241.899	332655.90	0.2395	P	1.6
7	☐	500.000	492.403	656372.96	0.4863	P	1.6
8	☐	1000.000	1006.229	1342474.43	0.9926	A	2.4
9	☐			21258.19	0.0161	P	2.7

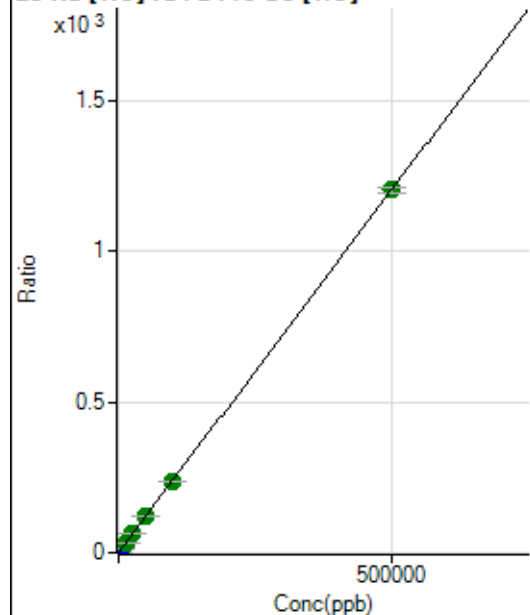
$$y = 9.8534\text{E-}004 * x + 0.0011$$

$$R = 0.9999$$

$$DL = 0.15$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	14691.42	0.2589	P	2.1
2	☐	50.000					
3	☐	500.000	478.301	79396.65	1.4097	P	1.5
4	☐	5000.000	5127.679	699149.93	12.5957	P	0.9
5	☐	12500.000	13041.014	1783075.52	31.6345	A	0.3
6	☐	25000.000	25226.131	3480904.81	60.9509	A	0.5
7	☐	50000.000	50906.012	6639730.10	122.7345	A	2.6
8	☐	100000.00	98128.191	13325119.05	236.3471	A	0.5
9	☐	500000.00	500257.67	65926657.72	1,203.836	A	1.5

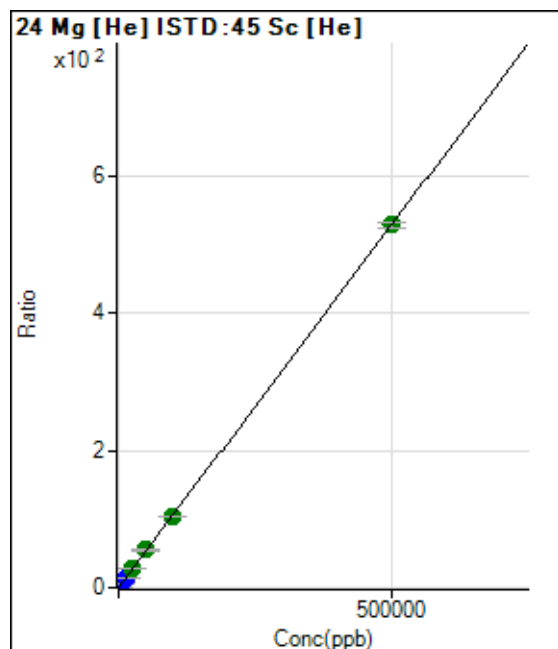
$$y = 0.0024 * x + 0.2589$$

$$R = 1.0000$$

$$DL = 6.794$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	341.69	0.0060	P	13.8
2	☐	50.000					
3	☐	500.000	503.863	30324.91	0.5384	P	0.7
4	☐	5000.000	5114.566	300279.31	5.4098	P	1.3
5	☐	12500.000	12838.190	764881.84	13.5702	P	0.4
6	☐	25000.000	25564.739	1542943.43	27.0165	A	0.7
7	☐	50000.000	51767.520	2959796.36	54.7010	A	1.5
8	☐	100000.00	98540.524	5870189.33	104.1191	A	0.7
9	☐	500000.00	500077.30	28934287.46	528.3631	A	1.8

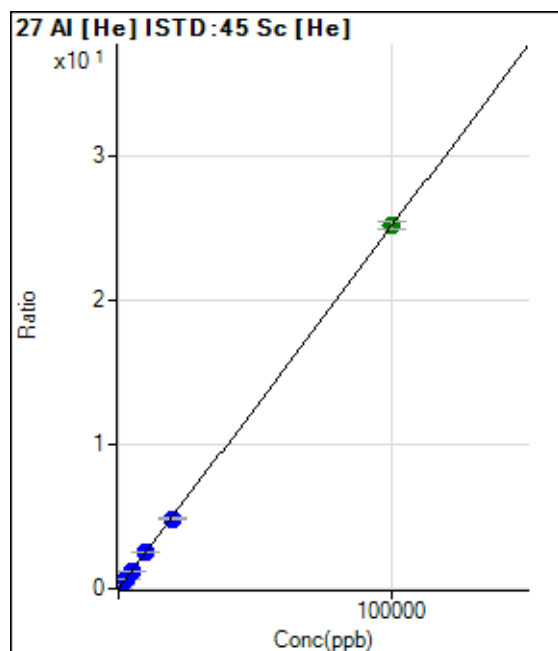
$$y = 0.0011 * x + 0.0060$$

$$R = 1.0000$$

$$DL = 2.357$$

Weight: <None>

Min Conc: 0



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	50.85	0.0009	P	29.6
2	☐	2.000					
3	☐	20.000	17.674	300.92	0.0053	P	5.1
4	☐	1000.000	996.737	13960.43	0.2515	P	1.8
5	☐	2500.000	2482.840	35238.16	0.6252	P	0.7
6	☐	5000.000	4883.347	70175.49	1.2288	P	0.5
7	☐	10000.000	9967.630	135648.47	2.5072	P	1.9
8	☐	20000.000	19334.834	274140.40	4.8624	P	0.6
9	☐	100000.00	100142.56	1378885.02	25.1807	A	2.3

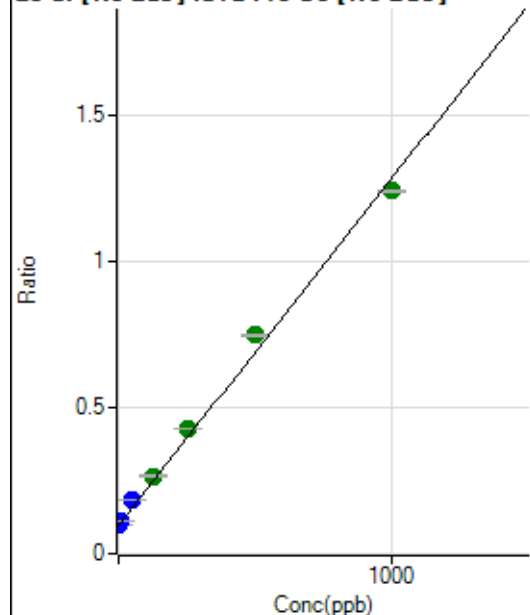
$$y = 2.5144\text{E-}004 * x + 8.9802\text{E-}004$$

$$R = 1.0000$$

$$DL = 3.166$$

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	420188.34	0.0973	P	0.5
2	☐	1.000					
3	☐	10.000	14.086	477390.69	0.1140	P	1.2
4	☐	50.000	73.838	762946.76	0.1849	P	0.9
5	☐	125.000	142.218	1137856.70	0.2661	A	1.2
6	☐	250.000	277.544	1830086.93	0.4268	A	0.7
7	☐	500.000	549.659	3145200.83	0.7499	A	1.0
8	☐	1000.000	964.899	5291366.70	1.2429	A	0.7
9	☐			735513.81	0.1783	P	5.7

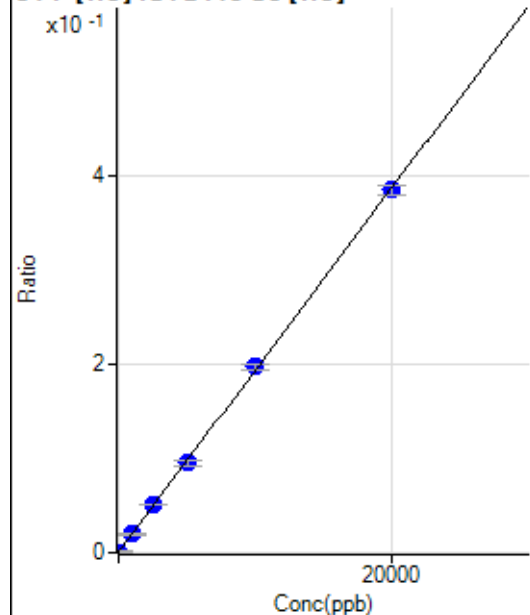
$$y = 0.0012 * x + 0.0973$$

$$R = 0.9977$$

$$DL = 1.195$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	-21.780	8.33	0.0001	P	99.7
2	☐	0.000					
3	☐	0.000	21.780	55.56	0.0010	P	85.9
4	☐	1000.000	1002.226	1108.43	0.0200	P	7.1
5	☐	2500.000	2622.542	2892.11	0.0513	P	1.3
6	☐	5000.000	4907.838	5454.11	0.0955	P	6.5
7	☐	10000.000	10190.825	10696.14	0.1977	P	3.5
8	☐	20000.000	19912.199	21753.52	0.3858	P	2.7
9	☐			30.56	0.0006	P	14.7

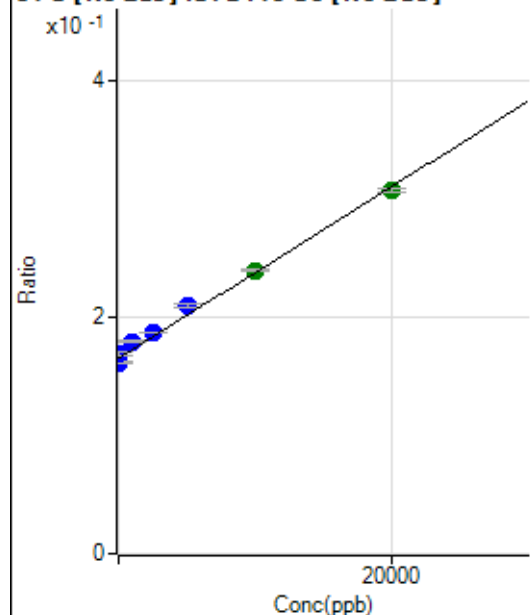
$$y = 1.9348E-005 * x + 5.6905E-004$$

$$R = 0.9999$$

$$DL = 77.4$$

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	-510.424	698588.73	0.1617	P	0.5
2	☐	0.000					
3	☐	0.000	510.424	708282.88	0.1691	P	1.6
4	☐	1000.000	1982.774	741893.50	0.1798	P	0.8
5	☐	2500.000	3035.286	801604.50	0.1875	P	0.4
6	☐	5000.000	6116.753	899853.64	0.2099	P	1.5
7	☐	10000.000	10201.253	1004744.09	0.2395	A	0.6
8	☐	20000.000	19504.136	1307533.91	0.3071	A	1.0
9	☐			630275.47	0.1527	P	4.3

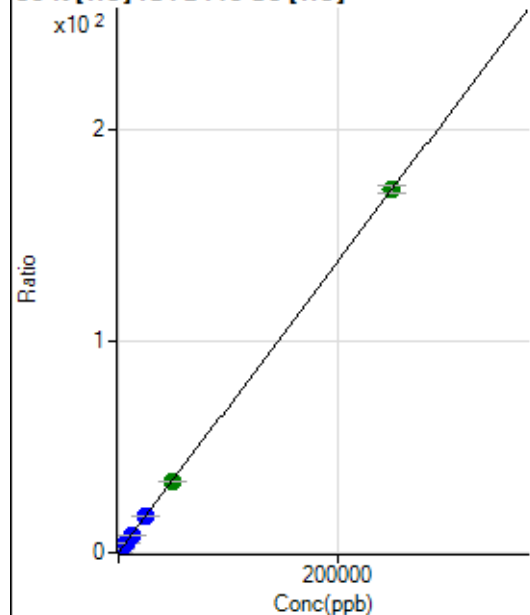
$$y = 7.2648\text{E-}006 * x + 0.1654$$

$$R = 0.9966$$

$$DL = 731.7$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	6918.69	0.1220	P	4.4
2	☐	50.000					
3	☐	500.000	449.883	24191.18	0.4295	P	1.1
4	☐	2500.000	2528.249	102712.26	1.8504	P	0.7
5	☐	6250.000	6280.198	248876.46	4.4154	P	1.1
6	☐	12500.000	12253.768	485397.20	8.4993	P	0.5
7	☐	25000.000	24965.071	930004.59	17.1894	P	2.0
8	☐	50000.000	49311.581	1907545.90	33.8340	A	0.8
9	☐	250000.00	250152.55	9371734.67	171.1394	A	2.1

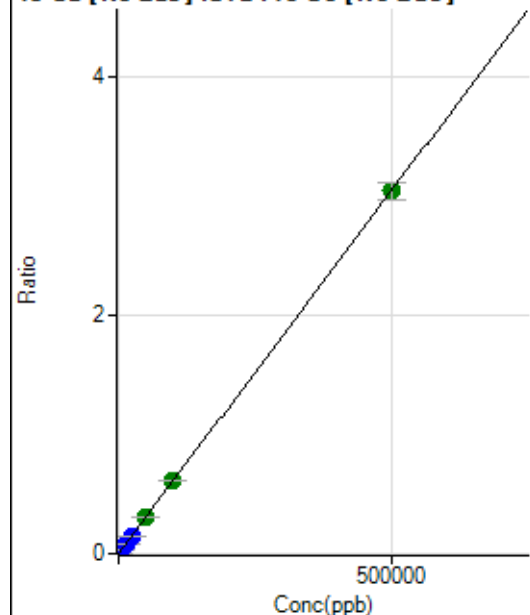
$$y = 6.8365\text{E-}004 * x + 0.1220$$

$$R = 1.0000$$

$$DL = 23.42$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	590.02	0.0001	P	8.0
2	☐	50.000					
3	☐	500.000	478.056	12757.07	0.0030	P	2.1
4	☐	5000.000	5108.874	128825.15	0.0312	P	1.0
5	☐	12500.000	12603.300	328522.67	0.0768	P	0.5
6	☐	25000.000	24899.008	650289.67	0.1517	P	1.5
7	☐	50000.000	51264.624	1309141.10	0.3121	A	0.8
8	☐	100000.00	100746.80	2610923.78	0.6132	A	0.9
9	☐	500000.00	499725.57	12547547.87	3.0413	A	4.7

