

## White Wine

**Analysis Dates:** 30 January- 5 February 2020

**Report Date:** 17 February 2022



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## Notes

- (1) Due to the low number of submitted results for methanol, there was insufficient data to produce a Youden plot or generate Z-Scores. Basic statistics were included for information purposes only.

Free Sulfur Dioxide	Sample A	Sample B
No of cases	183	183
Minimum	18.4	21.0
Maximum	35.0	34.0
Range	16.6	13.0
Median	27.2	27.2
<b>Mean</b>	<b>27.5</b>	<b>27.5</b>
95% CI Upper	27.9	27.9
95% CI Lower	27.2	27.2
<b>Standard Dev</b>	<b>2.5</b>	<b>2.5</b>
CV	9.10%	9.26%
Lab Result		
Lab Z-Score		

Total Sulfur Dioxide	Sample A	Sample B
No of cases	177	177
Minimum	90.7	90.7
Maximum	118.0	117.0
Range	27.3	26.3
Median	104.0	104.0
<b>Mean</b>	<b>103.9</b>	<b>104.1</b>
95% CI Upper	104.5	104.7
95% CI Lower	103.2	103.4
<b>Standard Dev</b>	<b>4.4</b>	<b>4.6</b>
CV	4.21%	4.44%
Lab Result		
Lab Z-Score		

pH	Sample A	Sample B
No of cases	186	186
Minimum	3.15	3.17
Maximum	3.45	3.45
Range	0.30	0.28
Median	3.31	3.31
<b>Mean</b>	<b>3.31</b>	<b>3.31</b>
95% CI Upper	3.31	3.31
95% CI Lower	3.30	3.30
<b>Standard Dev</b>	<b>0.04</b>	<b>0.04</b>
CV	1.34%	1.30%
Lab Result		
Lab Z-Score		

Titrateable Acidity to pH 7.0	Sample A	Sample B
No of cases	35	35
Minimum	5.65	5.70
Maximum	6.40	6.40
Range	0.75	0.70
Median	5.90	5.90
<b>Mean</b>	<b>5.96</b>	<b>5.96</b>
95% CI Upper	6.03	6.03
95% CI Lower	5.89	5.89
<b>Standard Dev</b>	<b>0.21</b>	<b>0.21</b>
CV	3.58%	3.60%
Lab Result		
Lab Z-Score		

Titrateable Acidity to pH 8.2	Sample A	Sample B
No of cases	168	168
Minimum	5.87	5.89
Maximum	7.30	7.30
Range	1.43	1.41
Median	6.41	6.42
<b>Mean</b>	<b>6.46</b>	<b>6.46</b>
95% CI Upper	6.49	6.49
95% CI Lower	6.42	6.42
<b>Standard Dev</b>	<b>0.21</b>	<b>0.21</b>
CV	3.25%	3.29%
Lab Result		
Lab Z-Score		

Alcohol	Sample A	Sample B
No of cases	174	174
Minimum	11.70	11.78
Maximum	12.40	12.40
Range	0.70	0.62
Median	12.11	12.11
<b>Mean</b>	<b>12.09</b>	<b>12.09</b>
95% CI Upper	12.10	12.11
95% CI Lower	12.07	12.08
<b>Standard Dev</b>	<b>0.11</b>	<b>0.10</b>
CV	0.93%	0.84%
Lab Result		
Lab Z-Score		

Specific Gravity	Sample A	Sample B
No of cases	138	138
Minimum	0.9910	0.9910
Maximum	0.9952	0.9952
Range	0.0042	0.0042
Median	0.9941	0.9942
<b>Mean</b>	<b>0.9939</b>	<b>0.9939</b>
95% CI Upper	0.9940	0.9941
95% CI Lower	0.9938	0.9938
<b>Standard Dev</b>	<b>0.0007</b>	<b>0.0007</b>
CV	0.08%	0.07%
Lab Result		
Lab Z-Score		

Dissolved Carbon Dioxide	Sample A	Sample B
No of cases	83	83
Minimum	0.81	0.72
Maximum	1.26	1.33
Range	0.45	0.61
Median	1.06	1.06
<b>Mean</b>	<b>1.06</b>	<b>1.06</b>
95% CI Upper	1.08	1.09
95% CI Lower	1.04	1.04
<b>Standard Dev</b>	<b>0.08</b>	<b>0.10</b>
CV	7.90%	9.16%
Lab Result		
Lab Z-Score		

Reducing Sugars	Sample A	Sample B
No of cases	52	52
Minimum	4.07	4.07
Maximum	6.25	7.00
Range	2.18	2.93
Median	5.40	5.42
<b>Mean</b>	<b>5.32</b>	<b>5.38</b>
95% CI Upper	5.45	5.52
95% CI Lower	5.20	5.24
<b>Standard Dev</b>	<b>0.45</b>	<b>0.51</b>
CV	8.45%	9.51%
Lab Result		
Lab Z-Score		

Glucose + Fructose	Sample A	Sample B
No of cases	148	148
Minimum	2.40	2.40
Maximum	4.45	4.60
Range	2.05	2.20
Median	3.79	3.80
<b>Mean</b>	<b>3.72</b>	<b>3.73</b>
95% CI Upper	3.78	3.78
95% CI Lower	3.67	3.67
<b>Standard Dev</b>	<b>0.35</b>	<b>0.34</b>
CV	9.36%	9.24%
Lab Result		
Lab Z-Score		

Volatile Acidity	Sample A	Sample B
No of cases	78	78
Minimum	0.05	0.04
Maximum	0.41	0.43
Range	0.36	0.39
Median	0.23	0.23
<b>Mean</b>	<b>0.24</b>	<b>0.24</b>
95% CI Upper	0.25	0.26
95% CI Lower	0.22	0.22
<b>Standard Dev</b>	<b>0.07</b>	<b>0.07</b>
CV	28.81%	30.72%
Lab Result		
Lab Z-Score		

Acetic Acid	Sample A	Sample B
No of cases	107	107
Minimum	0.09	0.04
Maximum	0.34	0.32
Range	0.25	0.28
Median	0.19	0.19
<b>Mean</b>	<b>0.20</b>	<b>0.20</b>
95% CI Upper	0.21	0.21
95% CI Lower	0.19	0.19
<b>Standard Dev</b>	<b>0.05</b>	<b>0.05</b>
CV	22.63%	22.63%
Lab Result		
Lab Z-Score		

Malic Acid	Sample A	Sample B
No of cases	129	129
Minimum	1.65	1.63
Maximum	2.99	2.93
Range	1.34	1.30
Median	2.14	2.15
<b>Mean</b>	<b>2.14</b>	<b>2.15</b>
95% CI Upper	2.18	2.18
95% CI Lower	2.11	2.12
<b>Standard Dev</b>	<b>0.20</b>	<b>0.20</b>
CV	9.23%	9.09%
Lab Result		
Lab Z-Score		

Citric Acid	Sample A	Sample B
No of cases	20	20
Minimum	0.25	0.25
Maximum	0.38	0.40
Range	0.13	0.15
Median	0.30	0.30
<b>Mean</b>	<b>0.31</b>	<b>0.31</b>
95% CI Upper	0.32	0.32
95% CI Lower	0.29	0.29
<b>Standard Dev</b>	<b>0.03</b>	<b>0.03</b>
CV	10.10%	11.01%
Lab Result		
Lab Z-Score		

Turbidity	Sample A	Sample B
No of cases	161	161
Minimum	0.00	0.00
Maximum	0.89	0.88
Range	0.89	0.88
Median	0.37	0.37
<b>Mean</b>	<b>0.38</b>	<b>0.38</b>
95% CI Upper	0.40	0.41
95% CI Lower	0.36	0.36
<b>Standard Dev</b>	<b>0.16</b>	<b>0.16</b>
CV	41.95%	40.40%
Lab Result		
Lab Z-Score		

Sugar Free Extract	Sample A	Sample B
No of cases	19	19
Minimum	19.1	19.8
Maximum	26.5	26.5
Range	7.4	6.7
Median	21.3	21.4
<b>Mean</b>	<b>21.8</b>	<b>21.9</b>
95% CI Upper	22.6	22.7
95% CI Lower	20.9	21.1
<b>Standard Dev</b>	<b>1.9</b>	<b>1.8</b>
CV	8.86%	8.07%
Lab Result		
Lab Z-Score		

Methanol	Sample A	Sample B
No of cases	7	7
Minimum	55.0	40.0
Maximum	78.0	73.0
Range	23.0	33.0
Median	68.0	65.6
<b>Mean</b>	<b>67.7</b>	<b>63.9</b>
<b>Standard Dev</b>	<b>8.7</b>	<b>11.3</b>
CV	12.84%	17.72%
Lab Result		
Lab Z-Score		

Potassium	Sample A	Sample B
No of cases	20	20
Minimum	475	485
Maximum	646	632
Range	171	147
Median	520	518
<b>Mean</b>	<b>530</b>	<b>525</b>
95% CI Upper	548	540
95% CI Lower	512	510
<b>Standard Dev</b>	<b>40</b>	<b>34</b>
CV	7.62%	6.55%
Lab Result		
Lab Z-Score		

Sodium	Sample A	Sample B
No of cases	20	20
Minimum	20	20
Maximum	35	35
Range	15	15
Median	27	27
<b>Mean</b>	<b>27</b>	<b>28</b>
95% CI Upper	29	29
95% CI Lower	26	26
<b>Standard Dev</b>	<b>3</b>	<b>3</b>
CV	12.46%	12.48%
Lab Result		
Lab Z-Score		

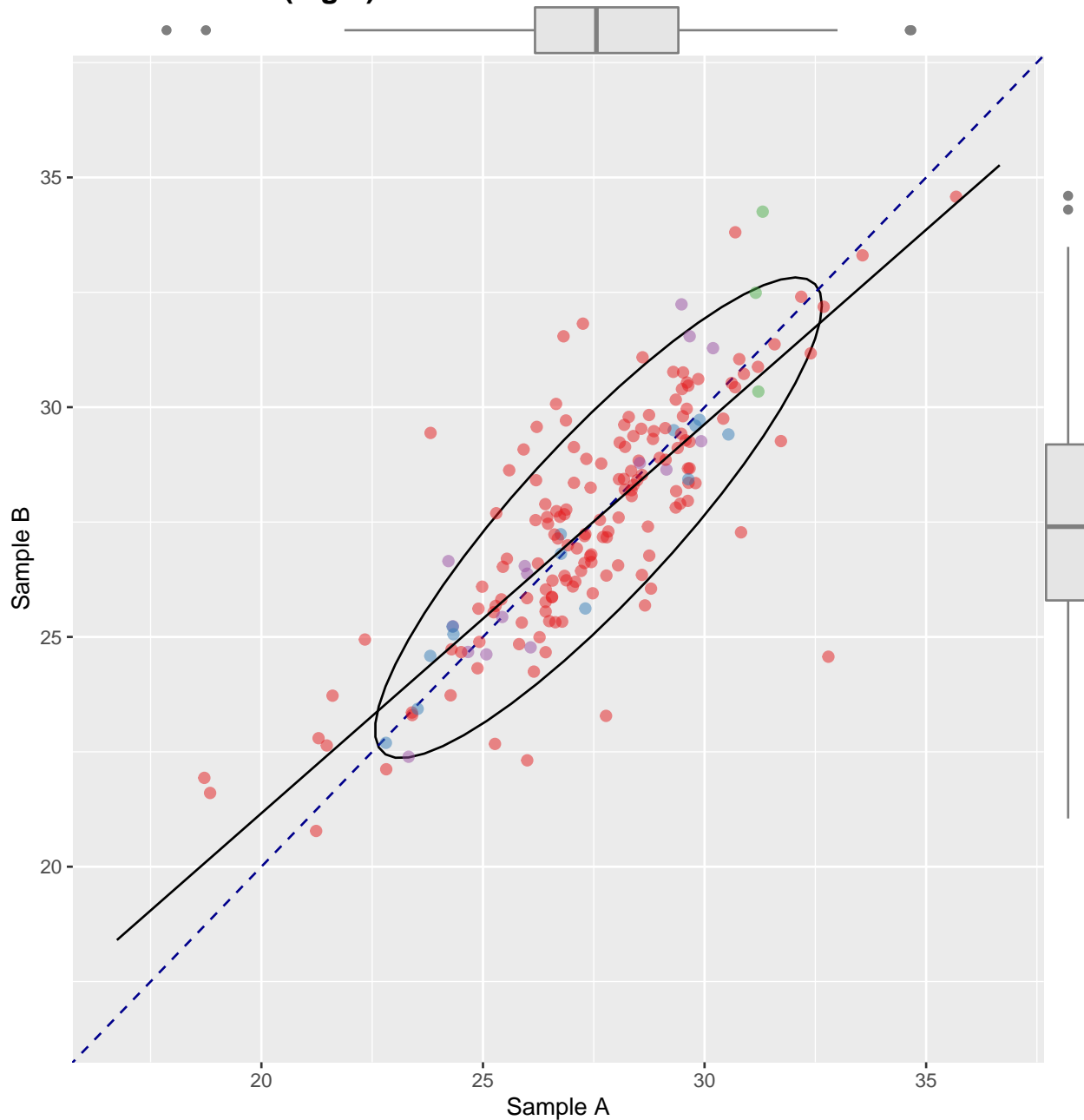
Calcium	Sample A	Sample B
No of cases	27	27
Minimum	43	44
Maximum	70	72
Range	27	28
Median	62	61
<b>Mean</b>	<b>60</b>	<b>60</b>
95% CI Upper	62	63
95% CI Lower	57	58
<b>Standard Dev</b>	<b>7</b>	<b>7</b>
CV	11.06%	11.06%
Lab Result		
Lab Z-Score		

Copper	Sample A	Sample B
No of cases	29	29
Minimum	0.20	0.19
Maximum	0.35	0.34
Range	0.15	0.15
Median	0.27	0.27
<b>Mean</b>	<b>0.27</b>	<b>0.27</b>
95% CI Upper	0.28	0.28
95% CI Lower	0.25	0.25
<b>Standard Dev</b>	<b>0.04</b>	<b>0.04</b>
CV	13.86%	14.53%
Lab Result		
Lab Z-Score		

