

	Raw Data				Log Data		
	Simple	Full	Post		Simple	Full	Post
Intercept	0.626	15.597	12.026 *	(Intercept)	16.329***	-74.749	-83.127*
	(2.457)	(11.596)	(4.935)		(4.060)	(62.095)	(29.940)
Ti.Al	226.403 ***	-184.52 4	-143.9 20	Ti.Al	2.394**	-7.372	-12.874
	(61.557)	(319.35 7)	(94.83 5)		(0.782)	(29.283)	(12.958)
Si.Al	-0.928* *	-0.241		Si.Al	-0.810+	1.064	0.106
	(0.333)	(1.994)			(0.446)	(5.287)	(2.686)
P.Al	19.550	1519.12 5	1867.6 32**	P.Al	-0.078	-1.163	1.041
	(184.51 2)	(2314.5 83)	(614.1 27)		(0.228)	(11.712)	(5.235)
Ni.Al	6.478	-15569. 341+	-1530 7.441* *	Ni.Al	-0.027	-8.845	-9.307+
	(653.85 0)	(8073.3 03)	(3947. 721)		(0.358)	(10.147)	(5.071)

Raw Data				Log Data			
	Simple	Full	Post		Simple	Full	Post
Cu.Al	1051.81 8**	18556.7 85+	20389. 997**	Cu.Al	0.320+	−2.514	−3.404
	(307.47 6)	(8628.0 58)	(5549. 881)		(0.177)	(4.737)	(2.559)
U.Al	874.910	1676.36 4	1430.0 28	U.Al	0.411	−6.561	−5.569+
	(1012.6 13)	(3441.8 38)	(2240. 033)		(0.245)	(6.108)	(2.731)
Mo.Al	2003.80 9***	2016.73 6	1293.0 89	Mo.Al	0.458**	−2.006	−3.649*
	(469.84 5)	(2437.6 28)	(903.6 41)		(0.126)	(3.571)	(1.466)
Fe.Al	−5.512	−5.299	−3.222	Fe.Al	−0.448*	4.142	3.288
	(4.005)	(9.052)	(5.771)		(0.199)	(5.905)	(2.675)
Zr.Al	−2027.5 11*	−2064.1 40+	−2036. 758**	Zr.Al	−0.155	0.173	0.226+
	(879.90 7)	(1120.3 84)	(658.9 88)		(0.102)	(0.228)	(0.128)

	Raw Data			Log Data		
	Simple	Full	Post	Simple	Full	Post
Ti.Al × Si.Al		-3.203		Ti.Al × Si.Al	-1.588	-1.683
		(35.594)			(2.399)	(1.229)
Ti.Al × Ni.Al		212557. 166+	20426 7.700* *	Ti.Al × Ni.Al	-1.729	-1.764
		(115135 .850)	(7030 4.851)		(5.312)	(2.157)
Ti.Al × Cu.Al		-19137 1.925	-2209 76.656 *	Ti.Al × Cu.Al	0.273	-0.449
		(229014 .030)	(9803 3.400)		(2.096)	(0.917)
Si.Al × P.Al		94.052		Si.Al × P.Al	1.005	0.852
		(370.80 8)			(0.977)	(0.564)
P.Al × Ni.Al		-11086 72.026	-1106 309.91 2**	P.Al × Ni.Al	0.404	0.445

Raw Data			Log Data		
Simple	Full	Post	Simple	Full	Post
	(972496 .215)	(3344 48.449)		(2.056)	(0.838)
P.Al × Cu.Al	167035. 211	P.Al × Cu.Al		-0.324	
	(107262 3.303)			(0.725)	
P.Al × Mo.Al	-62114. 455	P.Al × Mo.Al		-0.052	-0.125
	(323953 .007)			(0.204)	(0.098)
Ni.Al × Fe.Al	8445.41 6	8687.7 90+	Ni.Al × Fe.Al	0.480	0.503
	(14714. 848)	(4320. 856)		(0.741)	(0.428)
Ni.Al × Mo.Al	160758 5.535	18021 17.228 *	Ni.Al × Mo.Al	0.108	
	(155725 5.946)	(6850 29.154)		(0.521)	

Raw Data				Log Data			
	Simple	Full	Post		Simple	Full	Post
Ni.Al × U.Al		−19089 21.405	−1935 629.59 4	Ni.Al × U.Al		−0.941	−0.927*
		(271296 5.636)	(1403 540.00 7)			(1.044)	(0.411)
Cu.Al × Fe.Al		−20702. 818+	−2062 2.940* *	Cu.Al × Fe.Al		0.086	
		(10745. 142)	(6112. 191)			(0.499)	
Cu.Al × Mo.Al		−31783 76.774* *	−3171 616.73 3***	Cu.Al × Mo.Al		−0.288	−0.414*
		(977416 .177)	(6065 66.726)			(0.298)	(0.159)
Cu.Al × U.Al		203163 62.992*	21255 773.72 7**	Cu.Al × U.Al		−0.050	
		(879793 2.238)	(5822 041.63 8)			(0.739)	

