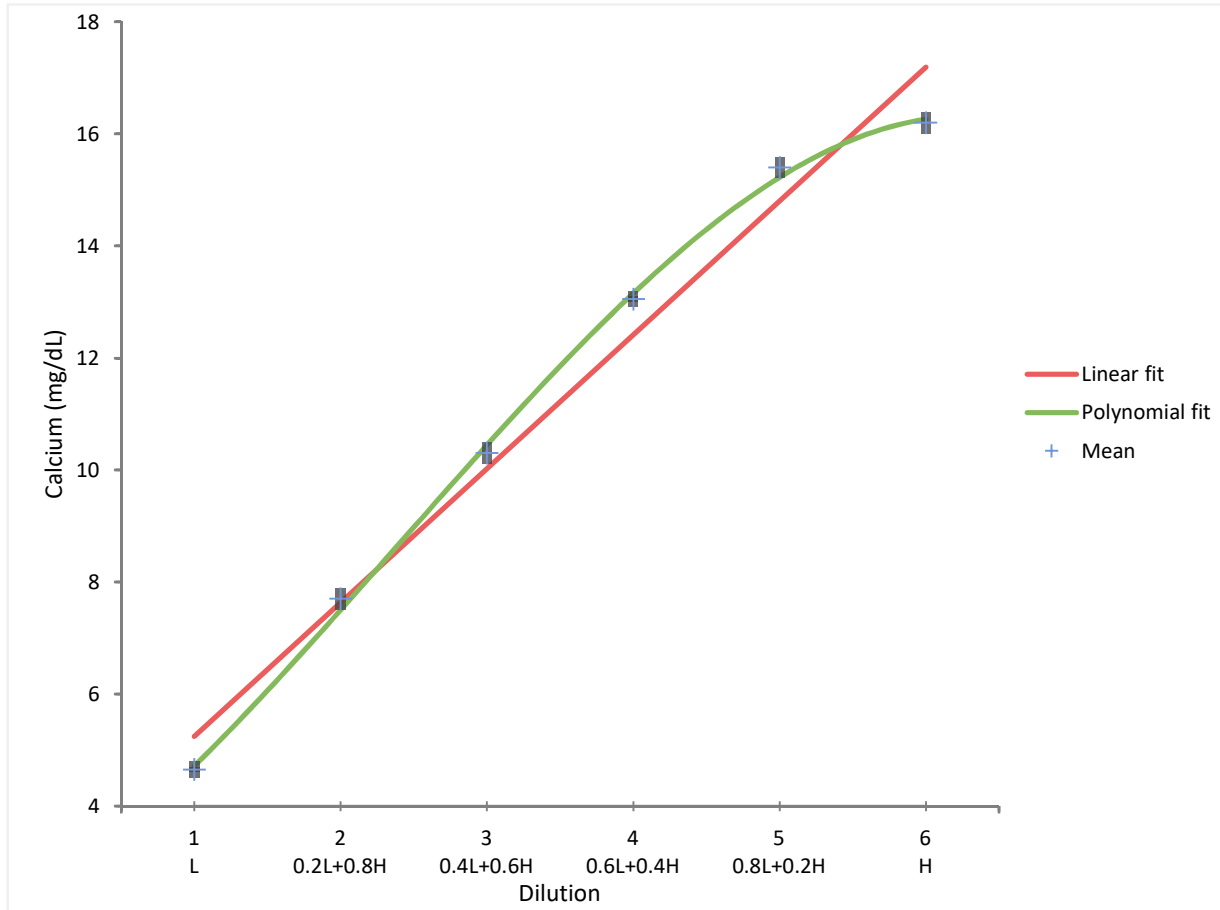


Descriptives



N | 12
Design | 6 Dilution x 2 Observations

MSA: Calcium

CLSI EP06-A - Appendix C

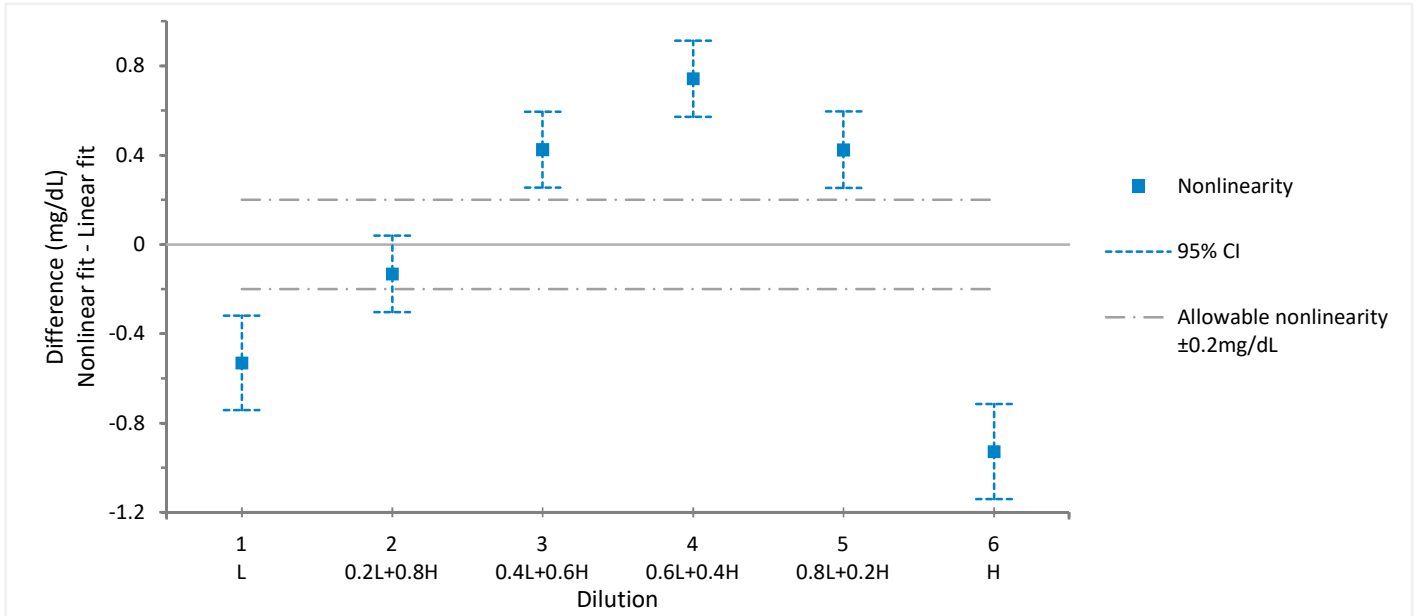
Last updated 10 August 2018 at 12:14 by Simon

Measuring interval | 4.65 to 16.20

Precision

Dilution	Mean	SD	CV
1	4.65	0.07	1.5%
2	7.70	0.14	1.8%
3	10.30	0.14	1.4%
4	13.05	0.07	0.5%
5	15.40	0.14	0.9%
6	16.20	0.14	0.9%
Pooled		0.12	1.3%

Linearity



Dilution	Linear fit	Nonlinear fit (3rd order polynomial)	Nonlinearity	95% CI	Allowable nonlinearity
1	5.25	4.71	-0.53 *	-0.74 to -0.32	±0.20
2	7.63	7.50	-0.13	-0.30 to 0.04	±0.20
3	10.02	10.45	0.42 *	0.25 to 0.59	±0.20
4	12.41	13.15	0.74 *	0.57 to 0.91	±0.20
5	14.80	15.22	0.42 *	0.25 to 0.60	±0.20
6	17.19	16.26	-0.93 *	-1.14 to -0.72	±0.20

* Performance requirement not met.

Fit Model

Linear fit

RMSE | 0.67

Parameter	Estimate	SE	t	DF	p-value
Constant	2.857	0.43923	-	-	-
X	2.389	0.11278	-	-	-

2nd order polynomial fit

RMSE | 0.31

Parameter	Estimate	SE	t	DF	p-value
Constant	0.8150	0.39535	-	-	-
X	3.920	0.25865	-	-	-
X ²	-0.2188	0.036170	-6.05	9	0.0002 ¹

¹ Nonlinear parameter is different from 0 at the 5% significance level.