Iron	Sample A	Sample B
No of cases	24	24
Minimum	1.00	1.00
Maximum	1.41	1.39
Range	0.41	0.39
Median	1.23	1.21
<b>Mean</b>	<b>1.22</b>	<b>1.21</b>
95% CI Upper	1.26	1.25
95% CI Lower	1.18	1.18
<b>Standard Dev</b>	<b>0.10</b>	<b>0.09</b>
CV	7.90%	7.42%
Lab Result		
Lab Z-Score		

Manganese	Sample A	Sample B
No of cases	16	16
Minimum	1.75	1.74
Maximum	3.30	3.29
Range	1.54	1.55
Median	2.71	2.74
<b>Mean</b>	<b>2.76</b>	<b>2.76</b>
95% CI Upper	2.93	2.93
95% CI Lower	2.59	2.59
<b>Standard Dev</b>	<b>0.35</b>	<b>0.35</b>
CV	12.51%	12.66%
Lab Result		
Lab Z-Score		

# Free Sulfur Dioxide (mg/L)



Method ● Aspiration ● Automated Colourimetric ● Ripper ● Other

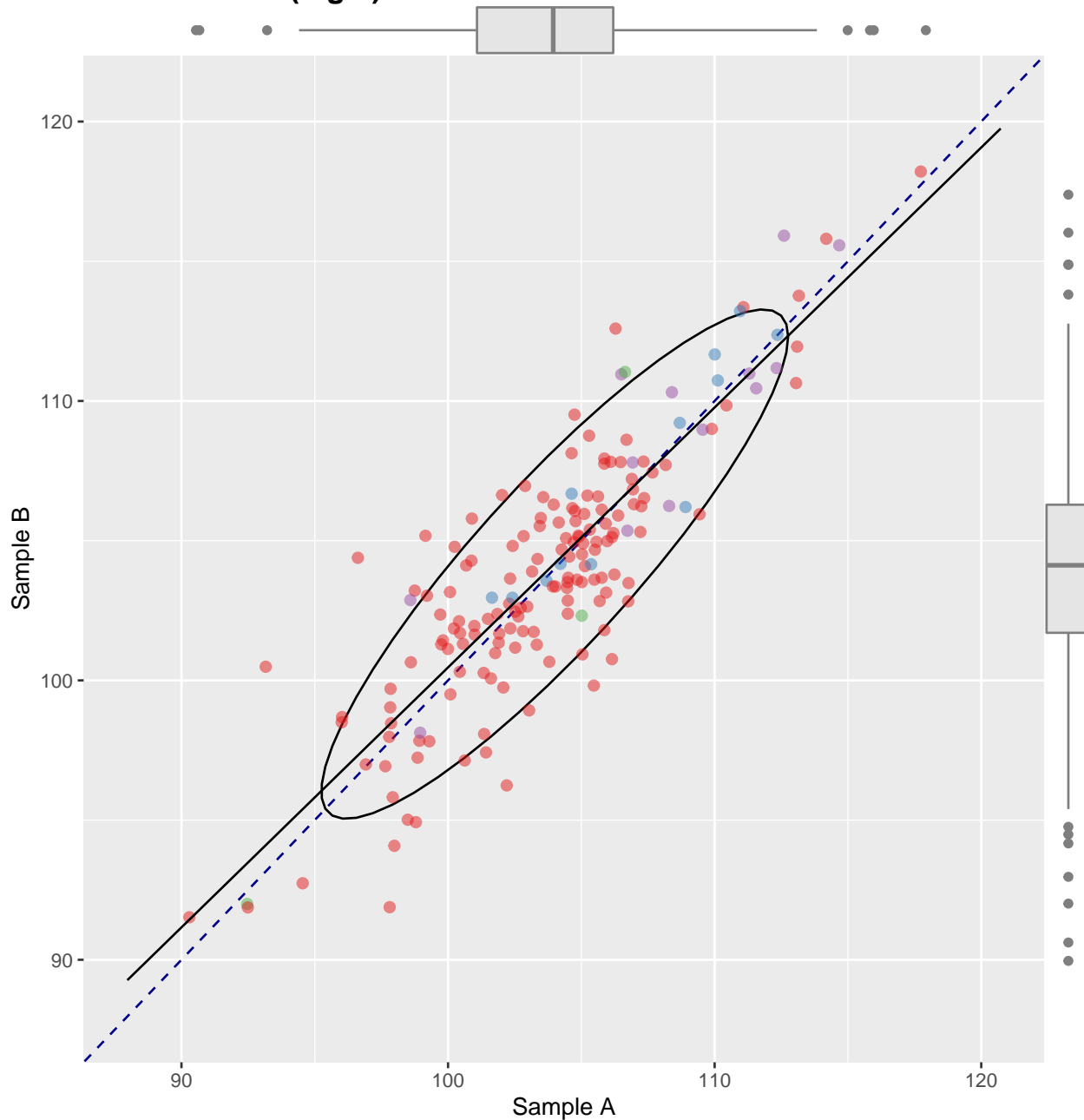
Sample	A	B
No of cases	183	183
Minimum	18.4	21.0
Maximum	35.0	34.0
Range	16.6	13.0
Median	27.2	27.2
<b>Mean</b>	<b>27.5</b>	<b>27.5</b>
95% CI Upper	27.9	27.9
95% CI Lower	27.2	27.2
<b>Standard Deviation</b>	<b>2.5</b>	<b>2.5</b>
Coefficient of Variation	9.10%	9.26%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Aspiration	152
Automated Colourimetric	13
Ripper	3
Other	15

## Free Sulfur Dioxide Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
1	0.6	0.6	94	-0.6	-0.6	188	-1.8	-1.0	288	0.5	0.5	397	1.0	0.2			
3	0.2	0.2	95	-0.2	-0.2	189	-0.2	-0.2	289	-0.1	-0.8	398	0.6	0.6			
5	0.2	0.2	96	1.0	0.2	192	-0.6	-0.6	293	1.0	1.4	399	-0.2	0.4			
9	-0.4	-0.1	98	0.6	-0.2	198	-1.4	-1.8	295	0.2	0.2	400	-1.8	-1.8			
10	0.6	0.2	99	-1.0	-1.0	199	-1.8	-2.2	297	1.4	1.4	404	0.6	0.2			
12	0.2	0.6	103	0.2	0.2	201	-1.0	-1.0	301	-2.4	-2.5	409	-0.2	-0.2			
14	0.6	0.6	105	0.2	1.4	204	-1.4	-0.6	303	-0.2	-1.4	412	-0.6	-0.6			
19	-1.4	-1.8	106	-0.2	-0.6	205	0.2	-1.0	306	-1.0	-0.2	416	-1.0	-1.4			
20	-1.0	-1.0	107	0.2	-0.6	208	-1.0	-1.0	307	-0.6	-0.6	417	-3.6	-2.3			
21	1.0	1.4	108	-0.2	-0.2	211	-1.0	-1.4	308	-1.4	-1.3	425	0.2	0.6			
23	1.1	0.9	116	1.0	1.0	212	1.0	1.0	309	-0.6	-0.2	426	-0.6	-1.8			
25	2.4	-1.4	118	-0.2	-0.2	213	-0.6	-0.6	315	-0.2	0.6	437	-0.2	-0.6			
29	1.0	1.0	122	-0.6	-0.6	214	-0.2	-0.2	318	-0.6	-0.2	438	-2.2	-2.2			
31	-0.2	-1.0	126	-0.6	-0.6	215	1.8	1.8	326	0.6	0.6	444	-0.6	-0.2			
34	-0.4	0.5	129	0.6	0.6	216	-0.2	1.8	327	-0.2	-0.2	445	-0.2	1.0			
36	0.6	0.6	131	-1.0	-0.6	217	-0.6	-1.0	332	-1.0	-1.0	449	0.5	1.1			
39	-0.6	-0.6	132	-0.2	-0.2	220	0.6	0.6	334	-0.2	-0.2	455	-0.2	-0.2			
41	0.6	-0.4	135	0.6	0.6	223	0.6	0.2	340	-0.6	-0.3	464	-1.0	-1.0			
43	-0.6	-0.6	138	0.6	0.6	225	0.6	1.0	342	-0.4	-0.1	471	1.4	2.4			
45	0.6	0.6	141	1.0	0.6	226	-0.7	-0.9	346	1.0	1.0	474	-0.2	1.0			
47	-3.4	-2.6	142	-2.0	-1.4	227	-0.6	-1.0	356	0.5	-0.1	483	-2.2	-1.8			
49	-1.4	-1.4	143	0.5	0.5	233	0.6	1.0	357	1.0	0.6	487	-0.6	-0.6			
51	-0.6	0.2	144	-1.4	0.6	236	-0.2	-0.2	358	0.3	0.5	489	-0.2	-0.2			
53	0.2	-0.2	145	-0.2	-0.2	238	-1.1	-1.1	360	0.3	-0.1						
55	-0.5	-1.0	152	1.2	1.1	242	1.8	1.0	361	1.1	1.7						
57	1.0	0.6	153	1.0	0.6	244	-0.2	-0.6	364	1.4	1.4						
59	-0.6	-2.2	155	1.2	1.1	245	-0.1	-0.5	365	1.0	1.0						
61	2.6	2.5	157	1.0	0.6	247	-1.4	-1.4	366	-0.2	-0.6						
63	0.8	1.0	165	0.2	-0.2	250	1.4	2.5	367	-0.1	-0.1						
64	1.0	1.0	167	1.4	1.8	253	1.0	1.0	369	-0.6	-0.2						
66	0.6	0.2	169	3.0	2.5	261	0.2	-0.6	375	-0.2	-0.2						
72	0.6	-0.2	171	0.2	0.2	266	-1.4	-1.4	378	-0.6	0.2						
78	0.2	0.2	172	0.6	0.2	267	0.6	0.6	380	-2.2	-1.8						
79	0.0	0.2	173	0.6	0.6	270	1.4	1.0	382	-0.2	-0.2						
81	-0.6	-0.6	176	-0.8	-0.1	273	-0.2	0.2	385	0.2	-0.6						
84	1.0	1.4	177	0.6	0.6	276	0.6	1.0	386	1.8	1.8				Outliers		
85	-0.2	0.6	178	-0.8	-0.8	278	0.2	0.2	388	0.6	1.0				260	4.2	3.7
87	0.6	0.6	181	0.6	1.0	279	1.8	1.8	391	-0.2	-0.2				363	4.2	2.9
88	-0.6	0.2	182	0.6	0.6	281	1.8	1.8	393	-0.2	-0.6				368	-3.8	-3.7
90	0.2	0.6	183	0.6	0.6	286	0.2	0.2	396	-0.4	-0.8				428	-4.6	-3.9

# Total Sulfur Dioxide (mg/L)



Method ● Aspiration ● Automated Colourimetric ● Ripper ● Other

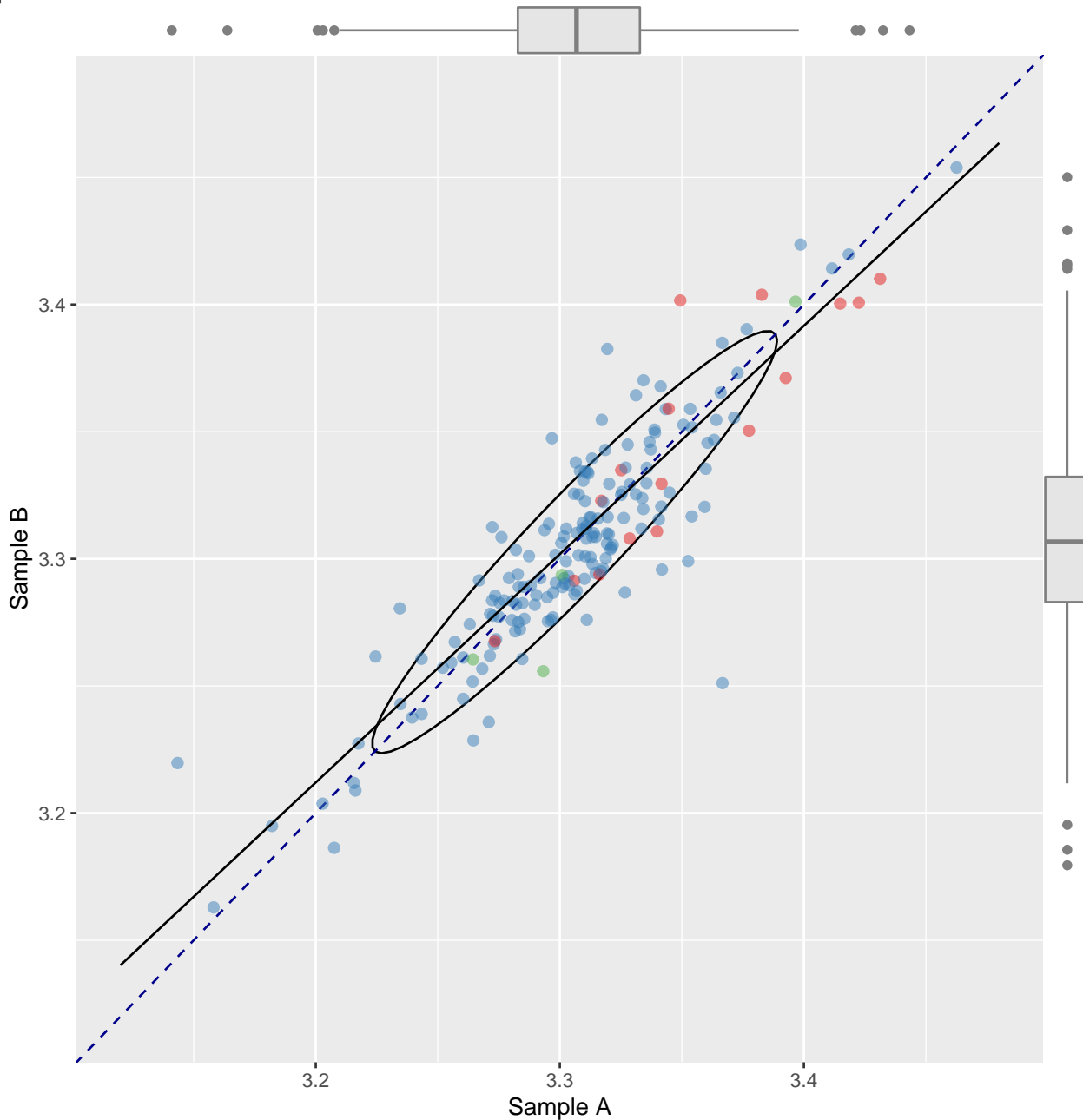
Sample	A	B
No of cases	177	177
Minimum	90.7	90.7
Maximum	118.0	117.0
Range	27.3	26.3
Median	104.0	104.0
<b>Mean</b>	<b>103.9</b>	<b>104.1</b>
95% CI Upper	104.5	104.7
95% CI Lower	103.2	103.4
<b>Standard Deviation</b>	<b>4.4</b>	<b>4.6</b>
Coefficient of Variation	4.21%	4.44%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Aspiration	149
Automated Colourimetric	12
Ripper	3
Other	13





pH



Method ● FTIR-MIR ● pH meter ● Other

Sample	A	B
No of cases	186	186
Minimum	3.15	3.17
Maximum	3.45	3.45
Range	0.30	0.28
Median	3.31	3.31
<b>Mean</b>	<b>3.31</b>	<b>3.31</b>
95% CI Upper	3.31	3.31
95% CI Lower	3.30	3.30
<b>Standard Deviation</b>	<b>0.04</b>	<b>0.04</b>
Coefficient of Variation	1.34%	1.30%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
FTIR-MIR	16
pH meter	166
Other	4