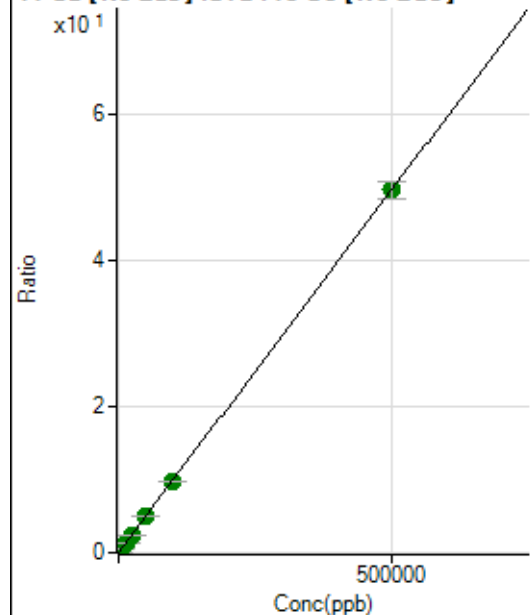
$$y = 6.0856E-006 * x + 1.3657E-004$$

$$R = 1.0000$$

$$DL = 5.354$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	50077.98	0.0116	P	1.4
2	☐	50.000					
3	☐	500.000	481.164	248193.41	0.0593	P	0.8
4	☐	5000.000	5198.923	2172657.54	0.5267	A	1.8
5	☐	12500.000	12550.951	5366209.37	1.2551	A	0.4
6	☐	25000.000	24695.482	10540994.85	2.4583	A	0.8
7	☐	50000.000	49873.146	20773957.61	4.9527	A	0.6
8	☐	100000.00	99012.122	41812294.65	9.8211	A	0.1
9	☐	500000.00	500222.24	204497181.4	49.5704	A	5.0

$$y = 9.9074E-005 * x + 0.0116$$

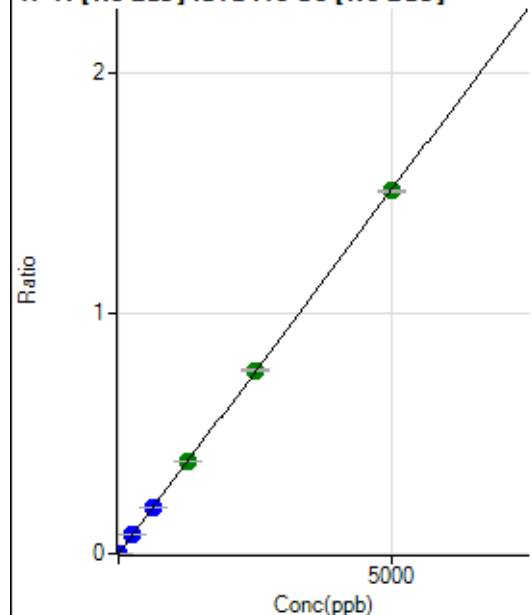
$$R = 1.0000$$

$$DL = 5.035$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	288.91	0.0001	P	32.2
2	☐	0.500					
3	☐	5.000	4.920	6529.61	0.0016	P	3.5
4	☐	250.000	252.466	316184.44	0.0766	P	0.9
5	☐	625.000	623.325	808655.07	0.1891	P	0.2
6	☐	1250.000	1266.790	1647843.59	0.3843	A	1.1
7	☐	2500.000	2520.020	3206372.34	0.7644	A	0.7
8	☐	5000.000	4985.879	6438566.77	1.5123	A	0.5
9	☐			997.30	0.0002	P	21.7

$$y = 3.0331\text{E-}004 * x + 6.6937\text{E-}005$$

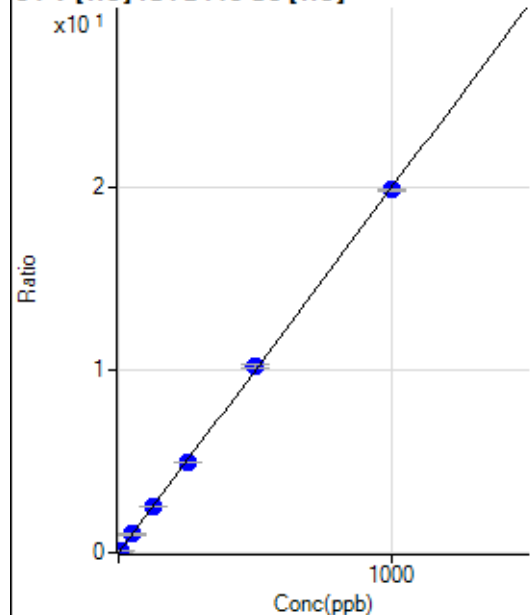
$$R = 1.0000$$

$$DL = 0.2129$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	10.00	0.0002	P	88.5
2	☐	0.500					
3	☐	5.000	5.107	5753.50	0.1021	P	2.0
4	☐	50.000	50.578	56060.65	1.0100	P	2.5
5	☐	125.000	126.071	141887.77	2.5173	P	0.5
6	☐	250.000	249.253	284219.31	4.9767	P	0.7
7	☐	500.000	511.915	553020.70	10.2210	P	1.7
8	☐	1000.000	994.066	1118997.43	19.8476	P	0.4
9	☐			166.67	0.0030	P	5.5

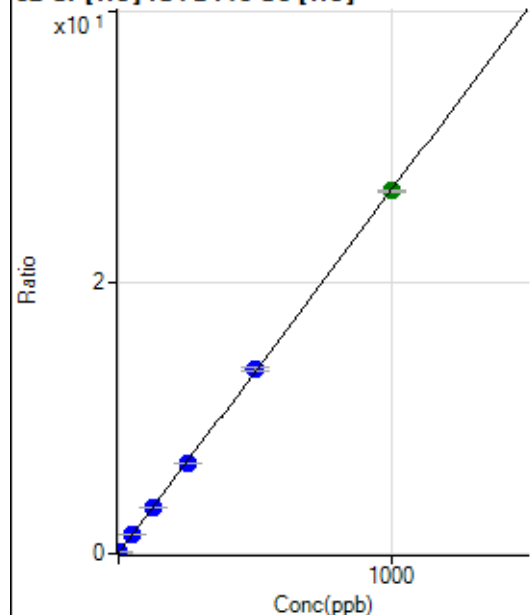
$$y = 0.0200 * x + 1.7616\text{E-}004$$

$$R = 0.9999$$

$$DL = 0.02342$$

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	1789.04	0.0315	P	3.1
2	☐	0.200					
3	☐	2.000	1.835	4548.61	0.0808	P	2.3
4	☐	50.000	50.577	77075.14	1.3886	P	1.5
5	☐	125.000	126.305	192798.12	3.4205	P	0.2
6	☐	250.000	246.872	380102.32	6.6556	P	0.3
7	☐	500.000	505.890	736094.86	13.6056	P	2.1
8	☐	1000.000	997.645	1510983.40	26.8004	A	0.5
9	☐			11408.14	0.2083	P	1.9

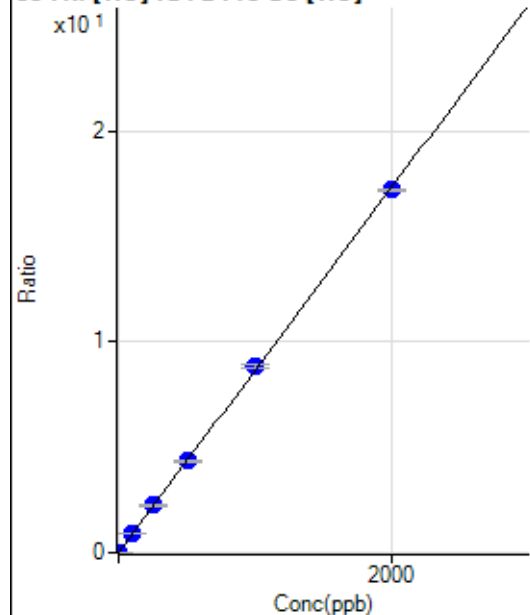
$$y = 0.0268 * x + 0.0315$$

$$R = 1.0000$$

$$DL = 0.1101$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	153.34	0.0027	P	23.5
2	☐	0.100					
3	☐	1.000	0.938	608.92	0.0108	P	5.6
4	☐	100.000	103.209	49715.03	0.8956	P	0.5
5	☐	250.000	258.093	126003.13	2.2355	P	0.8
6	☐	500.000	501.103	247728.92	4.3378	P	0.7
7	☐	1000.000	1022.328	478641.35	8.8469	P	2.1
8	☐	2000.000	1987.388	969485.00	17.1958	P	0.3
9	☐			3503.84	0.0640	P	4.3

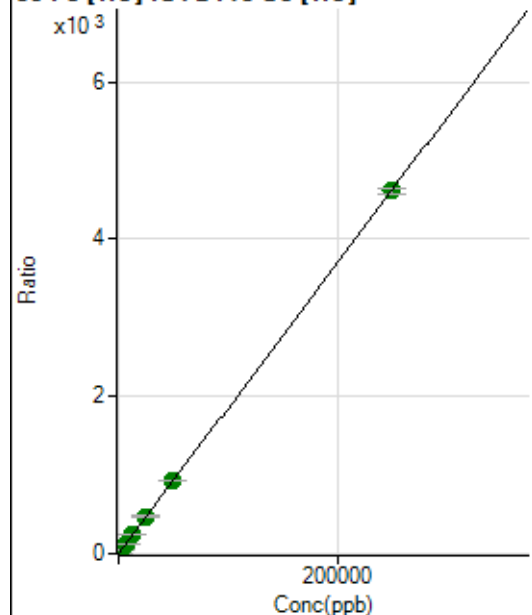
$$y = 0.0087 * x + 0.0027$$

$$R = 0.9999$$

$$DL = 0.2195$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	5301.17	0.0934	P	2.2
2	☐	5.000					
3	☐	50.000	53.122	60490.40	1.0740	P	1.2
4	☐	2500.000	2620.299	2689638.17	48.4603	A	2.3
5	☐	6250.000	6475.459	6742413.58	119.6210	A	0.2
6	☐	12500.000	12642.503	13332565.34	233.4556	A	0.8
7	☐	25000.000	25775.972	25746348.49	475.8804	A	2.1
8	☐	50000.000	49786.976	51817556.71	919.0886	A	0.4
9	☐	250000.00	249951.04	252670198.2	4,613.826	A	1.5

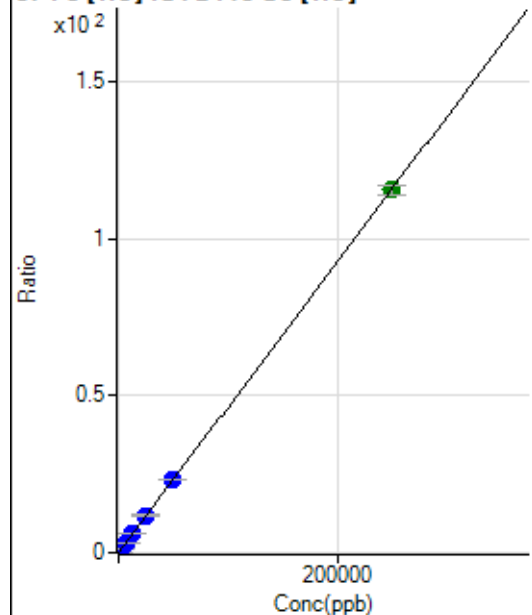
$$y = 0.0185 * x + 0.0934$$

$$R = 1.0000$$

$$DL = 0.3305$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	170.38	0.0030	P	6.8
2	☐	5.000					
3	☐	50.000	49.993	1472.34	0.0261	P	5.7
4	☐	2500.000	2598.131	66895.45	1.2051	P	0.8
5	☐	6250.000	6451.288	168415.51	2.9880	P	0.9
6	☐	12500.000	12620.909	333668.91	5.8426	P	0.5
7	☐	25000.000	25809.203	646211.04	11.9447	P	2.4
8	☐	50000.000	49988.704	1304184.25	23.1324	P	0.5
9	☐	250000.00	249909.28	6331933.30	115.6340	A	2.5

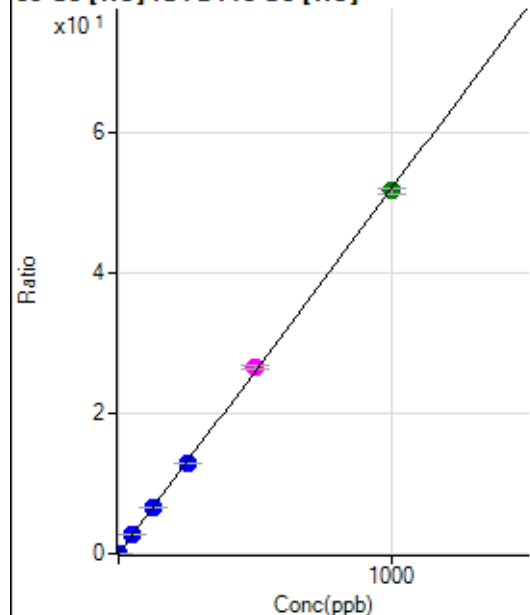
$$y = 4.6269E-004 * x + 0.0030$$

$$R = 1.0000$$

$$DL = 1.317$$

Weight: <None>

Min Conc: 0

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

	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	305.56	0.0054	P	23.1
2	☐	0.100					
3	☐	1.000	0.997	3228.20	0.0573	P	3.3
4	☐	50.000	51.070	147972.36	2.6658	P	0.8
5	☐	125.000	127.708	375289.88	6.6582	P	0.3
6	☐	250.000	249.427	742367.73	12.9990	P	0.5
7	☐	500.000	511.347	1441668.29	26.6434	M	1.3
8	☐	1000.000	994.078	2919906.10	51.7907	A	1.3
9	☐			32584.87	0.5950	P	1.6