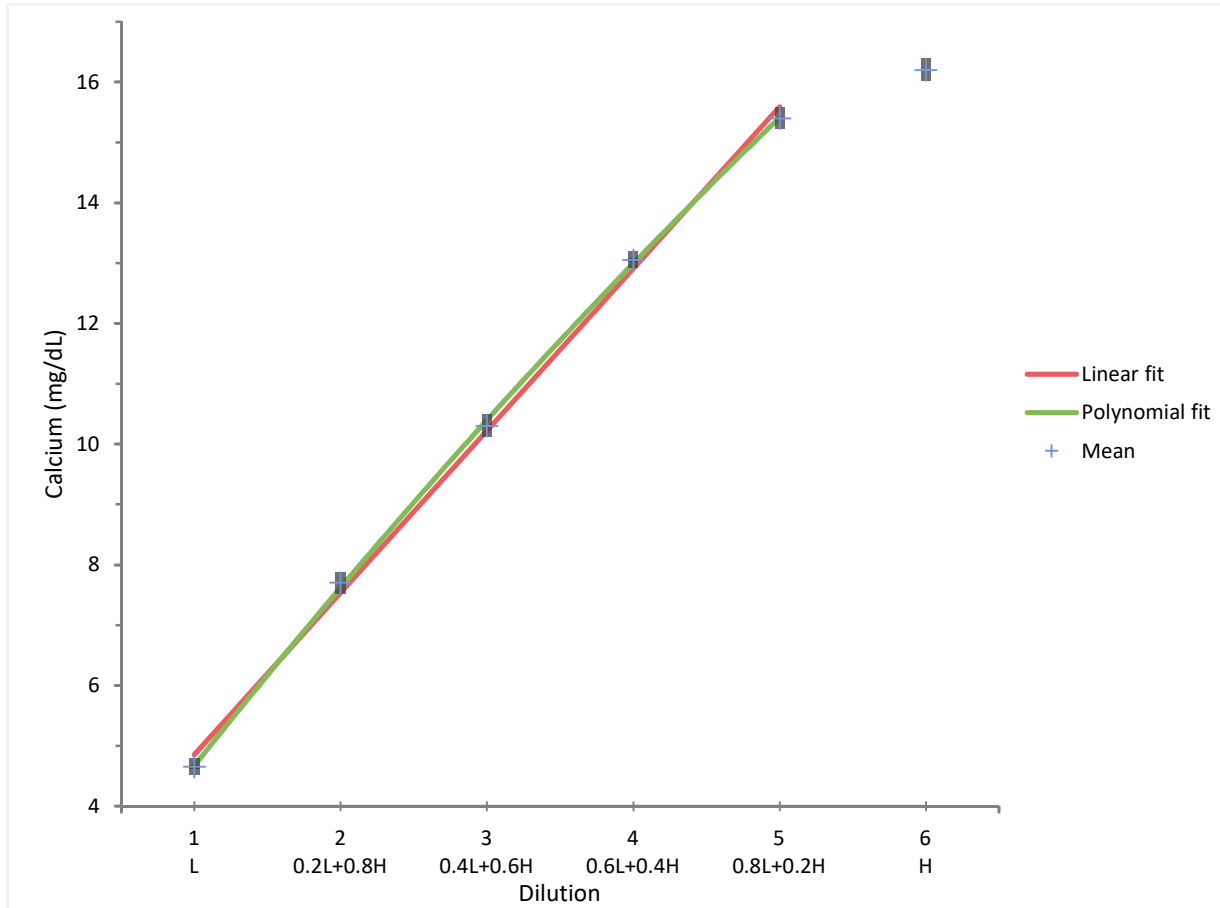
3rd order polynomial fit

RMSE | 0.20

Parameter	Estimate	SE	t	DF	p-value
Constant	2.483	0.50280	-	-	-
X	1.821	0.57290	-	-	-
X ²	0.4764	0.18332	2.60	8	0.0317 ¹
X ³	-0.06620	0.017324	-3.82	8	0.0051 ¹

¹ Nonlinear parameter is different from 0 at the 5% significance level.