## pH Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
1	2.3	2.4	94	0.5	0.5	189	0.5	0.3	286	2.3	2.4	393	0.3	0.0			
3	-0.2	-0.2	95	-0.2	-0.2	192	-0.6	-0.7	288	-0.6	-0.7	396	-0.2	-0.4			
5	-2.0	-2.3	96	0.1	-0.2	198	-1.5	-1.4	289	0.5	0.5	397	-0.6	-0.7			
9	0.3	1.0	98	0.7	0.5	199	0.5	0.3	293	0.5	1.4	398	2.5	2.1			
10	-0.4	-0.4	99	-0.6	-0.7	201	-0.4	-0.7	295	0.1	0.0	399	0.7	0.5			
12	0.3	0.3	103	-0.2	-0.2	204	-0.4	-0.2	297	0.3	0.3	400	0.1	0.0			
14	0.3	0.5	105	-0.8	-0.9	205	0.5	1.7	301	-2.4	-2.5	404	-0.2	-0.2			
19	1.2	-1.4	106	0.5	0.7	208	-0.2	-0.2	303	1.2	1.2	409	1.4	1.4			
20	-0.2	-0.2	107	0.5	0.7	211	-0.2	0.5	306	0.5	0.5	412	0.3	-0.2			
21	-0.2	-0.4	108	0.1	0.0	212	0.3	0.5	307	-0.4	-0.4	416	2.1	2.1			
23	0.1	0.0	116	1.0	1.0	213	-0.6	-0.7	308	0.5	0.3	417	1.0	0.3			
25	-0.6	-0.7	118	0.5	1.0	214	-0.2	-0.2	309	-1.5	-1.6	425	1.4	1.2			
29	1.6	1.7	122	-2.6	-2.5	215	0.1	0.0	315	-0.2	-0.2	426	-0.6	-0.9			
31	0.1	0.0	126	0.5	1.0	216	0.3	0.3	318	-0.2	-0.2	428	0.7	0.0			
34	-3.1	-3.2	129	-0.6	-0.7	217	0.1	-0.2	326	-0.8	-0.9	437	-0.6	-0.7			
36	-0.2	-0.2	131	0.3	0.3	218	1.1	1.1	327	1.9	1.9	438	-1.3	-1.4			
39	-0.8	-0.7	132	0.1	0.0	220	0.3	0.3	332	-2.0	-2.1	444	1.2	1.2			
41	-0.2	-0.4	135	0.7	1.0	223	1.6	1.2	334	-0.6	-0.7	445	0.7	1.2			
43	3.2	3.3	138	-0.6	-0.7	225	0.7	1.0	340	-0.8	-0.9	449	0.3	0.5			
45	0.1	-0.2	141	-1.3	-1.1	226	-1.3	-1.1	342	0.7	0.7	455	1.0	0.0			
47	1.2	1.4	143	-0.2	0.0	227	-0.6	-0.7	346	0.7	1.0	464	-0.4	-0.2			
49	0.5	1.0	144	0.7	0.0	233	-0.4	-0.4	356	1.2	0.7	471	-1.1	-1.1			
51	2.3	2.6	145	-0.4	-0.2	236	0.1	0.3	357	-2.0	-0.9	474	0.5	-0.4			
53	-0.6	-0.7	152	-0.4	-0.7	238	0.1	0.0	358	0.5	0.3	483	1.0	0.5			
55	-1.1	-0.9	153	-0.2	-0.2	242	-3.5	-1.8	360	-0.8	-0.9	487	0.3	0.3			
57	-0.4	-0.7	155	0.5	0.5	244	-0.4	-0.4	361	0.5	0.3	489	-0.2	-0.2			
59	-0.6	-0.7	157	-1.5	-0.4	245	-1.1	-1.1	363	1.9	1.4						
61	0.7	0.3	165	-0.4	-0.4	247	0.1	0.3	364	0.7	1.0						
63	0.1	0.0	167	0.1	0.0	250	0.1	0.0	365	-0.2	0.3						
64	-1.1	-1.4	169	-0.6	-0.4	253	0.7	1.0	366	-0.2	-0.2						
66	-0.4	-0.4	171	0.3	0.5	260	-1.1	-1.6	367	-0.6	-0.4						
72	0.1	0.0	172	-1.7	-1.6	261	-0.2	-0.2	368	-0.2	0.7						
78	-0.4	-0.4	173	-0.2	-0.2	266	0.3	0.0	369	0.1	0.0						
79	-0.6	-0.9	176	-0.6	-0.7	267	1.0	1.2	375	0.1	0.0						
81	-0.8	-0.9	177	1.0	1.2	270	0.5	0.5	378	-0.6	-0.9						
84	-1.1	-1.1	178	-0.2	0.0	273	0.1	0.3	380	0.3	0.3						
85	-2.0	-1.4	181	0.3	0.5	276	2.5	2.6	382	-0.2	0.3						
87	-0.4	0.0	182	-0.4	-0.9	278	0.5	0.5	386	-0.6	-0.2						
88	-2.4	-2.5	183	0.1	0.0	279	0.7	0.5	388	0.1	-0.4						
90	-0.6	-0.9	188	1.0	2.1	281	1.9	1.9	391	-0.8	-0.9						

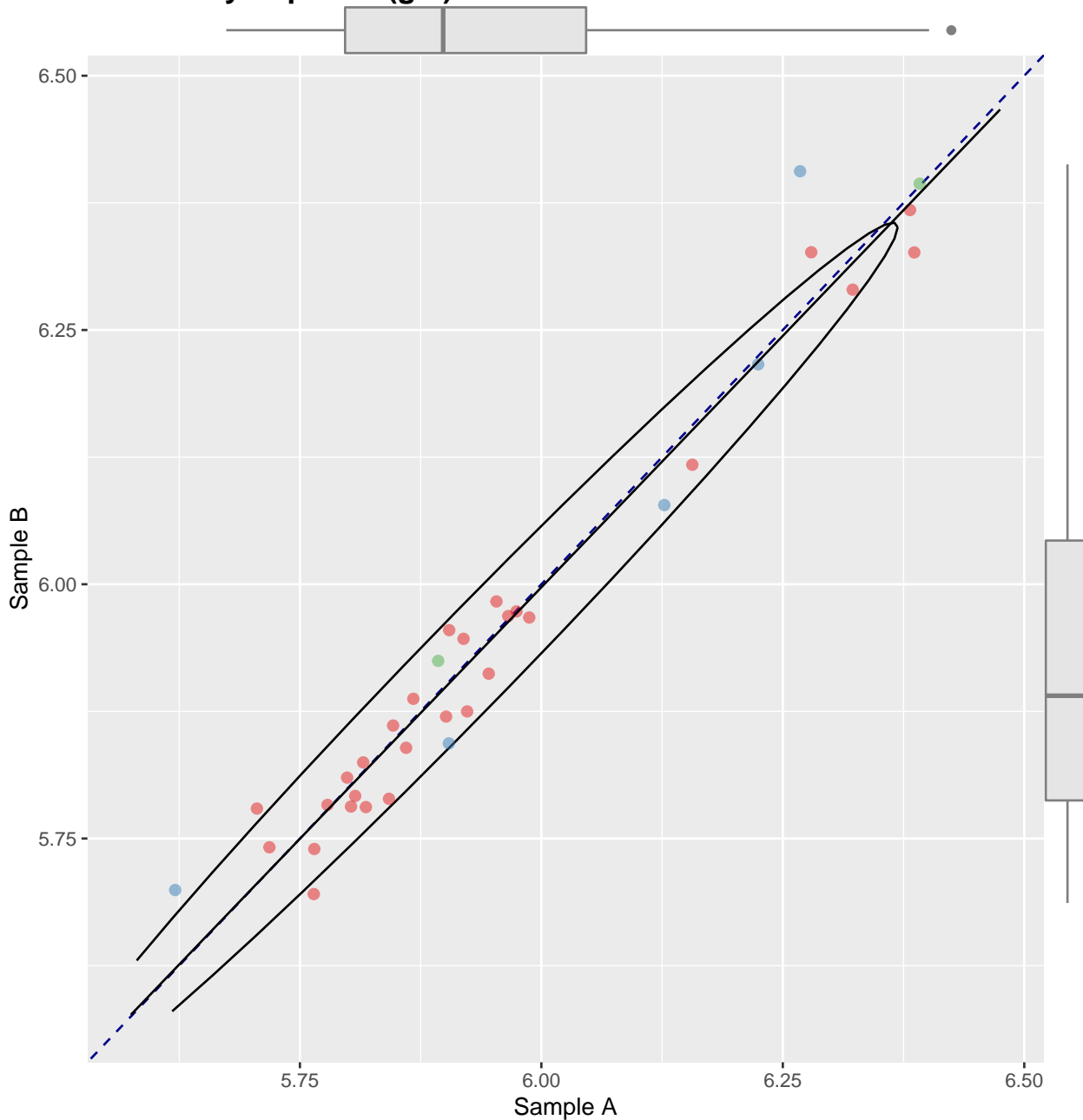
Outliers

385

5.0

5.1

# Titrateable Acidity to pH 7.0 (g/L)



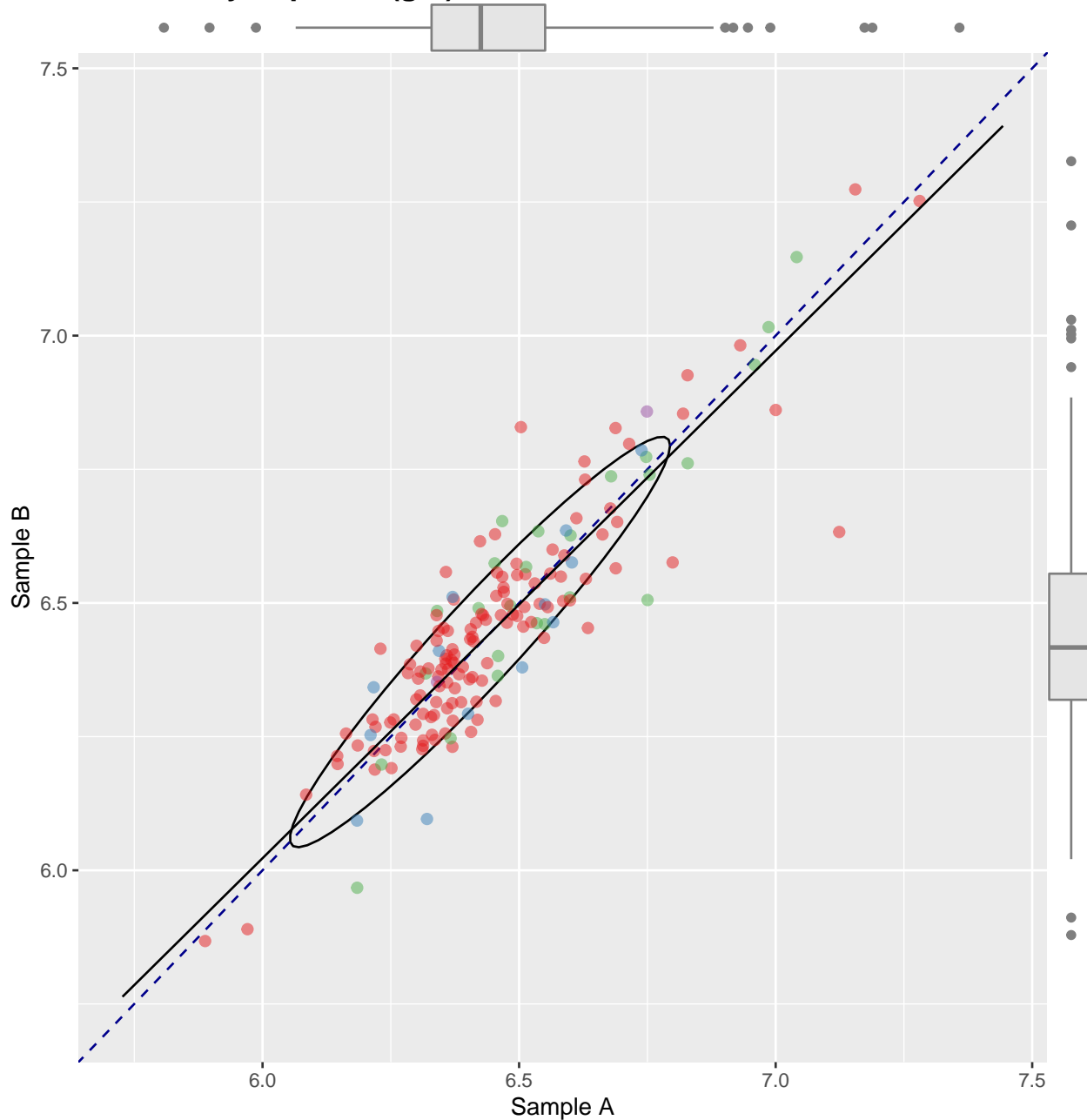
Method ● Autotitrator ● FTIR-MIR ● Other