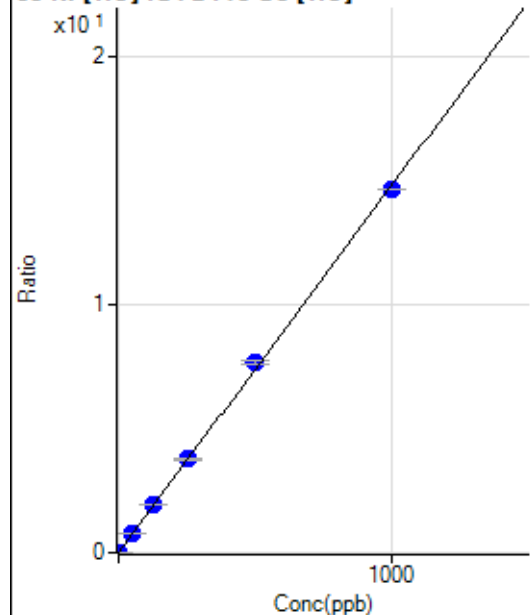
$$y = 0.0521 * x + 0.0054$$

$$R = 0.9999$$

$$DL = 0.07167$$

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	98.89	0.0017	P	9.0
2	☐	0.100					
3	☐	1.000	1.063	982.27	0.0174	P	2.5
4	☐	50.000	53.280	43770.94	0.7886	P	1.8
5	☐	125.000	132.475	110374.99	1.9582	P	0.5
6	☐	250.000	254.740	214953.85	3.7639	P	0.7
7	☐	500.000	518.591	414441.00	7.6606	P	2.4
8	☐	1000.000	988.421	823103.22	14.5994	P	0.1
9	☐			9884.78	0.1805	P	3.5

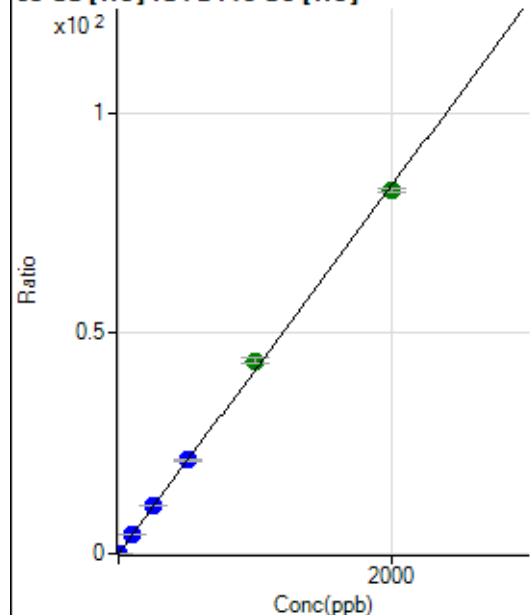
$$y = 0.0148 * x + 0.0017$$

$$R = 0.9997$$

$$DL = 0.03187$$

Weight: <None>

Min Conc: 0

⁶³Cu [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	670.03	0.0118	P	10.9
2	☐	0.200					
3	☐	2.000	2.021	5416.71	0.0962	P	3.5
4	☐	100.000	104.614	243018.00	4.3782	P	1.2
5	☐	250.000	261.095	614915.65	10.9096	P	0.2
6	☐	500.000	508.369	1212441.31	21.2304	P	0.8
7	☐	1000.000	1047.845	2366346.44	43.7474	A	3.4
8	☐	2000.000	1972.368	4642012.67	82.3357	A	1.1
9	☐			5961.38	0.1088	P	1.4

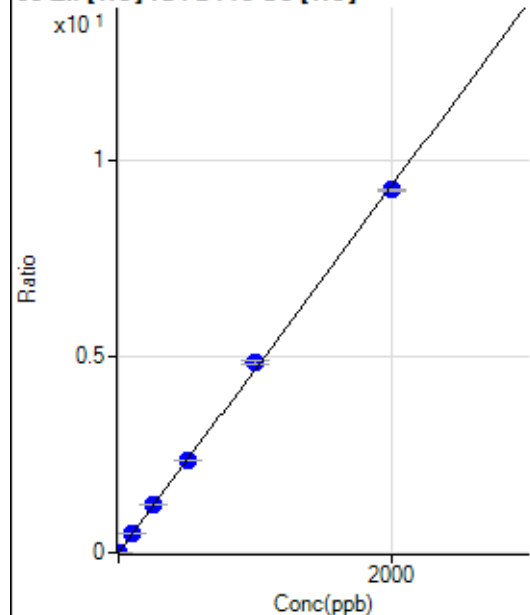
$$y = 0.0417 * x + 0.0118$$

$$R = 0.9996$$

$$DL = 0.09222$$

Weight: <None>

Min Conc: 0

⁶⁶Zn [He] ISTD:45 Sc [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	173.34	0.0031	P	16.0
2	☐	0.200					
3	☐	2.000	1.974	691.14	0.0123	P	0.9
4	☐	100.000	105.596	27536.47	0.4961	P	0.6
5	☐	250.000	261.120	68891.21	1.2222	P	1.4
6	☐	500.000	507.759	135569.05	2.3738	P	0.1
7	☐	1000.000	1035.218	261655.85	4.8365	P	2.4
8	☐	2000.000	1978.782	521057.70	9.2420	P	0.6
9	☐			2452.48	0.0448	P	4.3

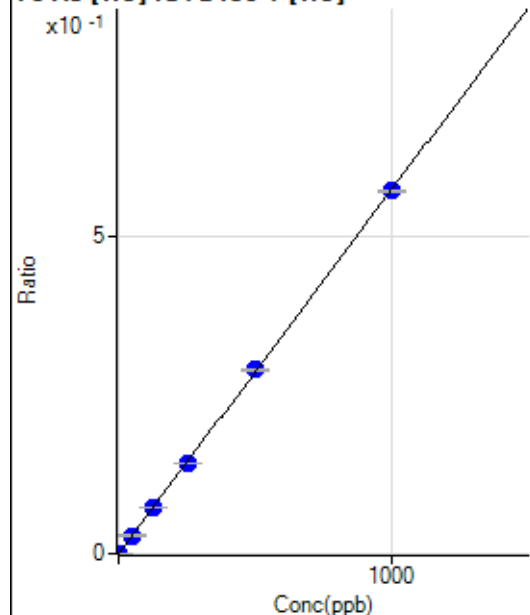
$$y = 0.0047 * x + 0.0031$$

$$R = 0.9998$$

$$DL = 0.3135$$

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	8.02	0.0000	P	75.1
2	☐	0.100					
3	☐	1.000	0.858	179.01	0.0005	P	13.3
4	☐	50.000	49.670	9749.19	0.0285	P	2.0
5	☐	125.000	125.585	25033.78	0.0720	P	0.9
6	☐	250.000	247.038	49859.28	0.1416	P	0.4
7	☐	500.000	507.005	97169.19	0.2906	P	1.1
8	☐	1000.000	997.181	196545.72	0.5716	P	0.4
9	☐			272.85	0.0008	P	8.0

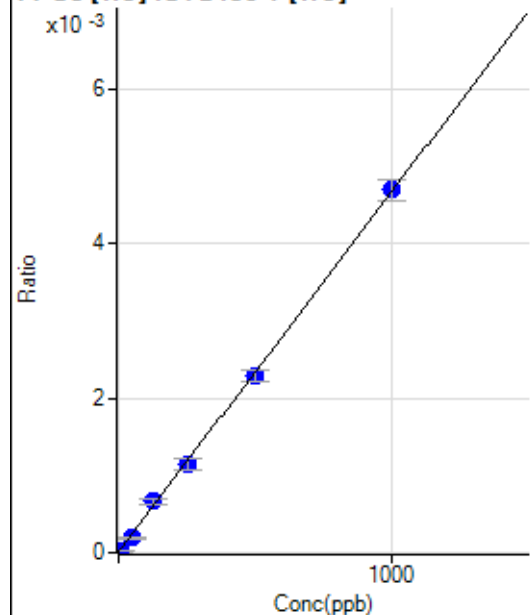
$$y = 5.7315\text{E-}004 * x + 2.2902\text{E-}005$$

$$R = 1.0000$$

$$DL = 0.09008$$

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	2.22	0.0000	P	86.6
2	☐	0.500					
3	☐	5.000	2.076	5.56	0.0000	P	34.7
4	☐	50.000	38.981	64.45	0.0002	P	23.5
5	☐	125.000	140.657	230.01	0.0007	P	9.4
6	☐	250.000	244.459	403.35	0.0011	P	14.9
7	☐	500.000	489.174	764.48	0.0023	P	5.7
8	☐	1000.000	1005.407	1613.46	0.0047	P	5.8
9	☐			1.11	0.0000	P	173.

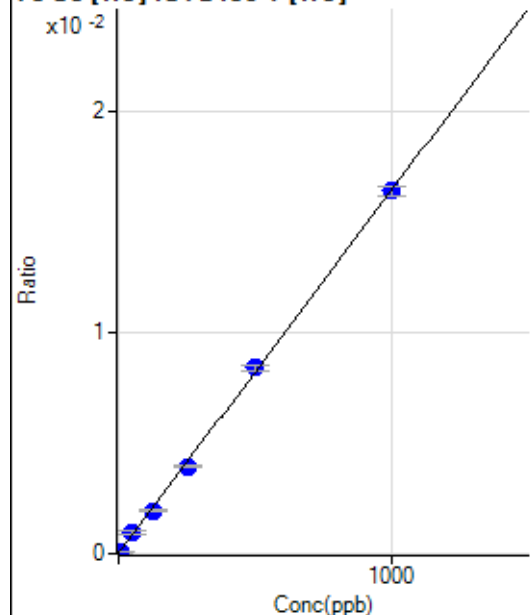
$$y = 4.6604\text{E-}006 * x + 6.3048\text{E-}006$$

$$R = 0.9997$$

$$DL = 3.516$$

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	5.56	0.0000	P	57.7
2	☐	0.500					
3	☐	5.000	5.307	35.80	0.0001	P	23.0
4	☐	50.000	56.674	324.08	0.0009	P	11.6
5	☐	125.000	117.967	679.04	0.0020	P	5.5
6	☐	250.000	237.782	1380.33	0.0039	P	2.3
7	☐	500.000	510.319	2808.34	0.0084	P	3.9
8	☐	1000.000	998.439	5643.79	0.0164	P	2.5
9	☐			7.41	0.0000	P	107.

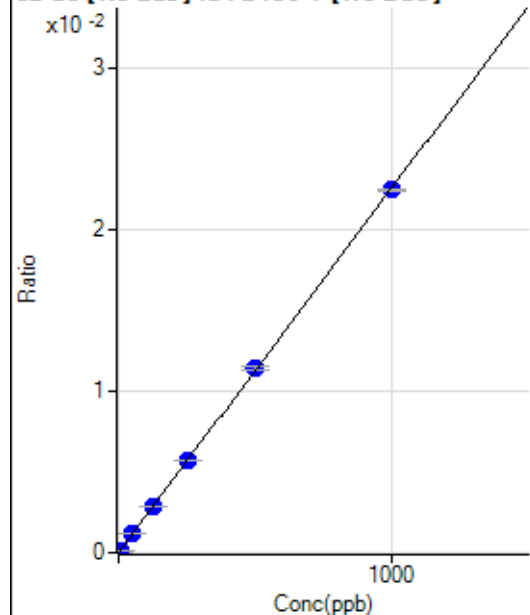
$$y = 1.6421\text{E-}005 * x + 1.5787\text{E-}005$$

$$R = 0.9998$$

$$DL = 1.664$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	50.12	0.0000	P	125.
2	☐	0.500					
3	☐	5.000	4.802	740.02	0.0001	P	13.2
4	☐	50.000	52.033	7409.27	0.0012	P	0.7
5	☐	125.000	127.998	18805.04	0.0029	P	0.4
6	☐	250.000	251.825	37393.65	0.0057	P	0.3
7	☐	500.000	506.619	73331.55	0.0114	P	1.3
8	☐	1000.000	995.759	148035.69	0.0225	P	0.6
9	☐			14.40	0.0000	P	254.

$$y = 2.2540\text{E-}005 * x + 7.7256\text{E-}006$$

$$R = 1.0000$$

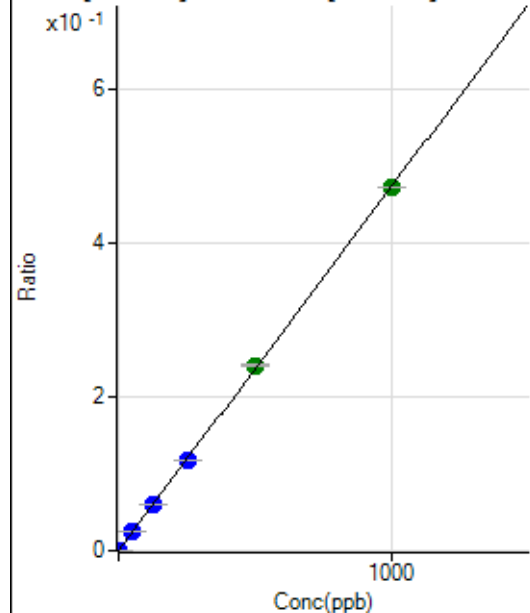
$$DL = 1.293$$

Weight: <None>

Min Conc: 0

83 Kr [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			784.48		P	6.7
2	☐						
3	☐			841.15		P	11.5
4	☐			802.26		P	1.7
5	☐			808.93		P	4.8
6	☐			780.04		P	4.9
7	☐			812.26		P	5.7
8	☐			856.71		P	2.2
9	☐			888.93		P	4.0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	1200.11	0.0002	P	1.8
2	☐	0.100					
3	☐	1.000	0.887	3856.28	0.0006	P	3.7
4	☐	50.000	50.899	152323.11	0.0243	P	0.8
5	☐	125.000	126.049	388945.83	0.0598	P	0.7
6	☐	250.000	246.641	769083.34	0.1169	P	0.5
7	☐	500.000	508.493	1545554.51	0.2408	A	1.5
8	☐	1000.000	996.417	3110203.63	0.4717	A	0.1
9	☐			11822.33	0.0019	P	5.0