	Raw Data				Log Data		
	Simple	Full	Post		Simple	Full	Post
Mo.Al × Fe.Al		4434.63 2	3601.1 24*	Mo.Al × Fe.Al		0.040	
		(3506.8 88)	(1337. 239)			(0.340)	
U.Al × Mo.Al		−32939 89.113*	−2982 093.94 1***	U.Al × Mo.Al		−0.064	
		(148042 8.792)	(6854 10.894)			(0.225)	
Num.Obs .	38	38	38	Num.Obs.	38	38	38
R2	0.748	0.959	0.957	R2	0.840	0.946	0.943
R2 Adj.	0.668	0.882	0.911	R2 Adj.	0.788	0.845	0.888
AIC	210.1	171.5	163.3	AIC	91.9	80.8	70.8
BIC	228.1	214.1	197.7	BIC	109.9	123.4	103.6
Log.Lik.	−94.057	−59.758	−60.66 7	Log.Lik.	−34.956	−14.421	−15.424
F	9.254	12.55	20.880	F	16.288	9.412	17.344

	Raw Data				Log Data		
	Simple	Full	Post		Simple	Full	Post
RMSE	2.88	1.17	1.19	RMSE	0.61	0.35	0.36
+ p < 0.1, * p < 0.05, ** p < 0.01, *** p < 0.001				+ p < 0.1, * p < 0.05, ** p < 0.01, *** p < 0.001			

Tukey Data			
	Simple	Full	Post
(Intercept)	119.945*	-157.798	-162.945
	(47.791)	(406.526)	(208.342)
Ti.Al	84.610*	43.637	62.063
	(35.722)	(242.298)	(166.605)
Si.Al	-16.788+	-990.657+	-824.834*
	(8.668)	(547.569)	(390.478)
P.Al	4.139	287.638	323.298*
	(15.008)	(310.158)	(146.464)
Ni.Al	0.257	43.247	35.423*
	(0.254)	(32.790)	(16.413)
Cu.Al	0.039+	-4.441+	-4.219*
	(0.019)	(2.441)	(1.567)
U.Al	3.311	-53.081	-59.476*

Tukey Data

	Simple	Full	Post
	(3.284)	(40.722)	(23.494)
Mo.Al	35.488*	356.269	420.074+
	(14.562)	(360.780)	(209.090)
Fe.Al	-8.738*	-111.223+	-120.533**
	(3.308)	(55.907)	(39.043)
Zr.Al	-222.194	-380.532	-384.184+
	(132.482)	(260.739)	(208.288)
Ti.Al × Si.Al		-662.691	-530.662+
		(404.280)	(276.255)
Ti.Al × Ni.Al		43.520+	39.783*
		(22.475)	(14.188)
Ti.Al × Cu.Al		-3.882+	-3.875*
		(1.820)	(1.378)
Si.Al × P.Al		440.371+	425.006*
		(216.208)	(187.335)
P.Al × Ni.Al		-1.915	
		(14.369)	
P.Al × Cu.Al		-0.116	
		(0.897)	

Tukey Data

		Simple	Full	Post
P.Al	×		-346.341	-384.636
Mo.Al				
			(493.804)	(223.283)
Ni.Al	×		-5.498+	-5.710**
Fe.Al				
			(2.899)	(1.742)
Ni.Al	×		14.704	18.391*
Mo.Al				
			(9.581)	(6.631)
Ni.Al	×		-4.421	-5.234**
U.Al				
			(2.548)	(1.626)
Cu.Al	×		0.088	
Fe.Al				
			(0.166)	
Cu.Al	×		0.340	
Mo.Al				
			(0.696)	
Cu.Al	×		0.130	0.185
U.Al				
			(0.187)	(0.109)
Mo.Al	×		221.809+	219.493*
Fe.Al				
			(117.605)	(93.547)
U.Al	×		43.784	54.613
Mo.Al				

Tukey Data

	Simple	Full	Post
		(78.022)	(46.809)
Num.Obs.	38	38	38
R2	0.798	0.934	0.932
R2 Adj.	0.734	0.811	0.851
AIC	190.5	178.2	171.4
BIC	208.5	220.8	207.4
Log.Lik.	-84.263	-63.117	-63.684
F	12.319	7.635	11.603
RMSE	2.22	1.27	1.29

+ $p < 0.1$, * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$