Sample	A	B
No of cases	35	35
Minimum	5.65	5.70
Maximum	6.40	6.40
Range	0.75	0.70
Median	5.90	5.90
<b>Mean</b>	<b>5.96</b>	<b>5.96</b>
95% CI Upper	6.03	6.03
95% CI Lower	5.89	5.89
<b>Standard Deviation</b>	<b>0.21</b>	<b>0.21</b>
Coefficient of Variation	3.58%	3.60%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Autotitrator	28
FTIR-MIR	5
Other	2



# Titrateable Acidity to pH 8.2 (g/L)



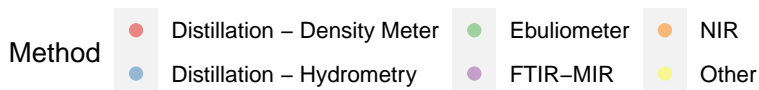
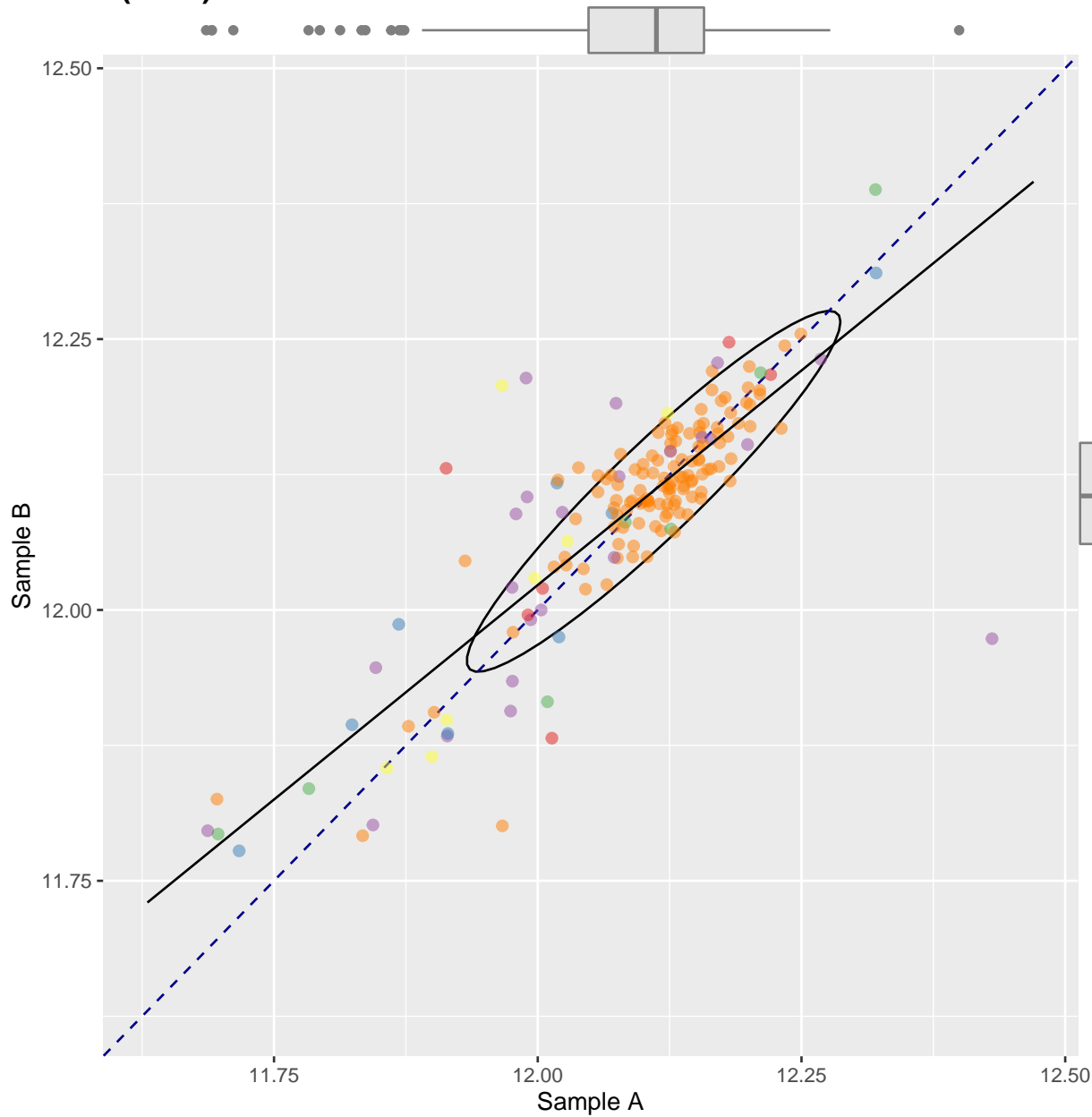
Method ● Autotitrator ● FTIR-MIR ● Manual Titration ● Other

Sample	A	B
No of cases	168	168
Minimum	5.87	5.89
Maximum	7.30	7.30
Range	1.43	1.41
Median	6.41	6.42
<b>Mean</b>	<b>6.46</b>	<b>6.46</b>
95% CI Upper	6.49	6.49
95% CI Lower	6.42	6.42
<b>Standard Deviation</b>	<b>0.21</b>	<b>0.21</b>
Coefficient of Variation	3.25%	3.29%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Autotitrator	128
FTIR-MIR	13
Manual Titration	25
Other	2



# Alcohol (%v/v)



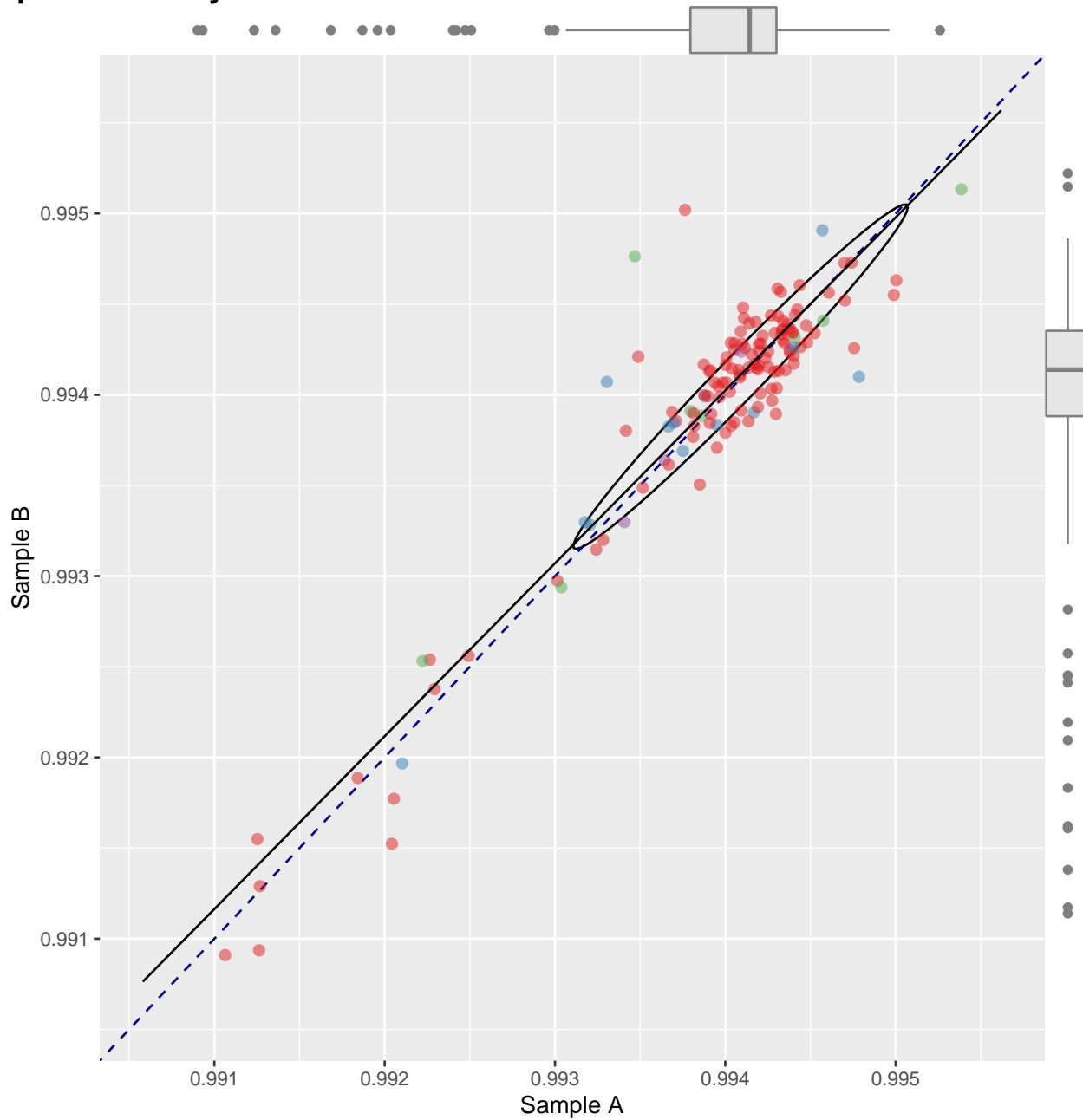
Sample	A	B
No of cases	174	174
Minimum	11.70	11.78
Maximum	12.40	12.40
Range	0.70	0.62
Median	12.11	12.11
<b>Mean</b>	<b>12.09</b>	<b>12.09</b>
95% CI Upper	12.10	12.11
95% CI Lower	12.07	12.08
<b>Standard Deviation</b>	<b>0.11</b>	<b>0.10</b>
Coefficient of Variation	0.93%	0.84%
Lab Result		
Lab Z–Score Result		
Other Result		

Method	Count
Distillation – Density Meter	6
Distillation – Hydrometry	8
Ebuliometer	7
FTIR–MIR	23
NIR	123
Other	7





# Specific Gravity



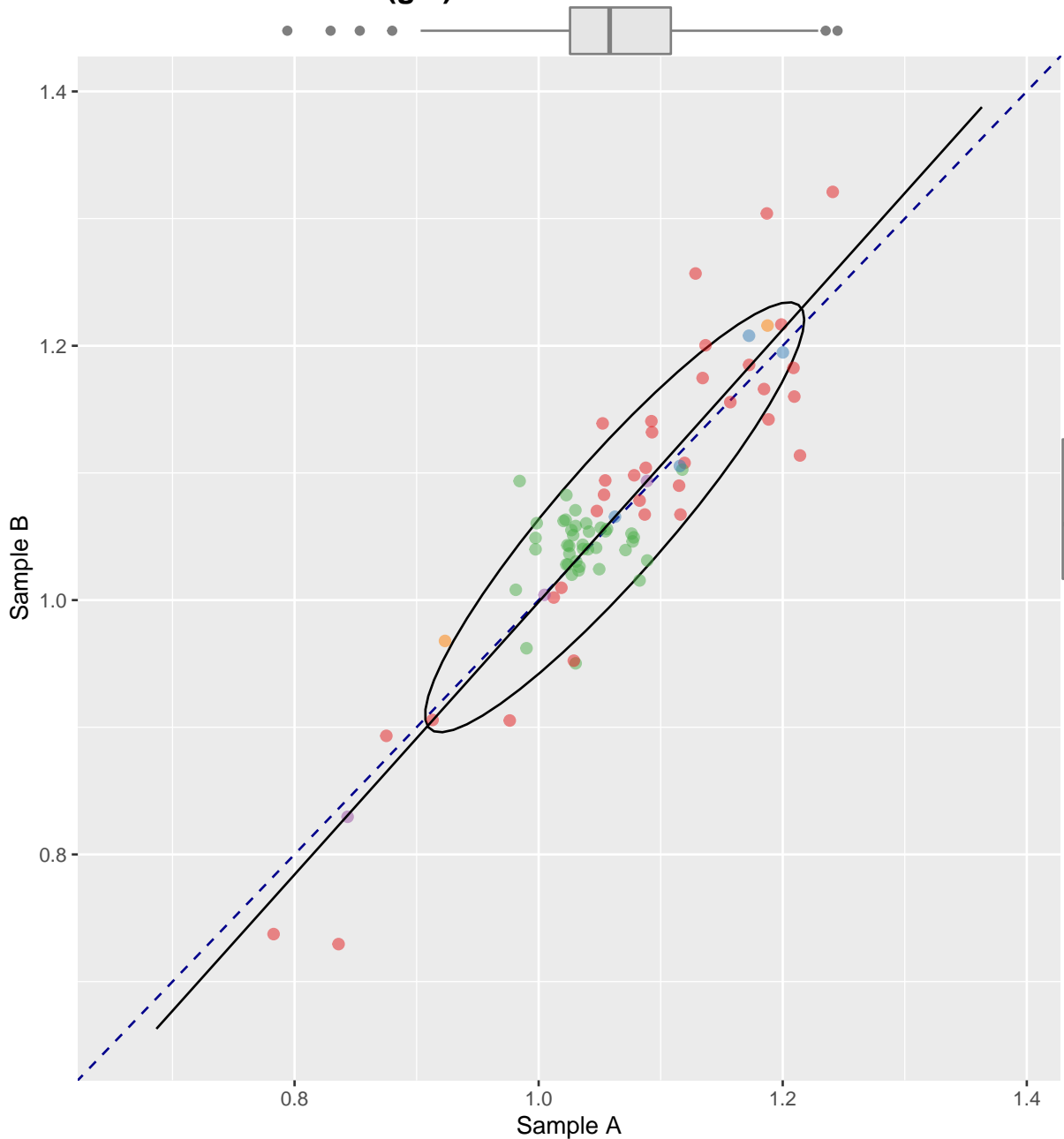
Method ● Density Meter ● FTIR-MIR ● Hydrometry ● Other