$$y = 4.7321E-004 * x + 1.8404E-004$$

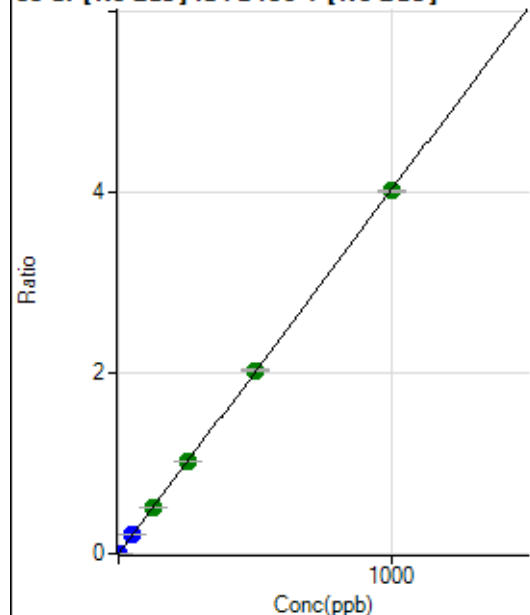
$$R = 0.9999$$

$$DL = 0.02109$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	300.02	0.0000	P	16.9
2	☐	0.100					
3	☐	1.000	0.811	21114.33	0.0033	P	1.0
4	☐	50.000	51.638	1302916.77	0.2076	P	0.0
5	☐	125.000	128.596	3360337.45	0.5169	A	0.2
6	☐	250.000	252.186	6668973.76	1.0137	A	0.3
7	☐	500.000	503.587	12990248.03	2.0241	A	1.1
8	☐	1000.000	997.129	26425708.23	4.0078	A	0.4
9	☐			92093.94	0.0148	P	5.7

$$y = 0.0040 * x + 4.6006E-005$$

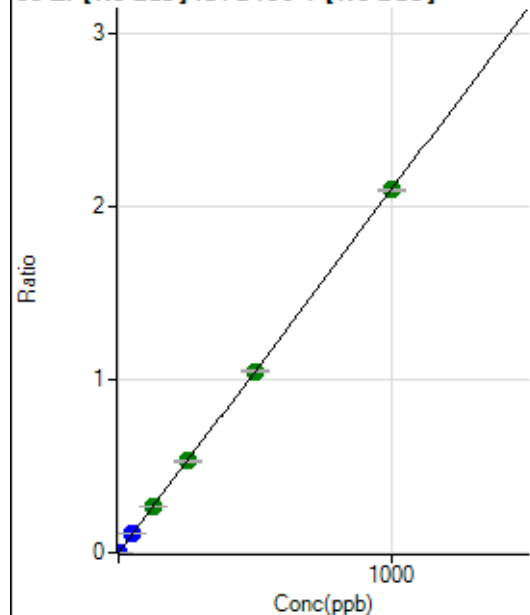
$$R = 1.0000$$

$$DL = 0.005794$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	508.37	0.0001	P	4.6
2	☐	0.100					
3	☐	1.000	0.978	13585.10	0.0021	P	3.0
4	☐	50.000	51.308	675199.29	0.1076	P	0.4
5	☐	125.000	128.574	1751825.80	0.2695	A	1.3
6	☐	250.000	252.677	3483393.83	0.5295	A	1.4
7	☐	500.000	500.209	6727205.66	1.0481	A	0.8
8	☐	1000.000	998.714	13797971.14	2.0926	A	0.3
9	☐			3161.62	0.0005	P	7.3

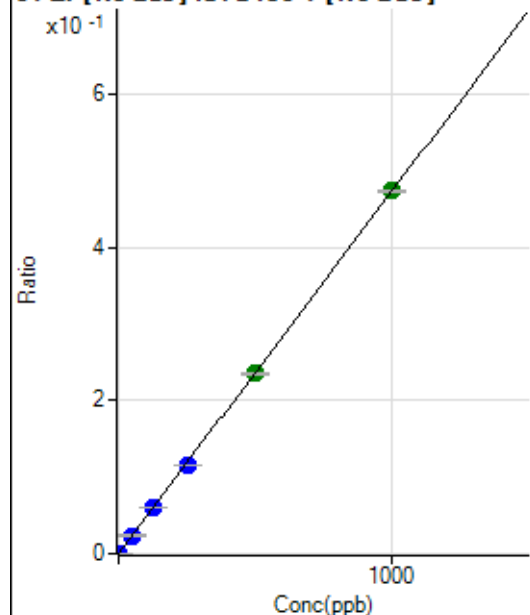
$$y = 0.0021 * x + 7.7951E-005$$

$$R = 1.0000$$

$$DL = 0.005187$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	141.67	0.0000	P	6.2
2	☐	0.100					
3	☐	1.000	0.915	2900.44	0.0005	P	3.3
4	☐	50.000	50.412	149539.08	0.0238	P	1.1
5	☐	125.000	125.060	384038.11	0.0591	P	0.3
6	☐	250.000	246.166	764875.43	0.1163	P	0.6
7	☐	500.000	496.878	1505989.54	0.2346	A	0.7
8	☐	1000.000	1002.492	3121351.50	0.4734	A	0.8
9	☐			727.84	0.0001	P	7.7

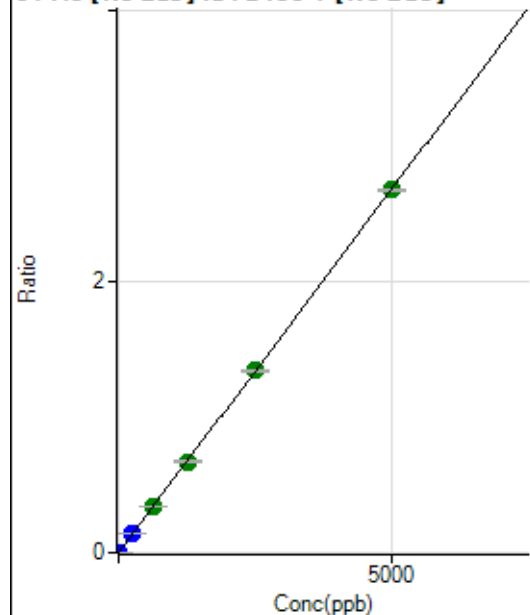
$$y = 4.7220\text{E-}004 * x + 2.1728\text{E-}005$$

$$R = 1.0000$$

$$DL = 0.008528$$

Weight: <None>

Min Conc: 0

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	263.90	0.0000	P	2.4
2	☐	0.500					
3	☐	5.000	4.739	16491.25	0.0026	P	1.2
4	☐	250.000	256.192	862655.15	0.1374	P	0.5
5	☐	625.000	647.414	2257595.32	0.3473	A	0.2
6	☐	1250.000	1254.150	4425625.88	0.6727	A	0.8
7	☐	2500.000	2502.520	8615355.57	1.3423	A	0.5
8	☐	5000.000	4994.592	17663185.46	2.6789	A	0.7
9	☐			6335.14	0.0010	P	0.9

$$y = 5.3635\text{E-}004 * x + 4.0472\text{E-}005$$

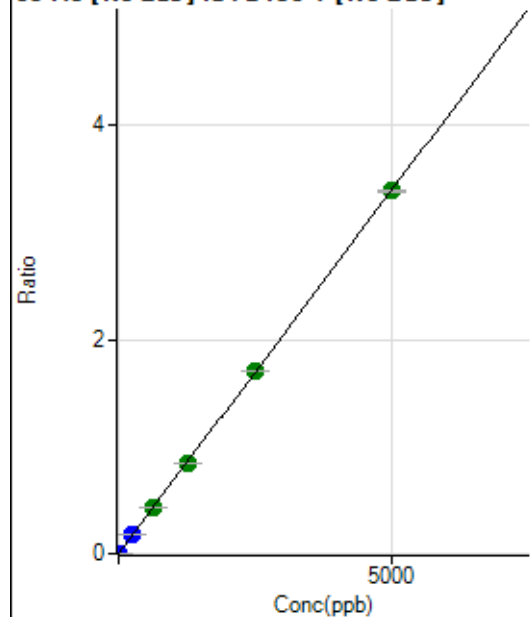
$$R = 1.0000$$

$$DL = 0.005365$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	144.45	0.0000	P	15.0
2	☐	0.500					
3	☐	5.000	4.657	20310.37	0.0032	P	3.3
4	☐	250.000	255.461	1087361.69	0.1732	P	0.3
5	☐	625.000	640.265	2822458.85	0.4342	A	1.4
6	☐	1250.000	1247.883	5567240.75	0.8462	A	0.4
7	☐	2500.000	2508.836	10919168.39	1.7013	A	0.2
8	☐	5000.000	4993.931	22328185.57	3.3864	A	0.7
9	☐			8956.15	0.0014	P	0.8

$$y = 6.7810E-004 * x + 2.2160E-005$$

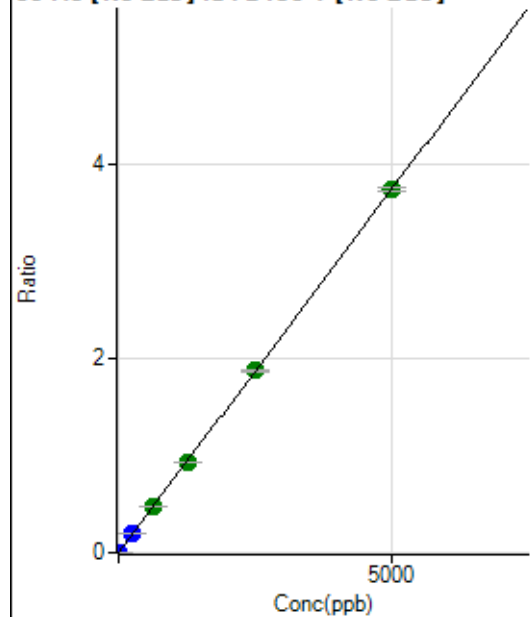
$$R = 1.0000$$

$$DL = 0.01467$$

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	227.79	0.0000	P	9.8
2	☐	0.500					
3	☐	5.000	4.733	22872.86	0.0036	P	1.4
4	☐	250.000	254.840	1198458.57	0.1910	P	0.7
5	☐	625.000	639.903	3116639.78	0.4794	A	0.3
6	☐	1250.000	1244.318	6133044.93	0.9322	A	1.0
7	☐	2500.000	2507.452	12057462.86	1.8785	A	0.4
8	☐	5000.000	4995.590	24676322.77	3.7426	A	0.9
9	☐			10929.87	0.0018	P	5.9

$$y = 7.4916E-004 * x + 3.4944E-005$$

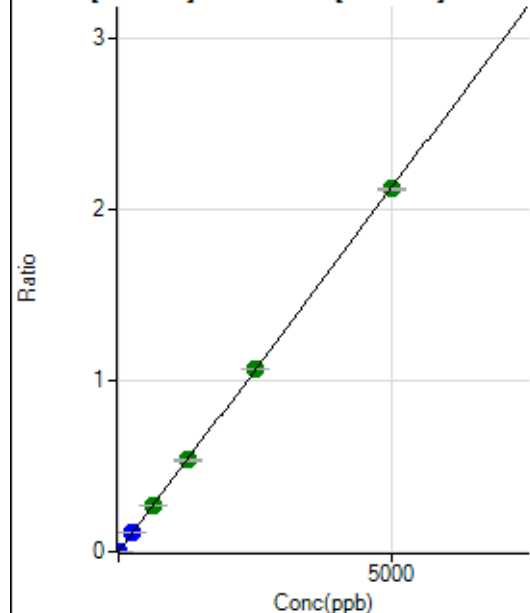
$$R = 1.0000$$

$$DL = 0.01377$$

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	100.00	0.0000	P	13.9
2	☐	0.500					
3	☐	5.000	4.761	13042.95	0.0020	P	3.0
4	☐	250.000	254.447	679999.58	0.1083	P	0.5
5	☐	625.000	642.884	1779413.91	0.2737	A	0.7
6	☐	1250.000	1259.375	3527416.53	0.5362	A	1.5
7	☐	2500.000	2521.321	6889733.75	1.0735	A	0.1
8	☐	5000.000	4984.538	13992341.98	2.1221	A	0.7
9	☐			5568.04	0.0009	P	5.7

$$y = 4.2574\text{E-}004 * x + 1.5328\text{E-}005$$

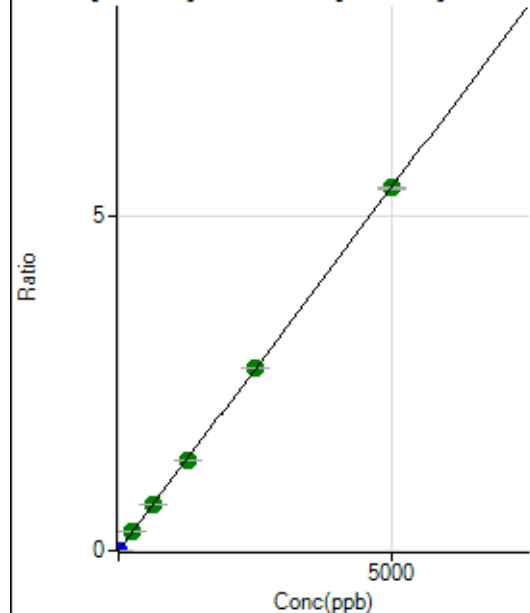
$$R = 1.0000$$

$$DL = 0.01498$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	208.35	0.0000	P	8.3
2	☐	0.500					
3	☐	5.000	4.753	33205.61	0.0052	P	1.0
4	☐	250.000	259.409	1769749.71	0.2820	A	0.2
5	☐	625.000	634.951	4486483.13	0.6901	A	0.5
6	☐	1250.000	1243.691	8893367.56	1.3518	A	0.1
7	☐	2500.000	2514.245	17538121.57	2.7327	A	0.7
8	☐	5000.000	4992.741	35779934.13	5.4265	A	0.5
9	☐			13599.05	0.0022	P	4.7