Descriptives



N | 12
Design | 6 Dilution x 2 Observations

MSA: Calcium

CLSI EP06-A - Appendix C

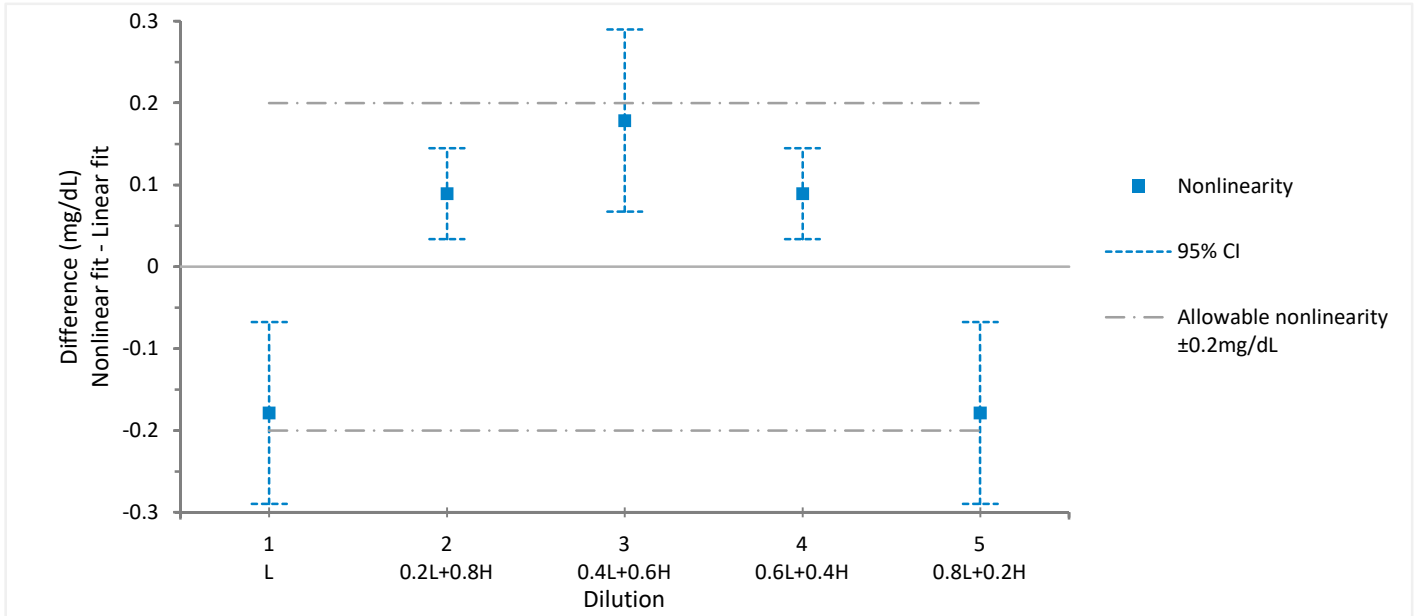
Last updated 10 August 2018 at 12:14 by Simon

Measuring interval	4.65 to 16.20
Reduced interval	4.65 to 15.40

Precision

Dilution	Mean	SD	CV
1	4.65	0.07	1.5%
2	7.70	0.14	1.8%
3	10.30	0.14	1.4%
4	13.05	0.07	0.5%
5	15.40	0.14	0.9%
6	16.20	0.14	0.9%
Pooled		0.12	1.3%

Linearity



Dilution	Linear fit	Nonlinear fit (2nd order polynomial)	Nonlinearity	95% CI	Allowable nonlinearity
1	4.85	4.67	-0.18	-0.29 to -0.07	±0.20
2	7.54	7.62	0.09	0.03 to 0.14	±0.20
3	10.22	10.40	0.18	0.07 to 0.29	±0.20
4	12.91	12.99	0.09	0.03 to 0.14	±0.20
5	15.59	15.41	-0.18	-0.29 to -0.07	±0.20

Fit Model

Linear fit

RMSE | 0.20

Parameter	Estimate	SE	t	DF	p-value
Constant	2.165	0.15097	-	-	-
X	2.685	0.045518	-	-	-

2nd order polynomial fit

RMSE | 0.12

Parameter	Estimate	SE	t	DF	p-value
Constant	1.540	0.18863	-	-	-
X	3.221	0.14375	-	-	-
X ²	-0.08929	0.023505	-3.80	7	0.0067 ¹

¹ Nonlinear parameter is different from 0 at the 5% significance level.

3rd order polynomial fit

RMSE | 0.13

Parameter	Estimate	SE	t	DF	p-value
Constant	1.470	0.46623	-	-	-
X	3.319	0.60943	-	-	-
X ²	-0.1268	0.22620	-0.56	6	0.5954
X ³	0.004167	0.024975	0.17	6	0.8730