Sample	A	B
No of cases	138	138
Minimum	0.9910	0.9910
Maximum	0.9952	0.9952
Range	0.0042	0.0042
Median	0.9941	0.9942
<b>Mean</b>	<b>0.9939</b>	<b>0.9939</b>
95% CI Upper	0.9940	0.9941
95% CI Lower	0.9938	0.9938
<b>Standard Deviation</b>	<b>0.0007</b>	<b>0.0007</b>
Coefficient of Variation	0.08%	0.07%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Density Meter	114
FTIR-MIR	13
Hydrometry	8
Other	3



# Dissolved Carbon Dioxide (g/L)



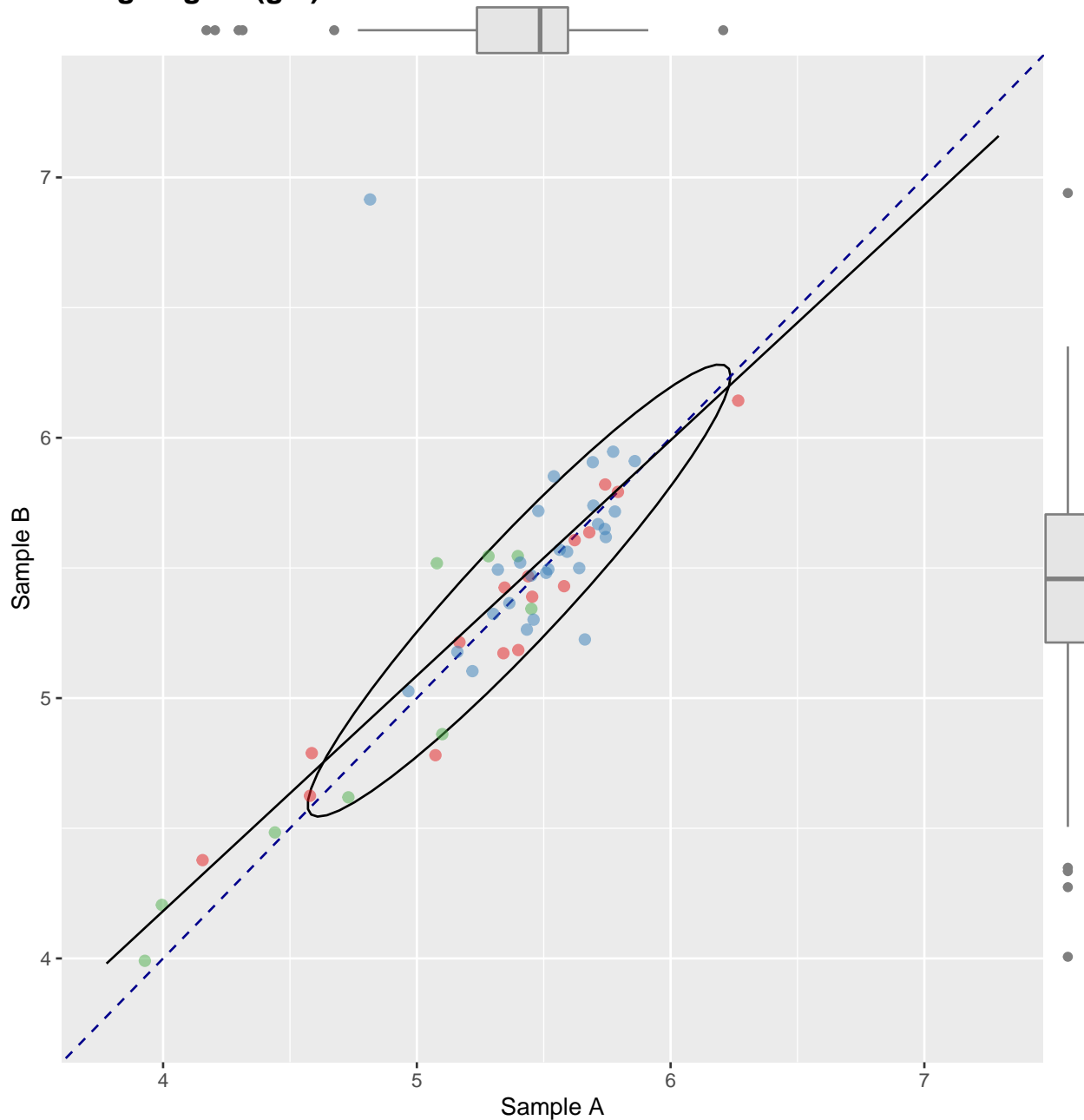
Sample	A	B
No of cases	83	83
Minimum	0.81	0.72
Maximum	1.26	1.33
Range	0.45	0.61
Median	1.06	1.06
<b>Mean</b>	<b>1.06</b>	<b>1.06</b>
95% CI Upper	1.08	1.09
95% CI Lower	1.04	1.04
<b>Standard Deviation</b>	<b>0.08</b>	<b>0.10</b>
Coefficient of Variation	7.90%	9.16%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Carbodoseur	34
FTIR-MIR	4
Multiple Volume Expansion	40
Thermal Conductivity Sensor	3
Other	2

Method ● Carbodoseur ● FTIR-MIR ● Multiple Volume Expansion ● Thermal Conductivity Sensor ● Other



# Reducing Sugars (g/L)



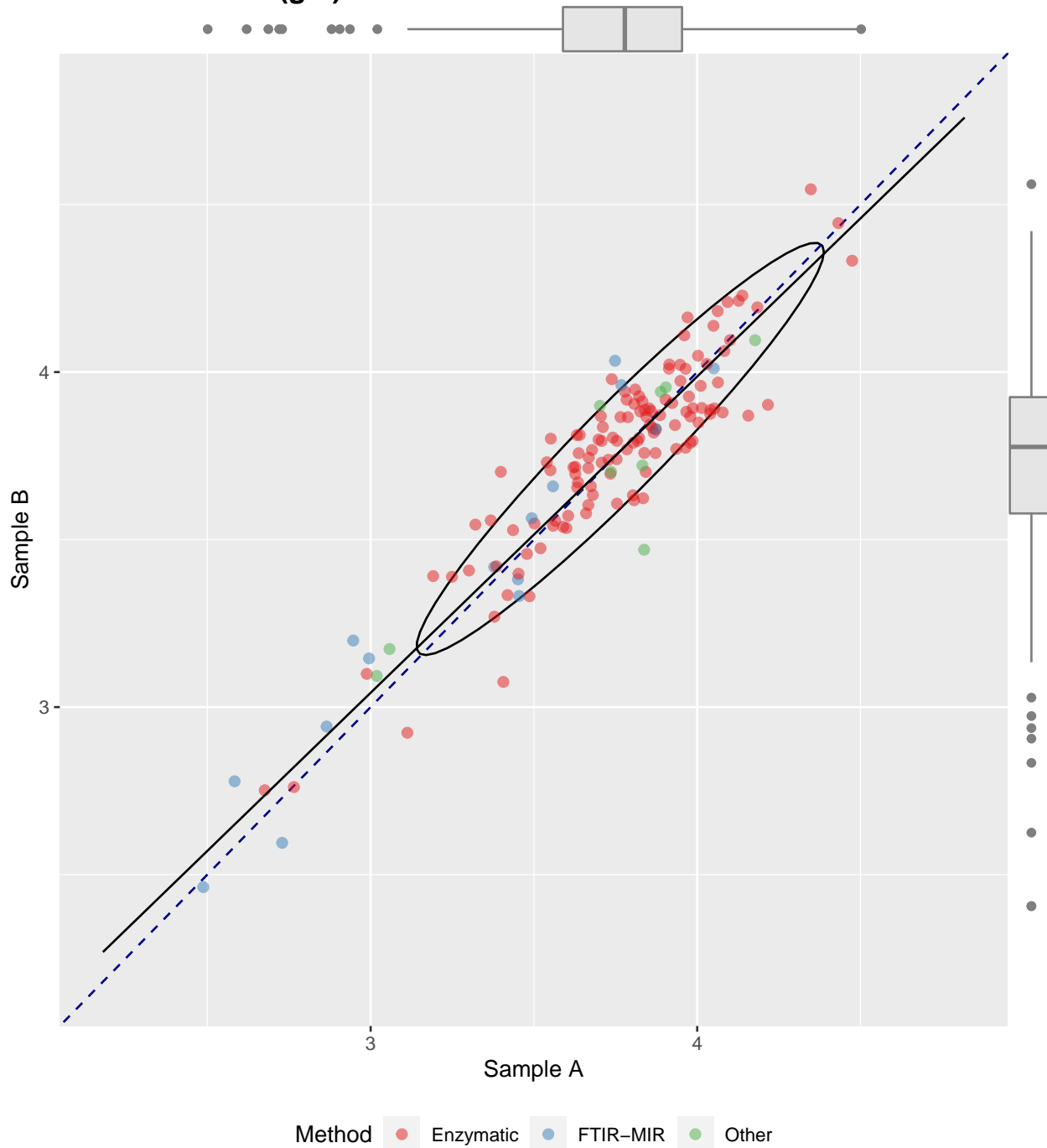
Method ● Lane & Eynon ● Rebelein ● Other

Sample	A	B
No of cases	52	52
Minimum	4.07	4.07
Maximum	6.25	7.00
Range	2.18	2.93
Median	5.40	5.42
<b>Mean</b>	<b>5.32</b>	<b>5.38</b>
95% CI Upper	5.45	5.52
95% CI Lower	5.20	5.24
<b>Standard Deviation</b>	<b>0.45</b>	<b>0.51</b>
Coefficient of Variation	8.45%	9.51%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Lane & Eynon	16
Rebelein	27
Other	9



# Glucose + Fructose (g/L)



Sample	A	B
No of cases	148	148
Minimum	2.40	2.40
Maximum	4.45	4.60
Range	2.05	2.20
Median	3.79	3.80
<b>Mean</b>	<b>3.72</b>	<b>3.73</b>
95% CI Upper	3.78	3.78
95% CI Lower	3.67	3.67
<b>Standard Deviation</b>	<b>0.35</b>	<b>0.34</b>
Coefficient of Variation	9.36%	9.24%
Lab Result		
Lab Z-Score Result		
Other Result		

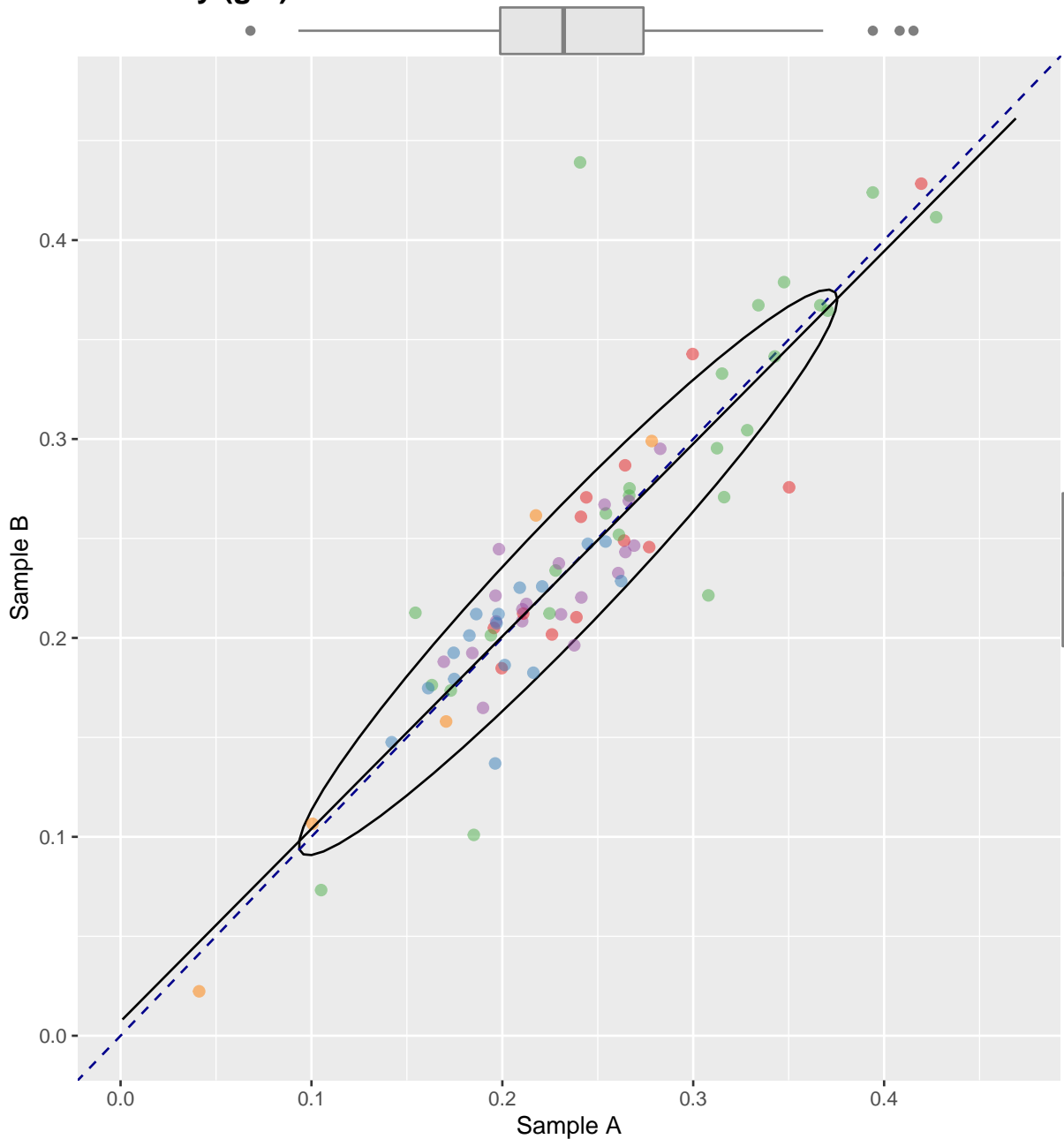
Method	Count
Enzymatic	124
FTIR-MIR	15
Other	9