$$y = 0.0011 * x + 3.1955\text{E-}005$$

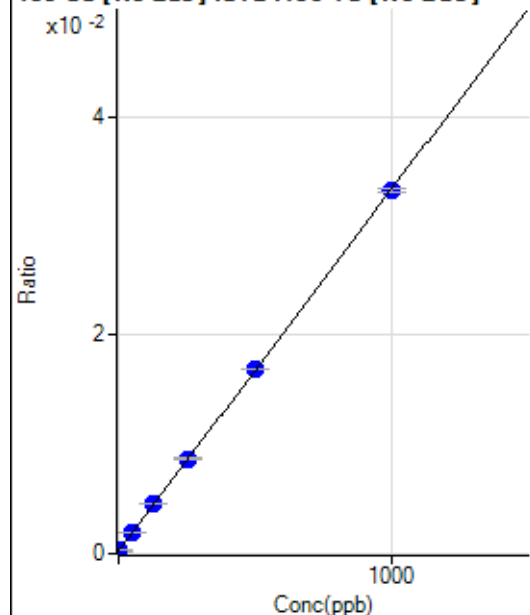
$$R = 1.0000$$

$$DL = 0.007303$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	1530.71	0.0002	P	5.4
2	☐	0.100					
3	☐	1.000	1.633	1855.78	0.0003	P	8.5
4	☐	50.000	53.144	13106.92	0.0020	P	1.5
5	☐	125.000	130.672	31295.76	0.0046	P	0.9
6	☐	250.000	254.444	60065.25	0.0087	P	2.5
7	☐	500.000	504.042	116829.47	0.0169	P	0.3
8	☐	1000.000	996.001	233563.93	0.0332	P	1.0
9	☐			1616.84	0.0002	P	1.3

$$y = 3.3132\text{E-}005 * x + 2.2604\text{E-}004$$

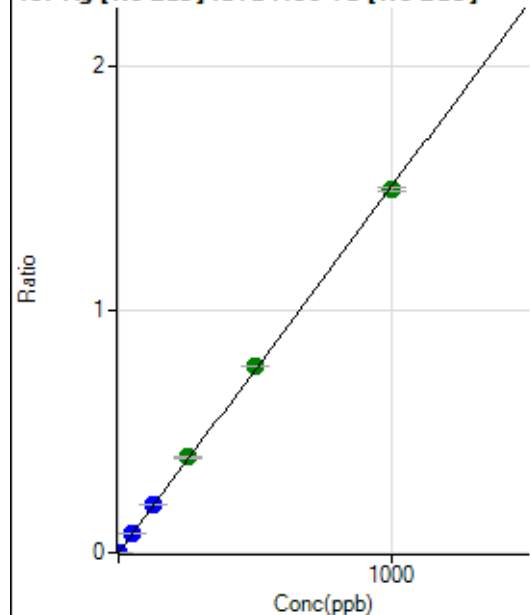
$$R = 1.0000$$

$$DL = 1.109$$

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	241.68	0.0000	P	3.4
2	☐	0.100					
3	☐	1.000	1.109	11296.91	0.0017	P	4.5
4	☐	50.000	52.905	525567.07	0.0797	P	1.1
5	☐	125.000	129.218	1336432.81	0.1945	P	0.5
6	☐	250.000	261.695	2733642.68	0.3940	A	1.7
7	☐	500.000	509.887	5297749.29	0.7675	A	0.7
8	☐	1000.000	991.460	10490984.61	1.4924	A	1.0
9	☐			1497.38	0.0002	P	12.3

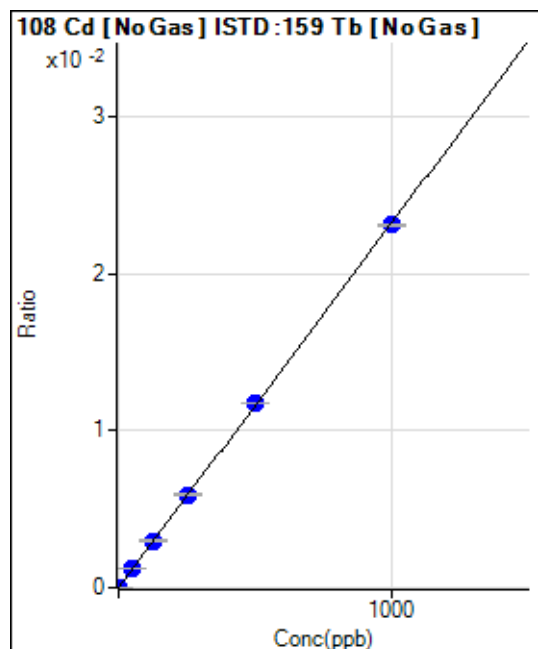
$$y = 0.0015 * x + 3.5684\text{E-}005$$

$$R = 0.9999$$

$$DL = 0.002397$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	11.11	0.0000	P	77.6
2	☐	0.100					
3	☐	1.000	0.868	144.45	0.0000	P	23.5
4	☐	50.000	53.501	8198.51	0.0012	P	1.8
5	☐	125.000	127.608	20347.57	0.0030	P	3.1
6	☐	250.000	254.095	40913.57	0.0059	P	2.2
7	☐	500.000	506.278	81079.67	0.0117	P	0.9
8	☐	1000.000	995.336	162332.22	0.0231	P	0.3
9	☐			38.89	0.0000	P	15.5

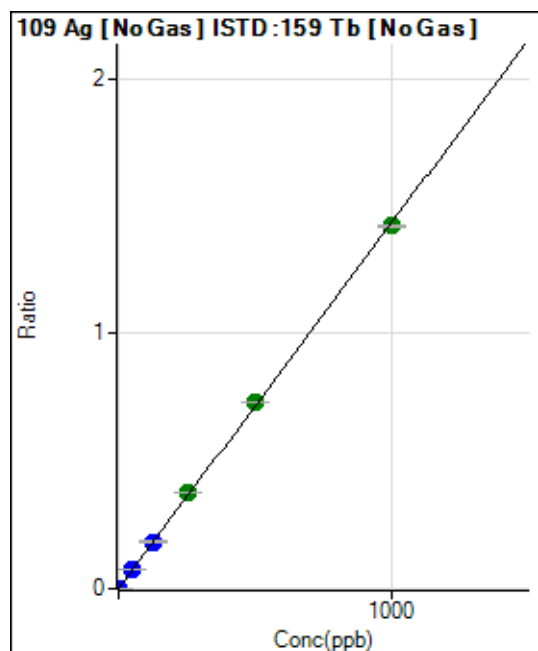
$$y = 2.3199\text{E-}005 * x + 1.6380\text{E-}006$$

$$R = 1.0000$$

$$DL = 0.1644$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	205.57	0.0000	P	19.9
2	☐	0.100					
3	☐	1.000	1.110	10743.57	0.0016	P	2.5
4	☐	50.000	52.510	496636.15	0.0753	P	1.3
5	☐	125.000	128.441	1264728.01	0.1841	P	1.1
6	☐	250.000	260.841	2594619.09	0.3739	A	0.2
7	☐	500.000	509.748	5042683.92	0.7306	A	0.2
8	☐	1000.000	991.860	9992669.49	1.4215	A	0.6
9	☐			1486.27	0.0002	P	2.4

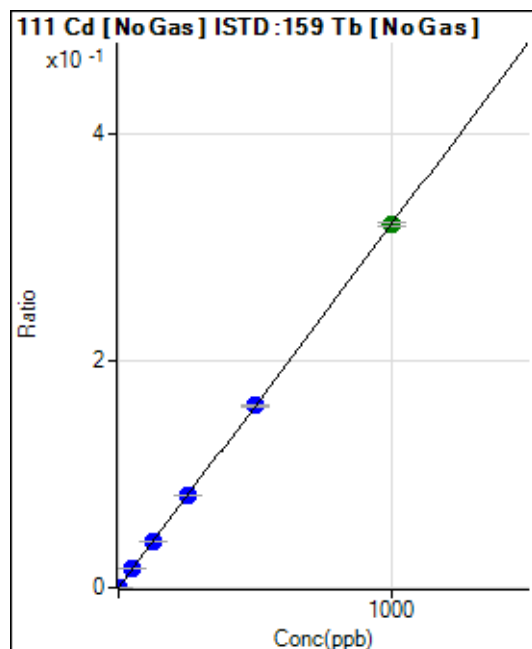
$$y = 0.0014 * x + 3.0330\text{E-}005$$

$$R = 0.9999$$

$$DL = 0.01262$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	1077.61	0.0002	P	5.7
2	☐	0.100					
3	☐	1.000	1.049	3277.31	0.0005	P	4.6
4	☐	50.000	52.186	111221.77	0.0169	P	1.2
5	☐	125.000	128.433	283450.90	0.0413	P	0.3
6	☐	250.000	252.641	562189.05	0.0810	P	0.6
7	☐	500.000	501.489	1108830.16	0.1606	P	0.9
8	☐	1000.000	998.057	2246392.96	0.3196	A	1.0
9	☐			1208.74	0.0002	P	2.2

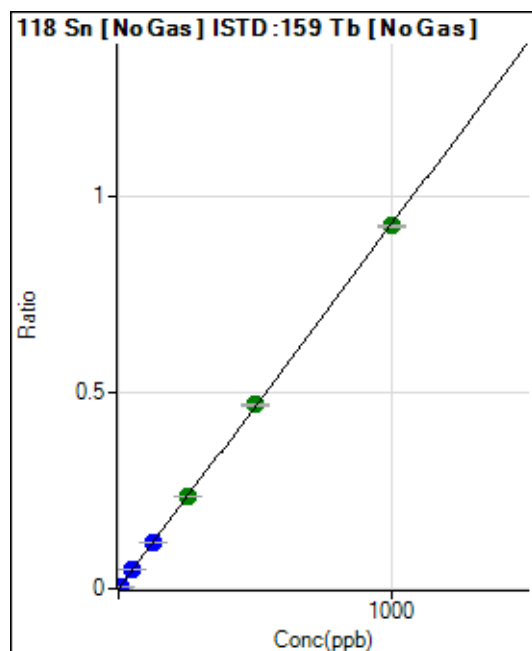
$$y = 3.2002\text{E-}004 * x + 1.5913\text{E-}004$$

$$R = 1.0000$$

$$DL = 0.08563$$

Weight: <None>

Min Conc: 0



	R _j ct	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	477.82	0.0001	P	19.2
2	☐	0.500					
3	☐	5.000	5.057	31571.55	0.0048	P	0.6
4	☐	50.000	51.305	314583.87	0.0477	P	1.0
5	☐	125.000	126.809	809004.34	0.1178	P	0.1
6	☐	250.000	254.574	1640180.47	0.2363	A	0.9
7	☐	500.000	505.865	3241085.92	0.4696	A	0.8
8	☐	1000.000	995.632	6496160.61	0.9241	A	0.3
9	☐			3089.38	0.0005	P	4.2

$$y = 9.2810\text{E-}004 * x + 7.0598\text{E-}005$$

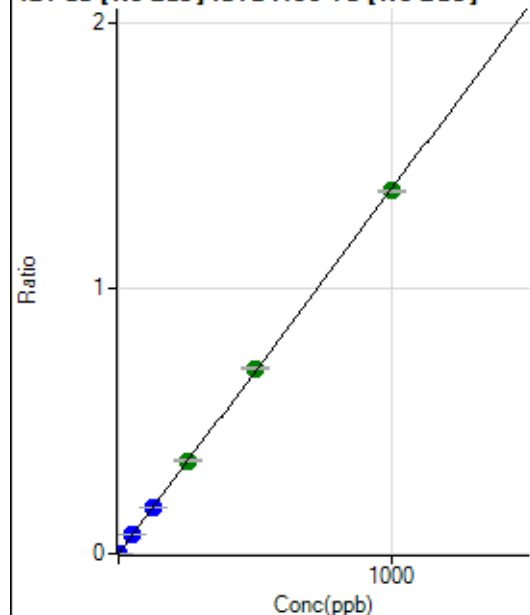
$$R = 1.0000$$

$$DL = 0.04387$$

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	380.58	0.0001	P	18.1
2	☐	0.200					
3	☐	2.000	1.823	16969.76	0.0026	P	2.4
4	☐	50.000	51.231	464651.80	0.0704	P	2.0
5	☐	125.000	126.187	1191317.55	0.1734	P	0.3
6	☐	250.000	254.370	2425413.10	0.3495	A	1.3
7	☐	500.000	507.335	4811194.38	0.6970	A	0.7
8	☐	1000.000	995.031	9609856.47	1.3671	A	0.3
9	☐			11549.93	0.0018	P	10.1

$$y = 0.0014 * x + 5.6225E-005$$

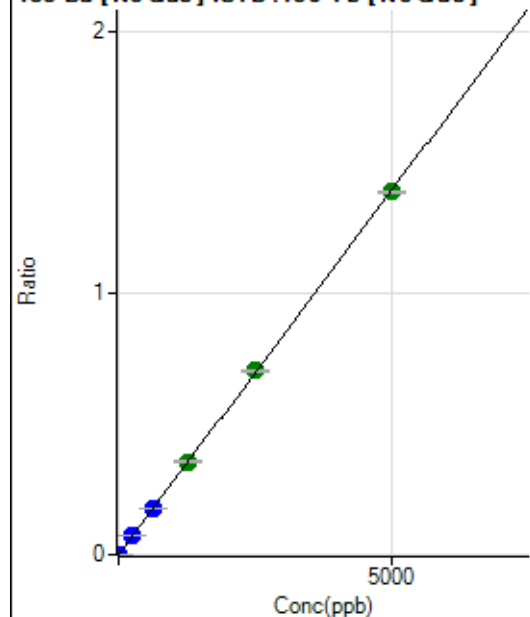
$$R = 0.9999$$

$$DL = 0.02221$$

Weight: <None>

Min Conc: 0

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



	R _{ct}	Conc.	Calc Conc.	CPS	Ratio	Det.	RSD
1	☐	0.000	0.000	41.67	0.0000	P	35.3
2	☐	1.000					
3	☐	10.000	9.652	17876.71	0.0027	P	4.4
4	☐	250.000	255.198	469588.58	0.0712	P	1.3
5	☐	625.000	630.879	1208845.51	0.1760	P	0.4
6	☐	1250.000	1272.910	2463560.60	0.3550	A	1.8
7	☐	2500.000	2522.048	4855305.40	0.7034	A	0.5
8	☐	5000.000	4982.255	9768305.86	1.3896	A	0.5
9	☐			1033.43	0.0002	P	11.2