## Glucose + Fructose Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
5	-0.8	-1.8	129	-0.4	-0.4	225	0.6	0.5	380	0.4	0.5						
9	0.7	0.7	131	0.6	0.6	226	1.9	2.5	382	0.3	0.2						
10	0.3	0.2	132	0.7	0.9	227	-3.0	-2.8	385	0.0	0.2						
14	0.2	0.5	135	0.1	-0.1	233	-0.1	-0.1	386	2.1	2.0						
20	1.1	0.8	138	-0.2	-0.1	236	-0.4	-0.1	388	0.4	0.8						
21	0.8	1.1	141	0.0	0.1	238	0.0	-0.2	393	0.6	0.6						
23	0.3	0.4	142	-1.0	-1.0	242	0.3	0.1	396	1.0	0.6						
25	0.4	0.4	144	1.0	0.2	245	0.2	0.4	398	0.1	0.0						
31	0.3	0.4	153	-0.1	0.4	260	-1.0	-1.1	399	0.1	0.2						
36	0.5	0.4	155	-0.4	-0.4	261	-0.6	-0.5	400	0.5	0.2						
41	0.2	0.3	157	-0.3	0.0	266	0.8	0.5	404	0.6	0.6						
45	0.8	-0.1	165	-0.1	-0.1	267	-2.9	-3.6	409	-1.9	-1.7						
47	0.5	0.7	167	1.1	0.7	273	0.2	0.2	416	1.2	0.7						
49	0.0	0.0	169	1.0	0.9	278	0.1	0.6	417	0.0	-0.2						
51	-1.2	-0.7	171	0.4	0.6	279	-2.1	-2.1	426	0.0	0.0						
53	0.8	0.8	172	-2.9	-2.5	281	-1.0	-0.9	428	-3.1	-3.0						
57	-0.1	0.2	173	-0.7	-0.8	286	-2.4	-1.5	437	0.4	0.6						
59	0.5	0.6	177	1.3	1.7	288	0.8	0.5	438	-0.1	-0.1						
61	-0.2	-0.2	178	1.1	1.1	289	1.0	0.9	444	1.9	2.0						
63	0.5	0.5	181	-0.9	-0.7	293	0.1	0.1	445	0.8	0.7						
64	0.0	0.1	182	0.6	0.6	295	0.0	-0.1	449	-0.2	-0.1						
66	-1.0	-0.7	183	0.5	0.5	303	1.5	1.5	455	-0.4	-0.4						
72	-2.0	-2.1	188	-0.9	-0.8	306	1.1	1.1	464	-0.1	0.0						
78	-0.6	-0.9	189	0.8	0.5	308	0.3	0.8	471	0.5	-0.7						
79	0.4	0.4	192	0.9	0.9	309	-0.8	-0.9	474	0.2	0.5						
84	-0.6	-0.7	198	0.0	0.0	318	-0.2	-0.4	483	1.4	1.7						
87	-0.3	-0.2	199	-0.2	-0.3	326	0.2	0.2	487	-1.8	-1.8						
90	0.0	-0.1	201	0.4	0.7	327	-1.8	-1.8	489	0.3	0.0						
94	-0.6	-0.7	204	0.8	1.1	332	-0.4	-0.2									
95	-0.9	-0.7	205	-0.9	-0.9	334	-0.6	-1.1									
96	-0.9	-0.1	208	-0.2	-0.2	340	0.5	0.2									
99	-0.2	-0.3	212	0.5	0.6	342	0.4	0.6									
103	0.4	0.4	213	0.2	0.4	346	0.3	0.3									
105	-0.5	-0.5	214	-0.5	0.0	356	0.8	1.2									
107	-1.2	-1.3	215	-2.4	-2.4	360	-0.2	-0.2									
108	-1.2	-0.7	216	1.1	0.5	361	0.2	0.4									
116	0.5	0.6	217	0.4	0.4	366	0.5	0.5									
118	0.1	-0.3	218	1.1	1.0	369	1.3	1.4									
122	0.2	0.2	220	0.2	0.2	375	1.1	0.3									Outliers
126	0.7	0.8	223	-3.8	-3.9	378	0.9	0.5									358 -4.9 -3.6

# Volatile Acidity (g/L)



Sample	A	B
No of cases	78	78
Minimum	0.05	0.04
Maximum	0.41	0.43
Range	0.36	0.39
Median	0.23	0.23
<b>Mean</b>	<b>0.24</b>	<b>0.24</b>
95% CI Upper	0.25	0.26
95% CI Lower	0.22	0.22
<b>Standard Deviation</b>	<b>0.07</b>	<b>0.07</b>
Coefficient of Variation	28.81%	30.72%
Lab Result		
Lab Z-Score Result		
Other Result		

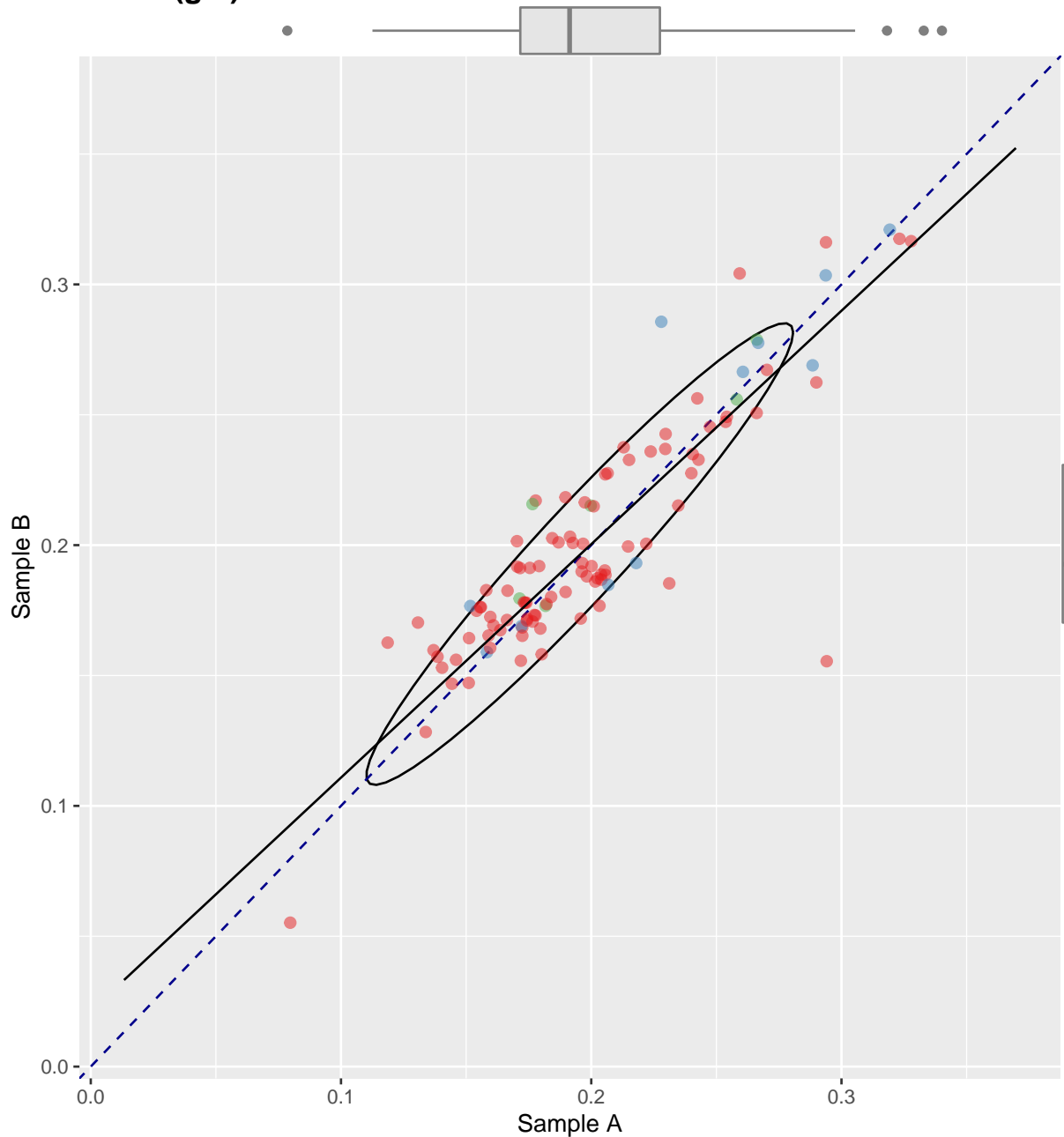
Method	Count
Automated Steam Distillation	13
Enzymatic	16
FTIR-MIR	25
Manual Steam Distillation	19
Other	5

Method ● Automated Steam Distillation ● Enzymatic ● FTIR-MIR ● Manual Steam Distillation ● Other

## Volatile Acidity Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
3	0.6	0.3	267	1.8	1.7												
9	-0.6	-0.5	270	-1.3	-0.9												
12	2.5	2.3	273	-0.7	-0.7												
20	-0.6	-0.5	276	-0.9	-1.2												
29	0.2	-0.3	278	0.3	0.3												
39	-0.6	-0.7	279	-1.9	-1.6												
43	-0.9	-0.8	288	0.3	0.3												
47	0.6	0.6	295	-0.9	-0.8												
55	-0.4	-0.1	297	-0.4	-0.5												
63	0.2	0.0	303	-0.1	-0.4												
72	1.5	1.5	307	-0.6	-0.3												
95	-1.6	-1.5	327	-0.9	-0.9												
98	-1.0	-0.7	332	0.2	0.2												
118	1.3	1.2	346	0.0	0.2												
122	-0.6	-0.8	358	-0.1	2.6												
129	-0.4	-0.4	361	-0.7	-0.7												
131	0.7	0.6	363	1.5	1.7												
142	1.9	1.9	364	-0.4	-0.9												
145	0.3	0.4	366	-0.1	-0.3												
152	0.2	0.0	375	0.2	0.2												
153	-0.4	-0.3	378	-1.1	-0.5												
167	0.0	0.5	380	0.4	0.3												
169	-1.0	-0.8	386	-0.4	-0.3												
177	0.0	-0.1	388	-1.0	-0.7												
178	0.3	0.3	391	0.2	-0.1												
183	-0.1	-0.1	393	-1.0	-0.9												
188	-0.6	-1.6	398	1.9	1.5												
204	-0.6	-0.5	400	-0.6	-0.5												
205	-0.7	-0.7	416	0.6	0.0												
215	2.2	2.3	425	-0.3	-0.3												
216	0.9	0.7	426	0.3	0.4												
218	-0.3	-0.3	444	1.5	0.3												
223	1.0	1.1	445	0.9	1.2												
227	-0.3	-0.3	464	-2.7	-2.7												
233	-2.2	-2.0	471	0.7	0.6												
244	0.2	0.3	474	0.7	0.0												
253	0.2	0.3	483	-0.4	-0.4												
260	2.5	2.3	487	0.9	0.7												
261	0.6	0.4															
266	-0.6	-0.7															

# Acetic Acid (g/L)



Method ● Enzymatic ● FTIR-MIR ● Other

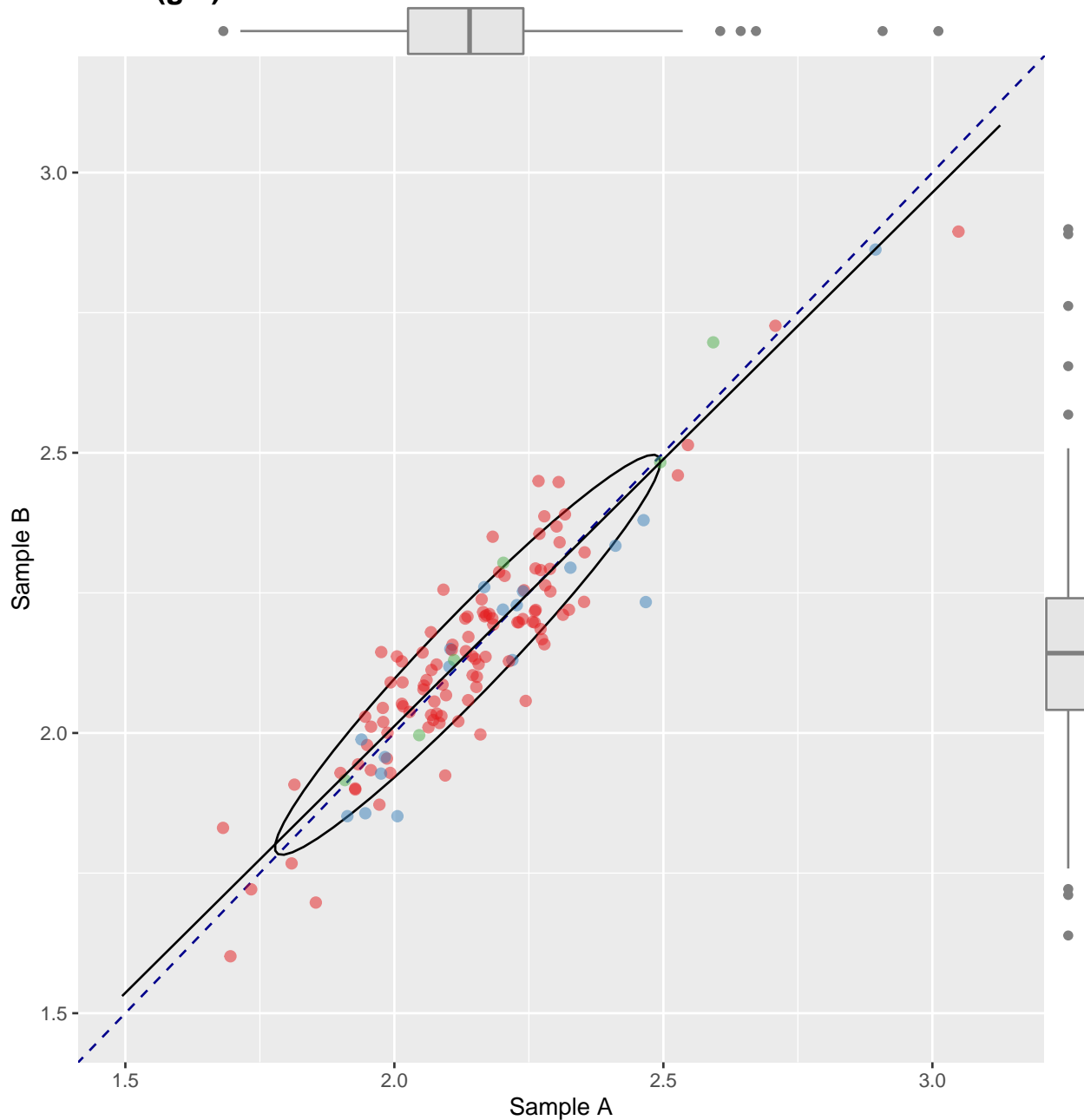
Sample	A	B
No of cases	107	107
Minimum	0.09	0.04
Maximum	0.34	0.32
Range	0.25	0.28
Median	0.19	0.19
<b>Mean</b>	<b>0.20</b>	<b>0.20</b>
95% CI Upper	0.21	0.21
95% CI Lower	0.19	0.19
<b>Standard Deviation</b>	<b>0.05</b>	<b>0.05</b>
Coefficient of Variation	22.63%	22.63%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Enzymatic	90
FTIR-MIR	11
Other	6

## Acetic Acid Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
5	-0.7	-0.9	135	-1.1	-1.1	308	-0.5	-0.4									
9	0.6	0.6	138	-0.5	-0.5	309	1.1	1.1									
10	0.8	1.1	141	-0.2	-0.3	318	0.8	1.7									
12	-0.7	-0.7	143	0.0	0.0	326	0.4	0.6									
14	-1.1	-1.1	144	-0.9	-0.9	334	0.2	0.2									
19	1.7	1.7	155	1.5	1.9	340	-0.5	-0.3									
21	0.2	0.2	157	-0.2	0.2	342	0.0	0.4									
23	0.4	0.8	165	-0.7	-0.5	346	0.8	1.1									
25	-0.5	-0.7	167	-0.7	-0.5	356	2.1	-1.3									
31	0.0	-0.7	169	-0.7	-0.5	360	-0.6	-0.5									
36	-0.2	-0.3	171	-0.2	-0.3	369	0.4	0.0									
41	0.0	0.0	173	-1.1	-1.1	382	0.2	0.2									
45	1.7	1.5	181	0.2	0.2	385	-0.5	-0.5									
49	-0.5	-0.5	183	-0.2	-0.5	396	0.0	0.2									
51	-0.9	-1.1	189	-1.6	-1.1	398	-0.2	-0.5									
53	0.6	0.6	192	-0.7	-0.5	399	-0.5	-0.5									
57	0.0	0.0	198	1.1	1.3	404	0.2	0.2									
59	-0.2	-0.5	199	-1.3	-0.5	409	3.0	2.4									
64	-0.9	-0.7	201	0.0	0.2	412	-2.5	-3.5									
66	-0.7	-0.7	208	0.2	0.4	416	1.7	0.8									
78	0.4	0.0	211	2.1	2.4	417	-0.9	-0.9									
79	-0.4	-0.5	212	0.4	0.4	428	-2.0	-0.7									
84	-0.5	-0.5	213	-0.5	-0.7	437	-0.7	-0.7									
87	-0.5	-0.3	214	2.8	2.6	438	-0.7	-0.7									
90	1.3	1.3	217	0.6	0.6	445	1.5	1.5									
94	-0.5	-0.5	223	2.4	2.6	455	0.0	0.0									
95	-1.6	-1.6	225	-0.5	-0.5	489	-0.2	0.4									
96	-0.7	-0.7	226	1.1	1.2												
98	-0.9	-0.9	233	-0.9	-0.9												
99	0.6	0.8	236	1.9	2.4												
103	-0.5	-0.5	238	0.8	0.8												
105	-0.9	-0.9	242	-1.3	-0.4												
107	0.2	-0.5	245	0.6	0.6												
108	-0.2	0.0	273	-0.2	-0.2												
116	-1.1	-0.9	278	1.3	1.3												
118	-0.2	-0.3	281	1.7	1.7												
122	1.1	1.3	286	0.0	-0.3												
126	-0.2	-0.7	293	-0.5	-0.7												
129	-0.7	-0.7	295	-0.5	-0.5												
132	-0.5	-0.7	303	-0.7	-0.9												

# Malic Acid (g/L)



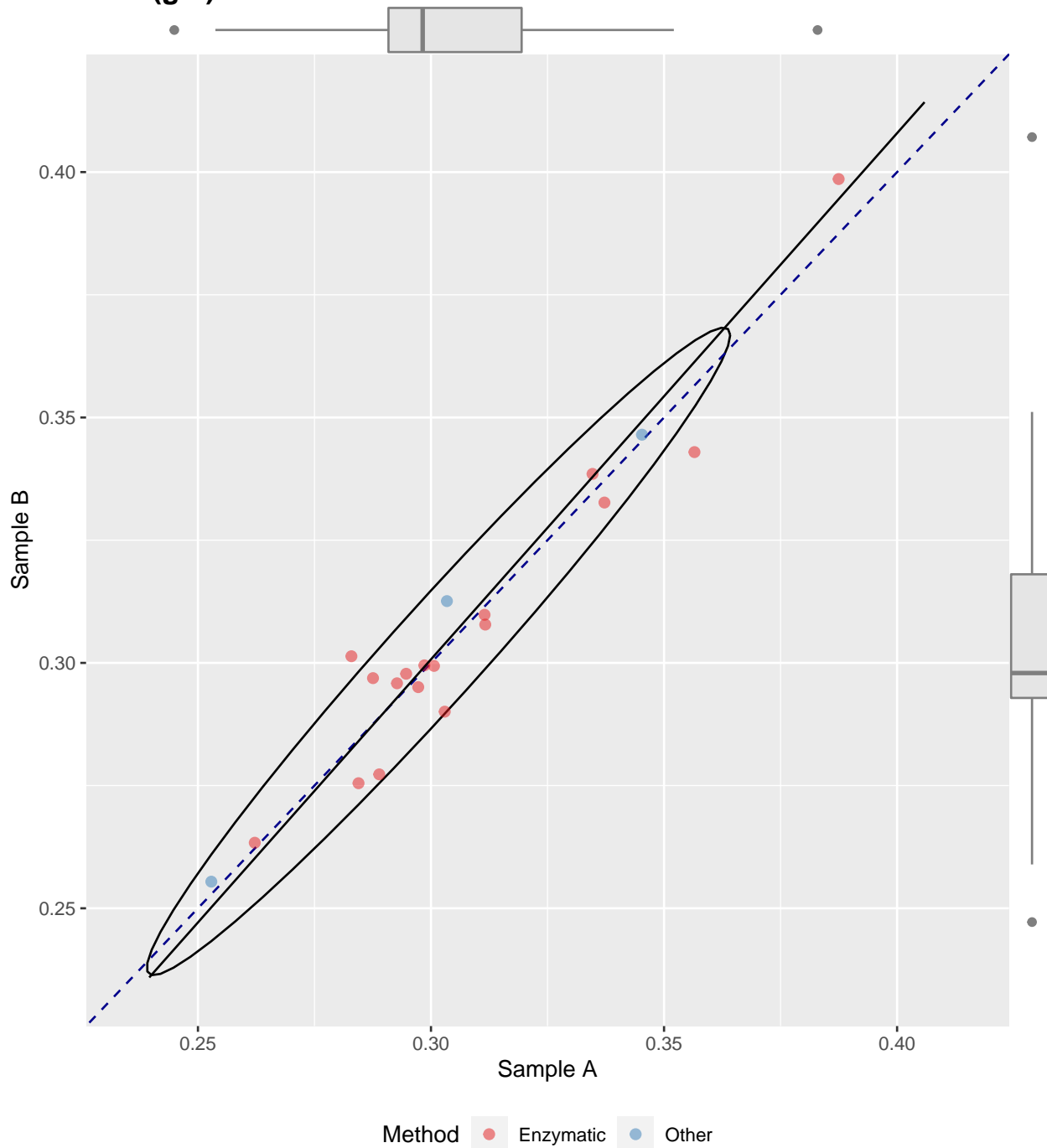
Method ● Enzymatic ● FTIR-MIR ● Other

Sample	A	B
No of cases	129	129
Minimum	1.65	1.63
Maximum	2.99	2.93
Range	1.34	1.30
Median	2.14	2.15
<b>Mean</b>	<b>2.14</b>	<b>2.15</b>
95% CI Upper	2.18	2.18
95% CI Lower	2.11	2.12
<b>Standard Deviation</b>	<b>0.20</b>	<b>0.20</b>
Coefficient of Variation	9.23%	9.09%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Enzymatic	105
FTIR-MIR	18
Other	6



# Citric Acid (g/L)



Sample	A	B
No of cases	20	20
Minimum	0.25	0.25
Maximum	0.38	0.40
Range	0.13	0.15
Median	0.30	0.30
<b>Mean</b>	<b>0.31</b>	<b>0.31</b>
95% CI Upper	0.32	0.32
95% CI Lower	0.29	0.29
<b>Standard Deviation</b>	<b>0.03</b>	<b>0.03</b>
Coefficient of Variation	10.10%	11.01%
Lab Result		
Lab Z-Score Result		
Other Result		

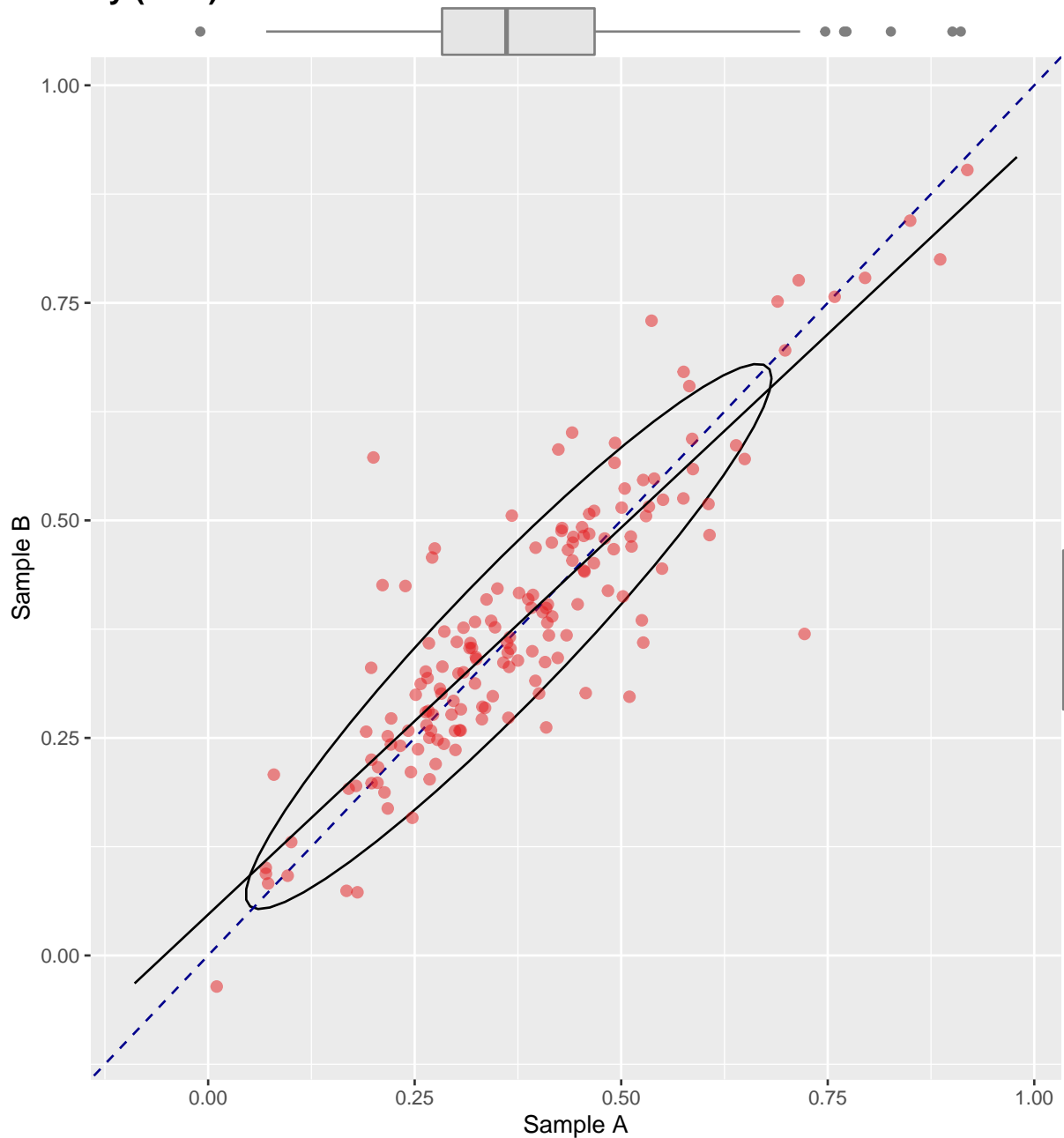
Method	Count
Enzymatic	17
Other	3



## Citric Acid Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
9	-0.2	-0.5															
14	2.4	2.7															
21	0.0	-0.1															
39	-0.2	-0.2															
41	-1.5	-1.4															
66	1.4	1.3															
79	0.8	1.0															
84	1.1	0.7															
105	-0.2	-0.2															
108	0.1	0.1															
129	-0.2	-0.2															
132	-0.2	0.1															
135	-1.8	-1.7															
167	-0.6	-0.3															
181	-0.2	-0.2															
218	-0.5	-0.8															
273	-0.4	-0.3															
295	-0.8	-0.8															
332	-0.5	-0.3															
471	1.4	1.3															