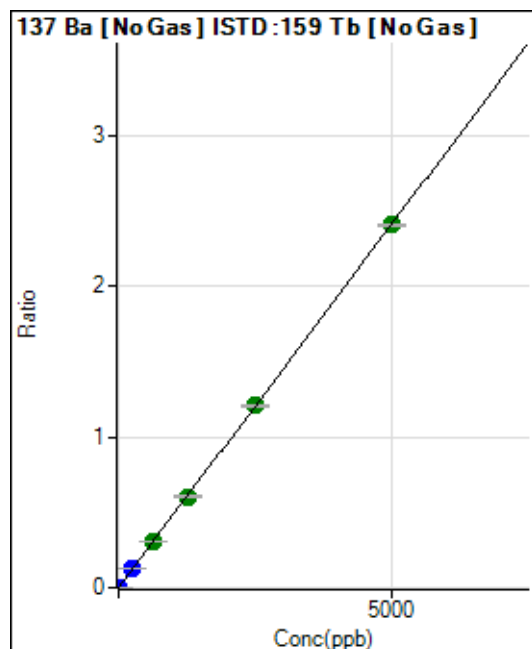
$$y = 2.7891E-004 * x + 6.1611E-006$$

$$R = 1.0000$$

$$DL = 0.0234$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	66.67	0.0000	P	25.6
2	☐	1.000					
3	☐	10.000	9.854	31524.86	0.0048	P	1.8
4	☐	250.000	256.169	814318.58	0.1234	P	0.3
5	☐	625.000	644.690	2133927.37	0.3106	A	0.5
6	☐	1250.000	1256.787	4201702.61	0.6055	A	2.2
7	☐	2500.000	2502.091	8320985.00	1.2055	A	0.7
8	☐	5000.000	4994.488	16915862.88	2.4064	A	0.7
9	☐			1755.75	0.0003	P	14.4

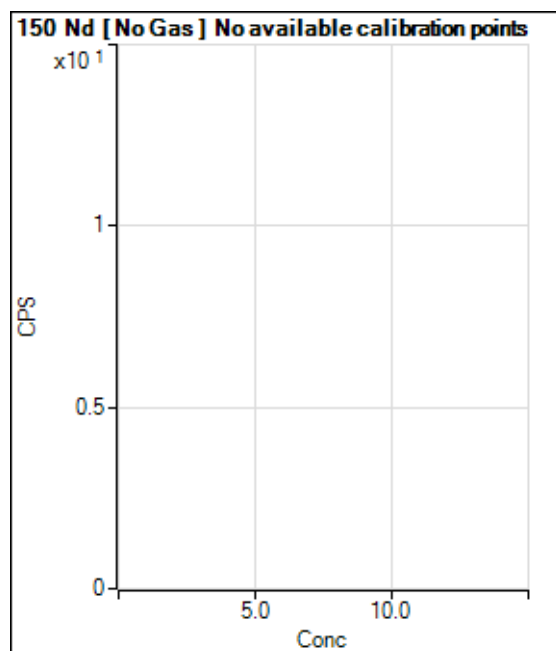
$$y = 4.8181\text{E-}004 * x + 9.8534\text{E-}006$$

$$R = 1.0000$$

$$DL = 0.0157$$

Weight: <None>

Min Conc: 0



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			8.89		P	86.6
2	☐						
3	☐			8.89		P	86.6
4	☐			22.22		P	17.3
5	☐			57.78		P	54.5
6	☐			106.67		P	18.7
7	☐			191.12		P	25.7
8	☐			435.58		P	19.9
9	☐			88.89		P	11.5

150 Nd [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			1.11		P	173.
2	☐						
3	☐			0.00		P	
4	☐			1.11		P	173.
5	☐			1.11		P	173.
6	☐			5.56		P	34.7
7	☐			4.44		P	43.4
8	☐			14.45		P	26.7
9	☐			25.56		P	49.4

156 Dy [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			113.89		P	40.3
2	☐						
3	☐			122.23		P	27.6
4	☐			102.78		P	23.4
5	☐			111.12		P	30.3
6	☐			141.67		P	44.4
7	☐			150.01		P	24.2
8	☐			183.35		P	7.9
9	☐			188.90		P	13.5

156 Dy [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			5.56		P	91.6
2	☐						
3	☐			2.22		P	86.6
4	☐			6.67		P	50.0
5	☐			3.33		P	100.
6	☐			2.22		P	86.6
7	☐			4.44		P	43.4
8	☐			12.22		P	83.3
9	☐			20.00		P	44.1

160 Gd [No Gas] Noavailable calibration poin_

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			25.00		P	33.3
2	☐						
3	☐			19.44		P	65.5
4	☐			44.44		P	21.7
5	☐			63.89		P	19.9
6	☐			61.12		P	7.9
7	☐			58.33		P	24.7
8	☐			94.45		P	13.5
9	☐			66.67		P	25.0

160 Gd [He] No available calibration points

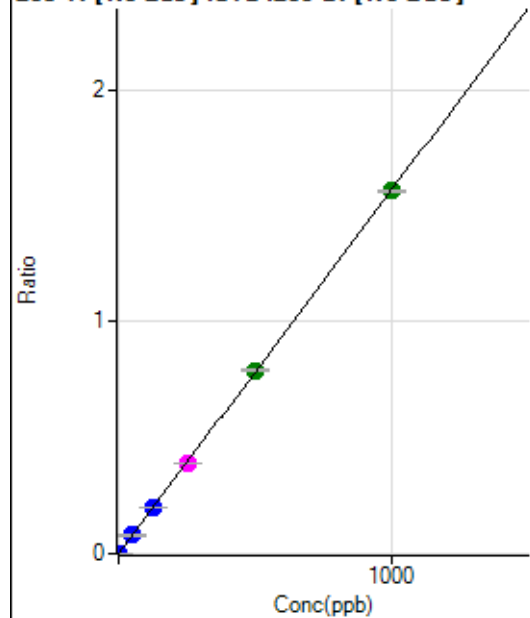
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			13.33		P	25.0
2	☐						
3	☐			10.00		P	0.0
4	☐			12.22		P	41.7
5	☐			13.34		P	43.3
6	☐			12.22		P	63.0
7	☐			14.44		P	58.1
8	☐			22.22		P	37.8
9	☐			24.44		P	41.7

164 Er [No Gas] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			27.78		P	17.3
2	☐						
3	☐			25.00		P	33.3
4	☐			30.56		P	31.5
5	☐			33.33		P	25.0
6	☐			50.00		P	28.9
7	☐			36.11		P	26.7
8	☐			33.33		P	50.0
9	☐			47.22		P	44.4

164 Er [He] No available calibration points

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐			7.78		P	99.0
2	☐						
3	☐			1.11		P	173.
4	☐			5.56		P	34.7
5	☐			12.22		P	83.3
6	☐			4.45		P	86.6
7	☐			7.78		P	24.7
8	☐			6.67		P	50.0
9	☐			7.78		P	49.5

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

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	0.000	0.000	75.00	0.0000	P	19.0
2	☐	0.100					
3	☐	1.000	0.951	5946.17	0.0015	P	2.8
4	☐	50.000	50.257	307958.92	0.0789	P	0.7
5	☐	125.000	125.287	792059.64	0.1966	P	1.1
6	☐	250.000	248.432	1592603.35	0.3898	M	0.7
7	☐	500.000	504.934	3222196.62	0.7922	A	1.0
8	☐	1000.000	997.876	6395785.74	1.5656	A	0.6
9	☐			513.92	0.0001	P	6.8

$$y = 0.0016 * x + 1.8529E-005$$

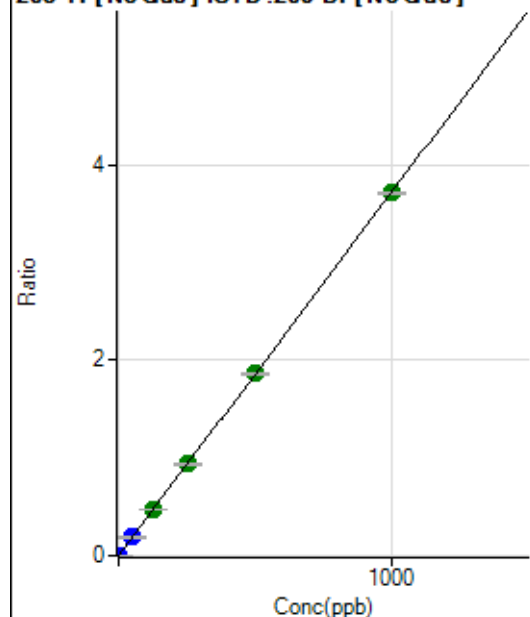
$$R = 1.0000$$

$$DL = 0.006725$$

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	116.67	0.0000	P	32.6
2	☐	0.100					
3	☐	1.000	0.942	13924.94	0.0035	P	1.6
4	☐	50.000	50.371	732196.29	0.1875	P	0.4
5	☐	125.000	128.428	1926084.92	0.4780	A	1.1
6	☐	250.000	252.798	3844490.93	0.9410	A	1.1
7	☐	500.000	500.489	7576860.15	1.8629	A	0.2
8	☐	1000.000	998.609	15184715.44	3.7169	A	0.4
9	☐			997.31	0.0003	P	14.9

$$y = 0.0037 * x + 2.8827E-005$$

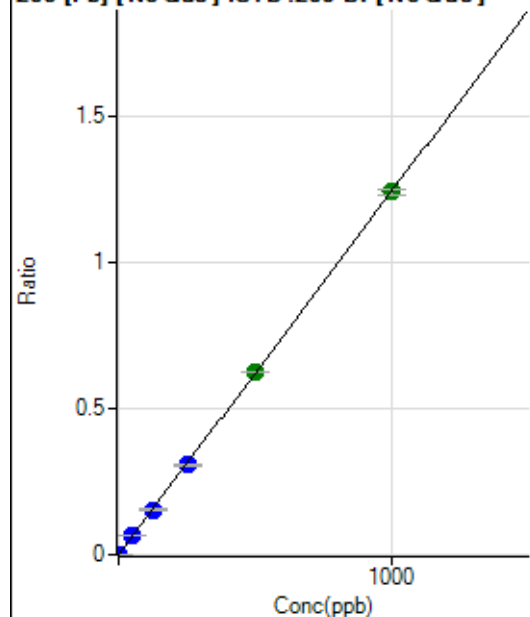
$$R = 1.0000$$

$$DL = 0.007567$$

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	353.72	0.0001	P	3.8
2	☐	0.100					
3	☐	1.000	0.943	4960.39	0.0013	P	3.0
4	☐	50.000	50.678	246471.79	0.0631	P	0.5
5	☐	125.000	124.368	623601.32	0.1548	P	0.7
6	☐	250.000	246.563	1253372.34	0.3068	P	0.7
7	☐	500.000	503.231	2546221.24	0.6260	A	0.8
8	☐	1000.000	999.289	5077516.03	1.2430	A	1.5
9	☐			8113.95	0.0022	P	3.1

$$y = 0.0012 * x + 8.7421E-005$$

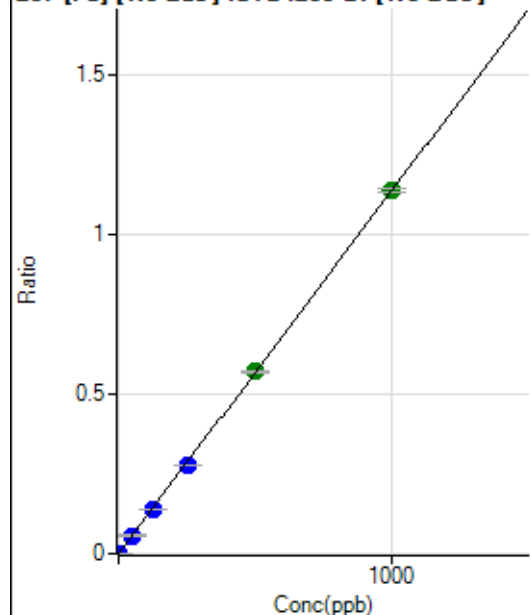
$$R = 1.0000$$

$$DL = 0.007999$$

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	283.35	0.0001	P	16.7
2	☐	0.100					
3	☐	1.000	0.918	4387.95	0.0011	P	1.8
4	☐	50.000	50.088	222717.17	0.0570	P	1.0
5	☐	125.000	123.511	566258.90	0.1405	P	0.5
6	☐	250.000	243.496	1131844.92	0.2770	P	0.4
7	☐	500.000	502.824	2326394.35	0.5720	A	0.8
8	☐	1000.000	1000.396	4648185.58	1.1379	A	1.2
9	☐			7096.62	0.0020	P	4.4

$$y = 0.0011 * x + 6.9999E-005$$

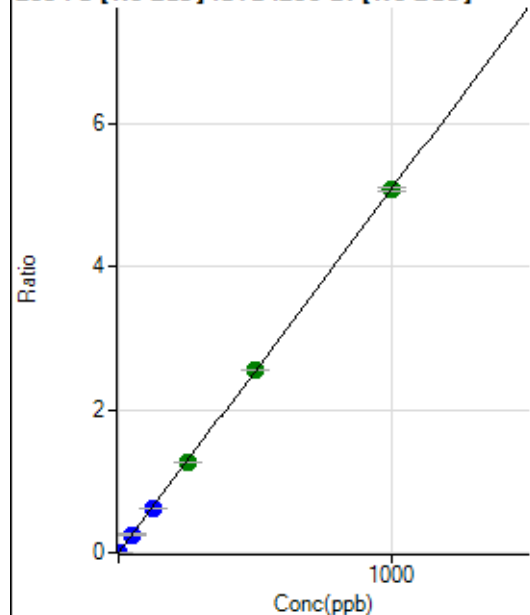
$$R = 1.0000$$

$$DL = 0.03081$$

Weight: <None>

Min Conc: 0

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



	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det	RSD
1	☐	0.000	0.000	1414.90	0.0003	P	1.6
2	☐	0.100					
3	☐	1.000	0.926	19899.36	0.0051	P	0.7
4	☐	50.000	50.079	994679.78	0.2547	P	0.8
5	☐	125.000	123.905	2537305.57	0.6298	P	0.1
6	☐	250.000	249.877	5187697.61	1.2697	A	0.4
7	☐	500.000	504.102	10416484.06	2.5611	A	0.1
8	☐	1000.000	998.113	20712915.86	5.0705	A	1.1
9	☐			32085.18	0.0089	P	4.6

$$y = 0.0051 * x + 3.4963E-004$$

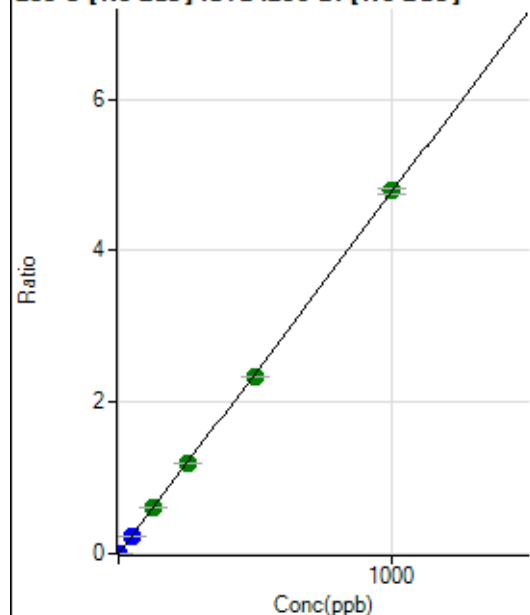
$$R = 1.0000$$

$$DL = 0.003236$$

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	66.67	0.0000	P	24.9
2	☐	0.100					
3	☐	1.000	0.899	16920.61	0.0043	P	2.9
4	☐	50.000	49.025	912188.47	0.2336	P	0.4
5	☐	125.000	126.374	2426147.69	0.6022	A	0.7
6	☐	250.000	249.486	4856842.42	1.1887	A	1.2
7	☐	500.000	490.808	9511395.70	2.3386	A	0.6
8	☐	1000.000	1004.602	19552403.74	4.7867	A	1.9
9	☐			472.26	0.0001	P	13.0

$$y = 0.0048 * x + 1.6475E-005$$

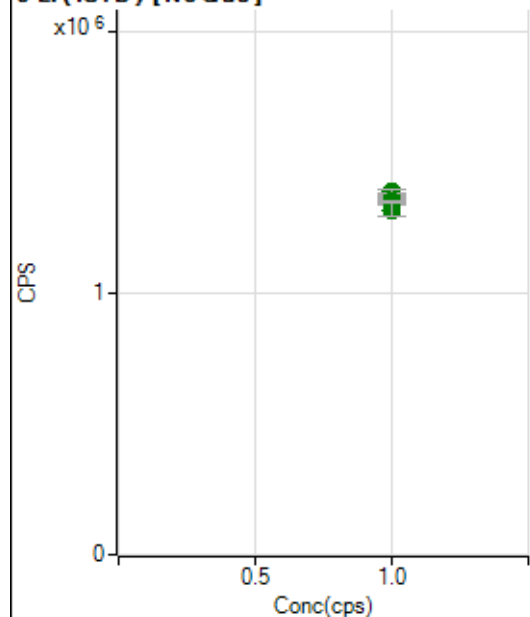
$$R = 0.9999$$

$$DL = 0.002585$$

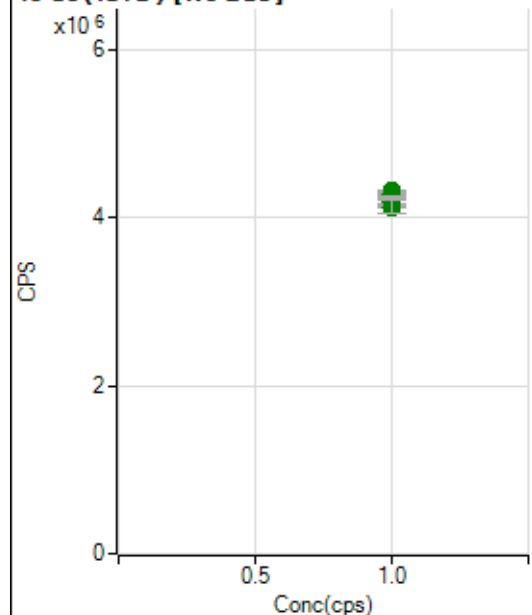
Weight: <None>

Min Conc: 0

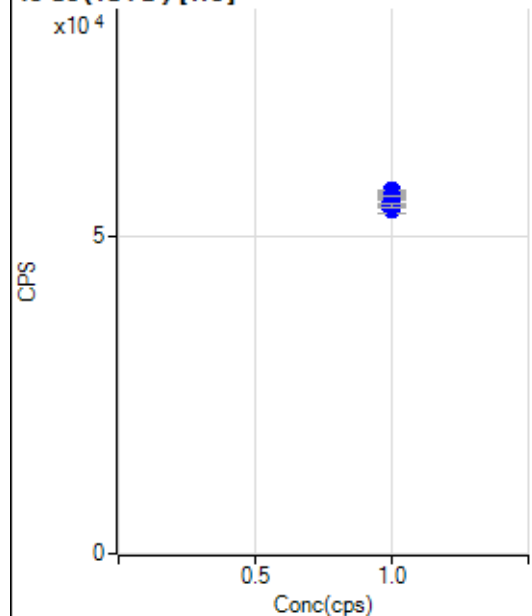
6 Li (ISTD) [No Gas]



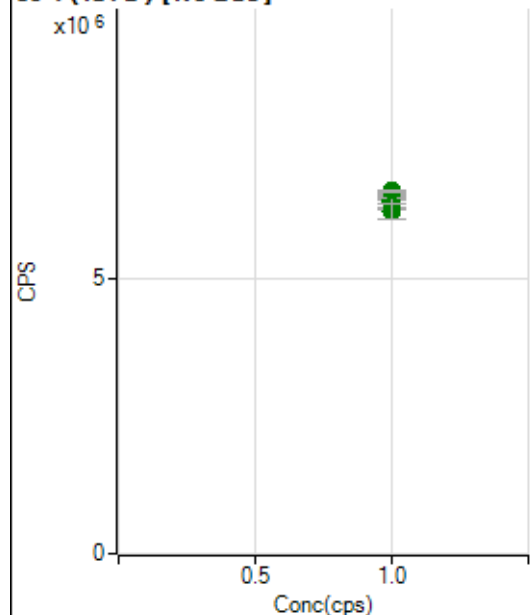
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1372032.05		A	0.6
2	☐	1.000					
3	☐	1.000		1352677.62		A	0.7
4	☐	1.000		1342401.36		A	0.8
5	☐	1.000		1366223.74		A	0.2
6	☐	1.000		1389223.37		A	0.9
7	☐	1.000		1349802.81		A	0.6
8	☐	1.000		1352513.32		A	0.2
9	☐	1.000		1318767.33		A	3.8

45 Sc (ISTD) [No Gas]

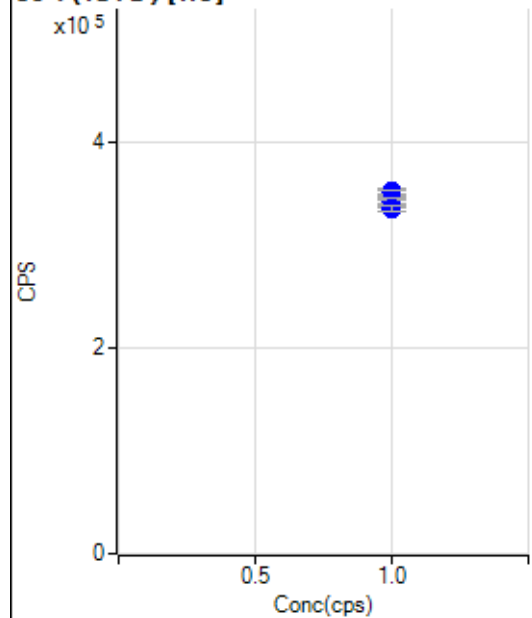
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4319712.47		A	0.4
2	☐	1.000					
3	☐	1.000		4187951.09		A	0.8
4	☐	1.000		4125580.13		A	0.7
5	☐	1.000		4275681.78		A	0.2
6	☐	1.000		4288268.15		A	1.3
7	☐	1.000		4194646.45		A	1.1
8	☐	1.000		4257416.85		A	0.6
9	☐	1.000		4130887.77		A	4.0

45 Sc (ISTD) [He]

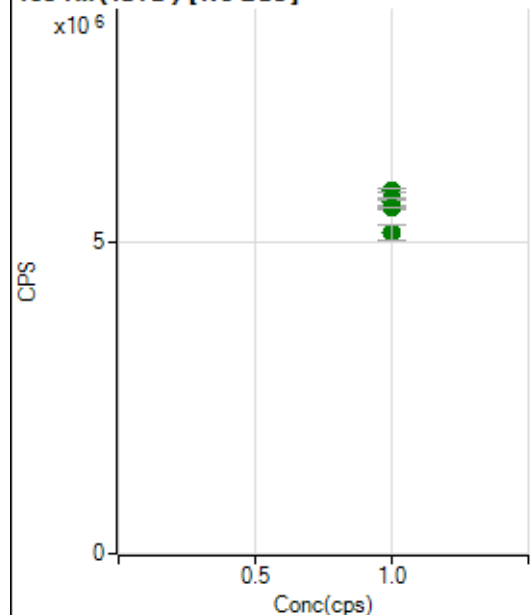
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		56738.53		P	1.3
2	☐	1.000					
3	☐	1.000		56323.73		P	0.7
4	☐	1.000		55510.51		P	1.0
5	☐	1.000		56364.83		P	0.1
6	☐	1.000		57111.08		P	0.8
7	☐	1.000		54120.66		P	2.4
8	☐	1.000		56379.28		P	0.1
9	☐	1.000		54771.92		P	1.5

89 Y (ISTD) [No Gas]

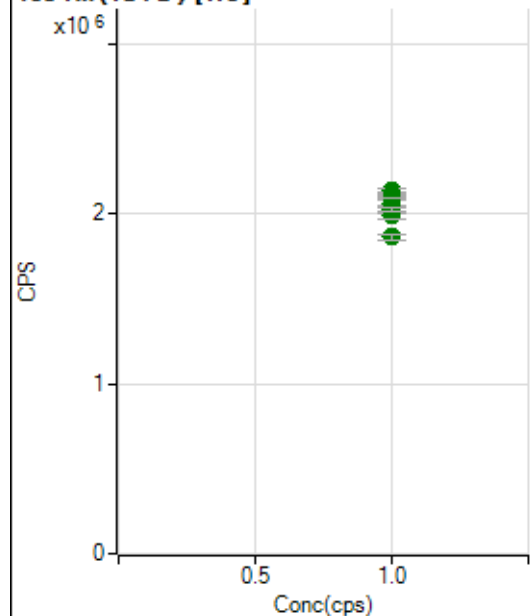
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6521201.99		A	0.6
2	☐	1.000					
3	☐	1.000		6387349.49		A	1.1
4	☐	1.000		6276242.96		A	0.2
5	☐	1.000		6500795.46		A	0.4
6	☐	1.000		6579103.86		A	0.7
7	☐	1.000		6418318.10		A	1.4
8	☐	1.000		6593606.43		A	0.4
9	☐	1.000		6221450.88		A	4.9

89 Y (ISTD) [He]

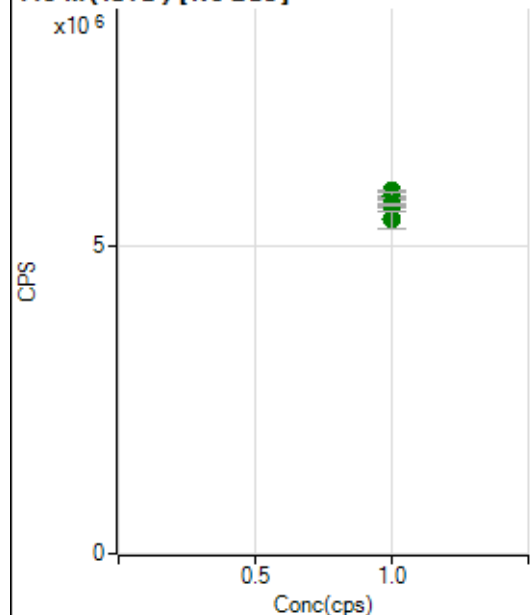
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		351728.96		P	1.2
2	☐	1.000					
3	☐	1.000		347710.84		P	0.5
4	☐	1.000		342235.53		P	1.2
5	☐	1.000		347690.31		P	0.9
6	☐	1.000		352079.97		P	0.0
7	☐	1.000		334386.78		P	1.2
8	☐	1.000		343876.61		P	0.3
9	☐	1.000		335307.96		P	1.9

103 Rh (ISTD) [No Gas]

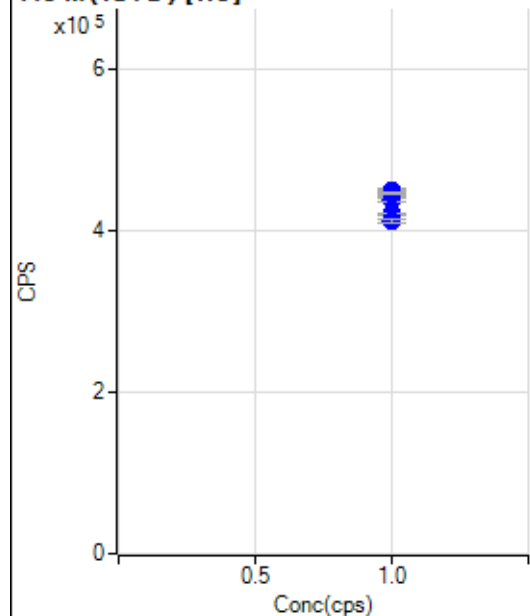
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5831699.48		A	1.0
2	☐	1.000					
3	☐	1.000		5646960.02		A	1.6
4	☐	1.000		5573705.42		A	0.3
5	☐	1.000		5702517.66		A	0.7
6	☐	1.000		5714090.67		A	0.5
7	☐	1.000		5554766.45		A	0.9
8	☐	1.000		5568378.38		A	0.2
9	☐	1.000		5172052.94		A	4.9

103 Rh (ISTD) [He]

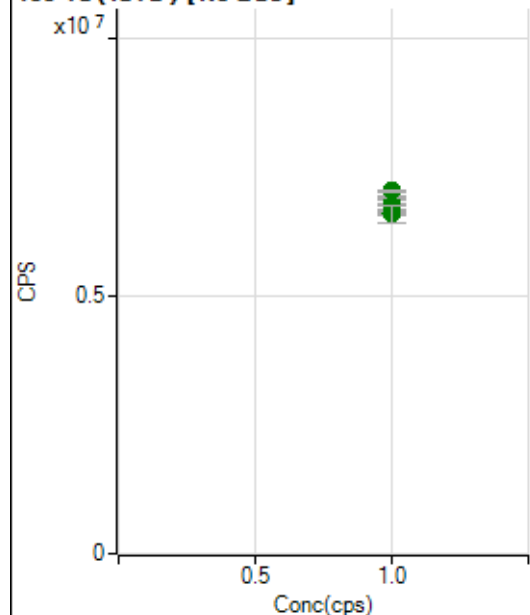
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		2137834.20		A	1.2
2	☐	1.000					
3	☐	1.000		2114087.48		A	0.3
4	☐	1.000		2066156.81		A	1.5
5	☐	1.000		2086410.26		A	0.3
6	☐	1.000		2098213.32		A	0.2
7	☐	1.000		1990888.25		A	1.4
8	☐	1.000		2027024.87		A	0.9
9	☐	1.000		1868190.20		A	1.7

115 In (ISTD) [No Gas]

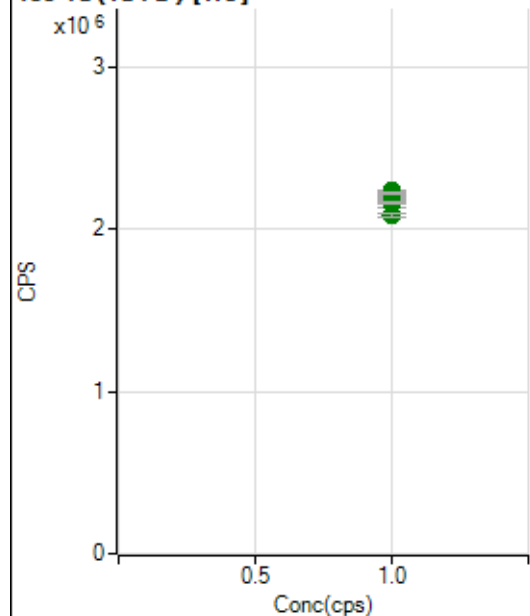
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		5902832.21		A	0.6
2	☐	1.000					
3	☐	1.000		5698789.95		A	2.0
4	☐	1.000		5630660.17		A	0.4
5	☐	1.000		5807735.85		A	0.4
6	☐	1.000		5833837.80		A	1.4
7	☐	1.000		5683624.66		A	0.6
8	☐	1.000		5676347.95		A	0.9
9	☐	1.000		5430443.39		A	5.1

115 In (ISTD) [He]

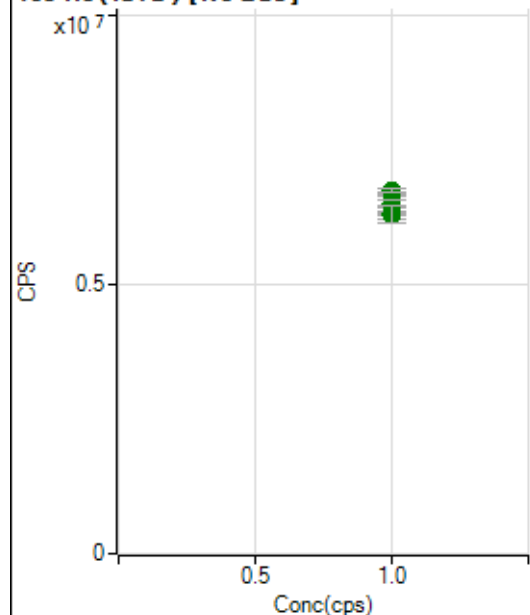
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		449954.76		P	1.5
2	☐	1.000					
3	☐	1.000		447733.98		P	1.1
4	☐	1.000		439373.37		P	1.2
5	☐	1.000		446512.63		P	0.8
6	☐	1.000		446945.07		P	0.9
7	☐	1.000		420998.06		P	1.0
8	☐	1.000		421974.68		P	0.5
9	☐	1.000		412725.04		P	1.6

159 Tb (ISTD) [No Gas]

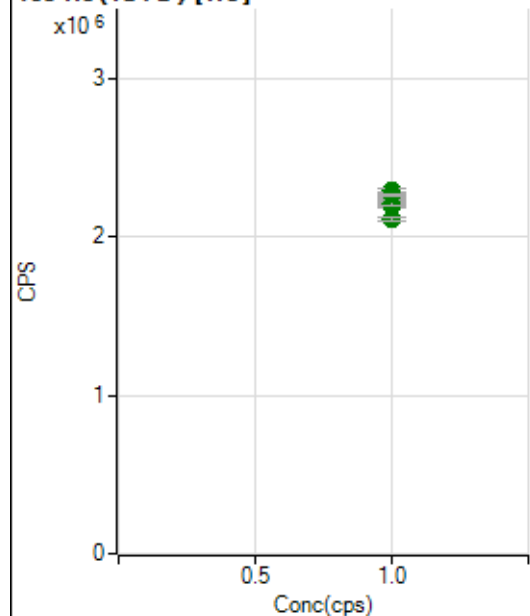
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6772805.32		A	0.6
2	☐	1.000					
3	☐	1.000		6626940.80		A	0.9
4	☐	1.000		6597195.04		A	0.8
5	☐	1.000		6869781.43		A	0.5
6	☐	1.000		6940146.43		A	1.5
7	☐	1.000		6902358.92		A	0.4
8	☐	1.000		7029559.69		A	0.3
9	☐	1.000		6586836.01		A	5.3

159 Tb (ISTD) [He]

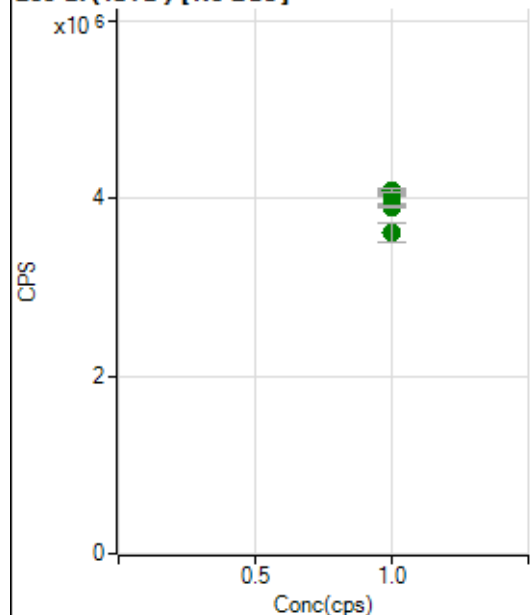
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		2225963.06		A	1.0
2	☐	1.000					
3	☐	1.000		2188773.34		A	0.6
4	☐	1.000		2152703.02		A	1.3
5	☐	1.000		2215517.66		A	1.3
6	☐	1.000		2236647.66		A	0.8
7	☐	1.000		2163263.42		A	0.5
8	☐	1.000		2226619.69		A	0.5
9	☐	1.000		2086323.34		A	1.3

165 Ho (ISTD) [No Gas]

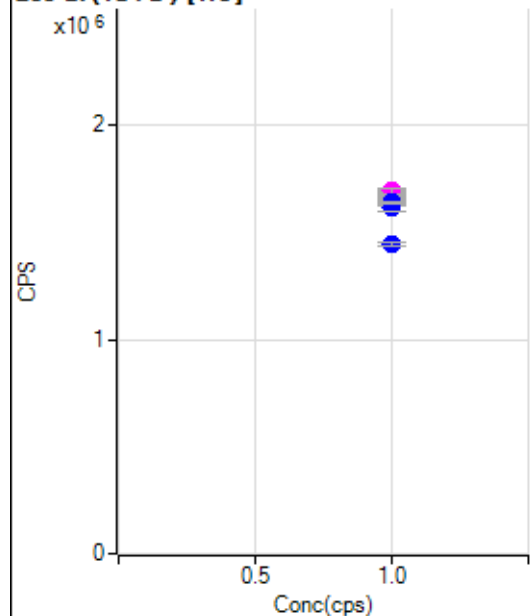
	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		6460139.25		A	0.6
2	☐	1.000					
3	☐	1.000		6270266.98		A	1.7
4	☐	1.000		6316978.75		A	1.4
5	☐	1.000		6516682.14		A	1.3
6	☐	1.000		6658865.21		A	0.7
7	☐	1.000		6582019.07		A	0.1
8	☐	1.000		6739069.60		A	1.0
9	☐	1.000		6295870.28		A	5.1

165 Ho (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		2264129.51		A	1.3
2	☐	1.000					
3	☐	1.000		2229270.26		A	0.7
4	☐	1.000		2196772.03		A	1.2
5	☐	1.000		2230138.13		A	1.2
6	☐	1.000		2287027.94		A	1.1
7	☐	1.000		2211033.72		A	1.6
8	☐	1.000		2262438.30		A	0.5
9	☐	1.000		2108895.75		A	1.6

209 Bi (ISTD) [No Gas]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		4046713.59		A	0.5
2	☐	1.000					
3	☐	1.000		3937132.34		A	0.4
4	☐	1.000		3904848.69		A	0.6
5	☐	1.000		4029041.37		A	0.4
6	☐	1.000		4085910.63		A	0.9
7	☐	1.000		4067272.85		A	0.8
8	☐	1.000		4085297.72		A	1.0
9	☐	1.000		3624873.63		A	6.0

209 Bi (ISTD) [He]

	Rj ct	Conc.	Calc Conc.	CPS	Ratio	Det .	RSD
1	☐	1.000		1692603.26		M	0.9
2	☐	1.000					
3	☐	1.000		1670630.04		M	1.3
4	☐	1.000		1642562.32		P	0.9
5	☐	1.000		1678934.07		M	0.9
6	☐	1.000		1695390.72		M	1.5
7	☐	1.000		1616683.26		P	1.6
8	☐	1.000		1641528.01		P	0.5
9	☐	1.000		1445750.37		P	0.9

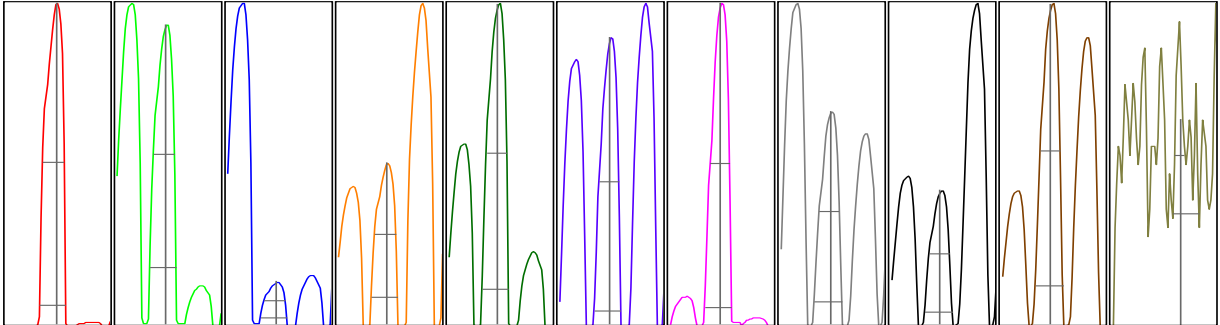
US EPA Tune Check Sample Report

Batch Folder D:\P8020919-MS.b
Report Comment
Instrument Name G8403A JP17141814

[No Gas]				
Mass	Count (Mean)	RSD% (Actual)	RSD% (Required)	RSD% (Flag)
9	7716	0.95	5.00	
24	75029	1.03	5.00	
25	10300	0.90	5.00	
26	12402	0.71	5.00	
59	61095	1.05	5.00	
113	7957	0.52	5.00	
115	98245	1.93	5.00	
206	19107	1.33	5.00	
207	17660	1.06	5.00	
208	40832	0.92	5.00	
220	2	11.87		

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
9	7588	7765	7750	7729	7750
24	73769	74849	75296	75642	75592
25	10139	10305	10332	10347	10375
26	12248	12417	12436	12467	12441
59	60110	60792	61560	61384	61628
113	7975	8006	7968	7944	7894
115	99382	100287	98564	97668	95324
206	18658	19170	19202	19234	19272
207	17360	17591	17791	17781	17779
208	40201	40905	41204	40862	40988
220	2	1	2	2	2

Integration Time [sec] = 0.1



Mass	Peak Height	Axis (Actual)	Axis (Required)	Axis (Flag)	Width-X% (Actual)	Width-X% (Required)	Width-X% (Flag)
9	13473	9.00	8.9 - 9.1		0.739	0.900	
24	128588	23.95	23.9 - 24.1		0.748	0.900	
25	17290	24.95	24.9 - 25.1		0.753	0.900	
26	20253	25.95	25.9 - 26.1		0.746	0.900	
59	107864	58.95	58.9 - 59.1		0.753	0.900	
113	14747	113.00	112.9 - 113.1		0.767	0.900	
115	180650	115.00	114.9 - 115.1		0.774	0.900	
206	33569	206.00	205.9 - 206.1		0.794	0.900	
207	30230	206.95	206.9 - 207.1		0.789	0.900	
208	72323	207.95	207.9 - 208.1		0.785	0.900	
220	2	220.50	-		0.733		

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

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Plasma Mode		HMI	Aerosol Dilution		HMI-8			

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	9.9	V	Deflect	14.8	V
Extract 2	-250.0	V	Cell Entrance	-30	V	Plate Bias	-35	V
Omega Bias	-110	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	10501	0.70	
89	4874	0.61	
205	13000	0.56	

Mass	Replicate 1 Count	Replicate 2 Count	Replicate 3 Count	Replicate 4 Count	Replicate 5 Count
59	10583	10444	10579	10450	10447
89	4918	4840	4876	4854	4883
205	13109	13018	13007	12932	12933

Integration Time [sec] = 0.1

Tune Parameters

Plasma Paramters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Plasma Mode		HMI	Aerosol Dilution		HMI-8			

Lenses Parameters

ParameterName	Value	Unit	ParameterName	Value	Unit	ParameterName	Value	Unit
Extract 1	0.0	V	Omega Lens	9.9	V	Deflect	2.4	V
Extract 2	-250.0	V	Cell Entrance	-40	V	Plate Bias	-60	V
Omega Bias	-110	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	5.0	mL/min	OctP RF	200	V			