# Turbidity (NTU)



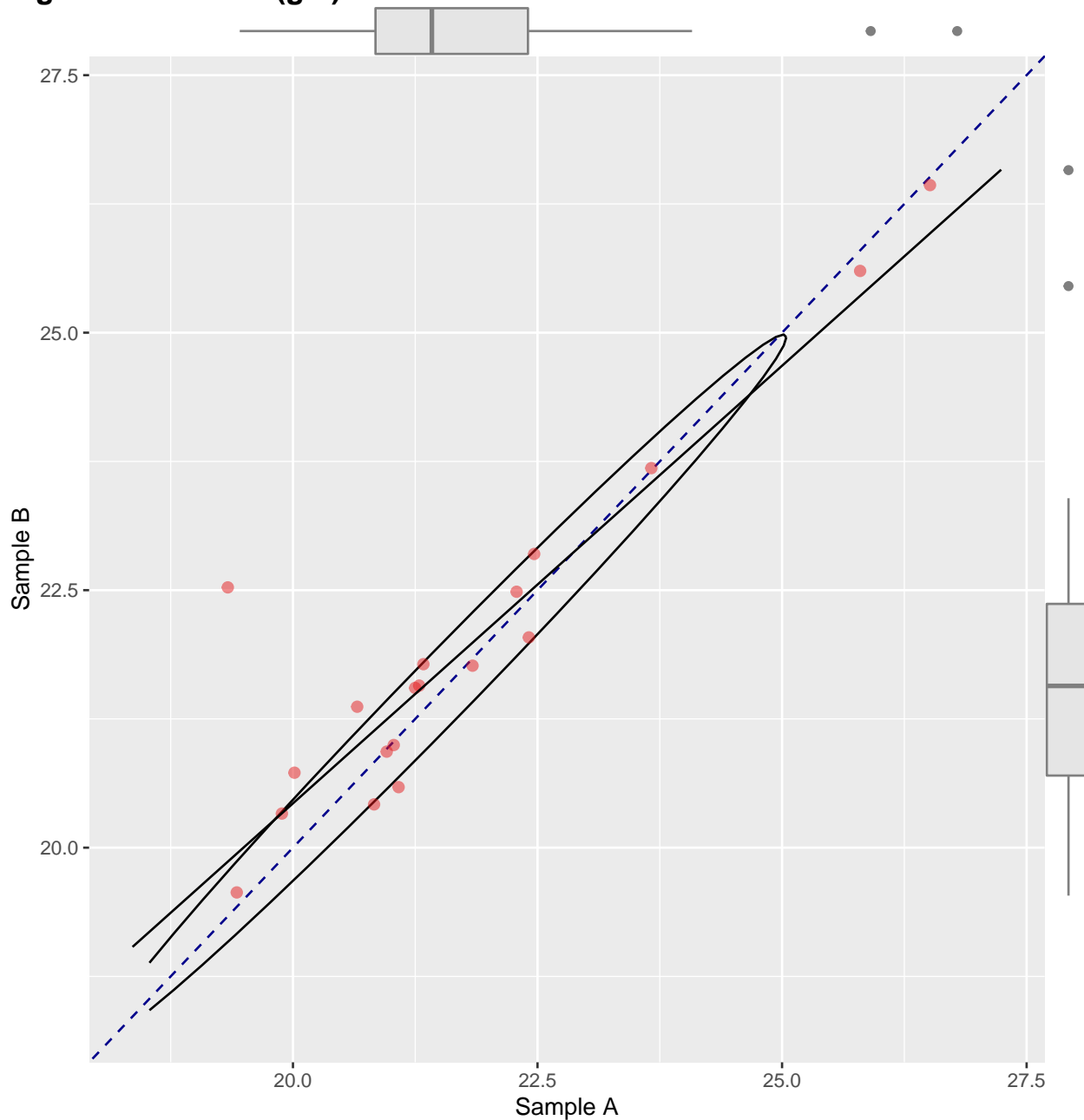
Method ● Turbidity Meter

Sample	A	B
No of cases	161	161
Minimum	0.00	0.00
Maximum	0.89	0.88
Range	0.89	0.88
Median	0.37	0.37
<b>Mean</b>	<b>0.38</b>	<b>0.38</b>
95% CI Upper	0.40	0.41
95% CI Lower	0.36	0.36
<b>Standard Deviation</b>	<b>0.16</b>	<b>0.16</b>
Coefficient of Variation	41.95%	40.40%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Turbidity Meter	161



# Sugar Free Extract (g/L)



Method ● Calculation

Sample	A	B
No of cases	19	19
Minimum	19.1	19.8
Maximum	26.5	26.5
Range	7.4	6.7
Median	21.3	21.4
<b>Mean</b>	<b>21.8</b>	<b>21.9</b>
95% CI Upper	22.6	22.7
95% CI Lower	20.9	21.1
<b>Standard Deviation</b>	<b>1.9</b>	<b>1.8</b>
Coefficient of Variation	8.86%	8.07%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Calculation	19

# Sugar Free Extract Z-Scores

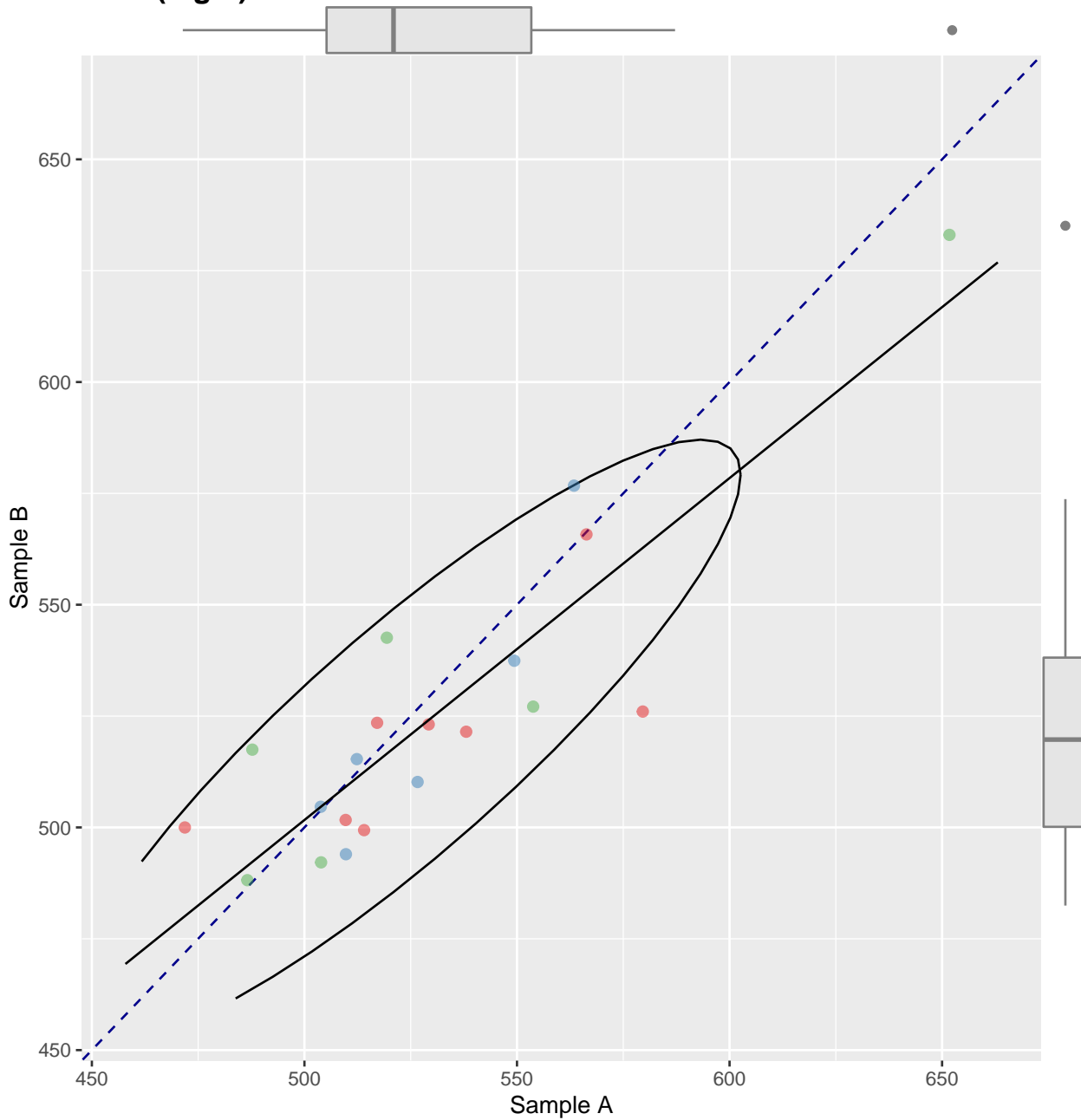
Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
9	-0.9	-1.1															
14	-0.4	-0.5															
20	-0.3	-0.6															
39	-0.6	-0.8															
45	0.4	0.5															
78	2.2	2.2															
108	1.1	1.0															
129	0.1	-0.1															
167	0.3	0.3															
177	-0.2	-0.3															
181	-0.8	-0.8															
183	-1.1	-1.2															
201	2.5	2.6															
204	-0.2	-0.4															
266	-0.3	-0.4															
308	-1.4	0.2															
398	0.2	0.2															
400	-0.1	-0.2															
426	-0.3	-0.6															

## Methanol (mg/L)

Insufficient data to produce a Youden plot  
or generate Z-Scores; or data not normally distributed.  
Basic statistics have been included for information purposes only.

Sample	A	B
No of cases	7	7
Minimum	55.0	40.0
Maximum	78.0	73.0
Range	23.0	33.0
Median	68.0	65.6
<b>Mean</b>	<b>67.7</b>	<b>63.9</b>
<b>Standard Deviation</b>	<b>8.7</b>	<b>11.3</b>
Coefficient of Variation	12.84%	17.72%
Lab Result		
Lab Z-Score Result		
Other Result		

# Potassium (mg/L)



Method ● Flame AAS ● ICP ● Other

Sample	A	B
No of cases	20	20
Minimum	475	485
Maximum	646	632
Range	171	147
Median	520	518
<b>Mean</b>	<b>530</b>	<b>525</b>
95% CI Upper	548	540
95% CI Lower	512	510
<b>Standard Deviation</b>	<b>40</b>	<b>34</b>
Coefficient of Variation	7.62%	6.55%
Lab Result		
Lab Z-Score Result		
Other Result		

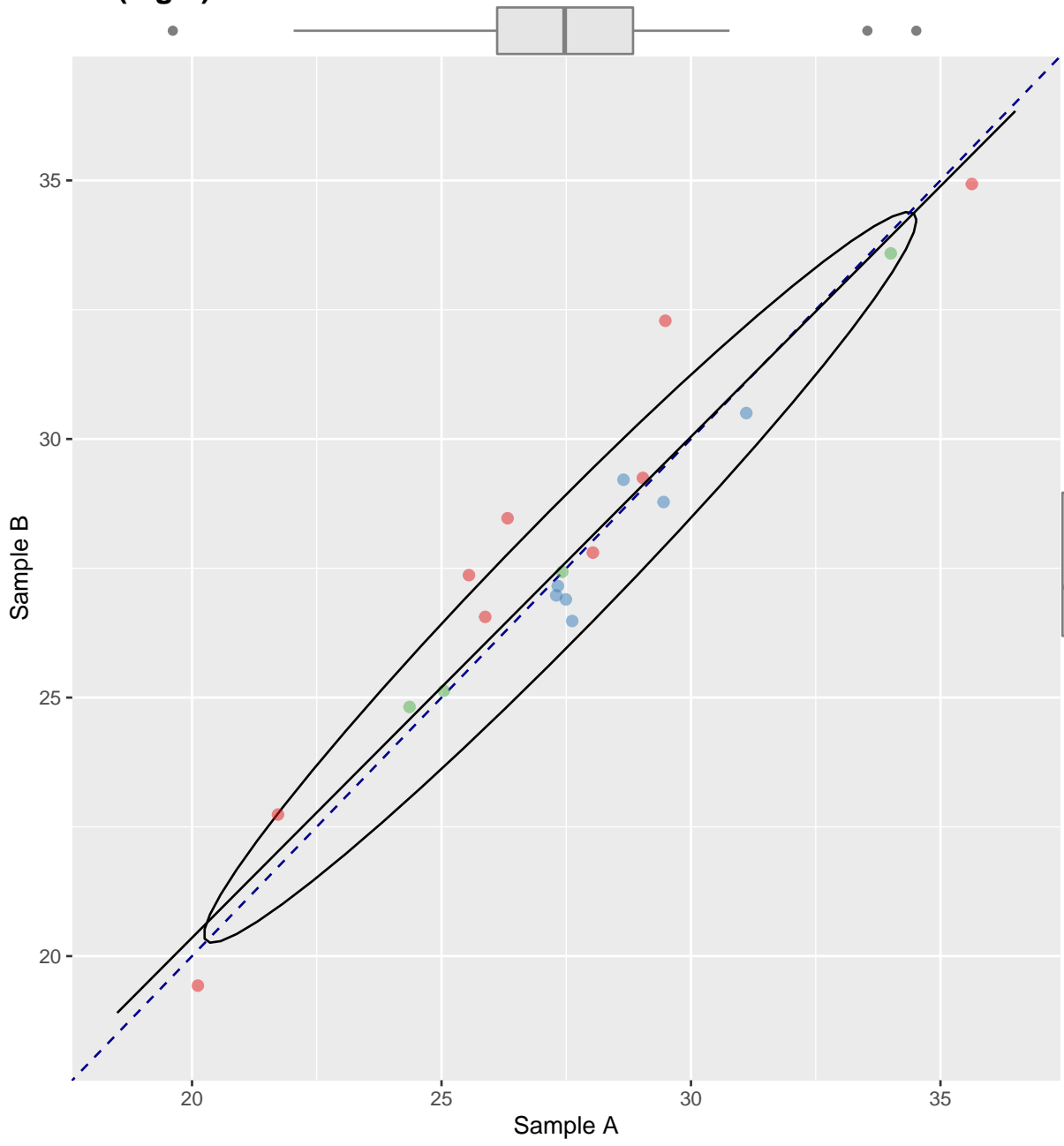
Method	Count
Flame AAS	8
ICP	6
Other	6

# Potassium Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
6	-0.4	-0.5															
9	-0.5	-0.7															
14	0.0	-0.5															
20	-0.7	-0.7															
36	0.2	0.0															
59	-0.4	-1.0															
90	0.4	0.3															
94	-0.1	0.4															
99	-1.4	-0.8															
105	-0.5	0.0															
108	-0.5	-0.7															
126	-1.0	-0.3															
138	1.0	1.3															
167	0.7	0.5															
178	-1.1	-1.1															
181	-0.7	-0.6															
201	1.4	0.2															
208	2.9	3.1															
218	1.0	1.3															
426	-0.1	0.0															



# Sodium (mg/L)



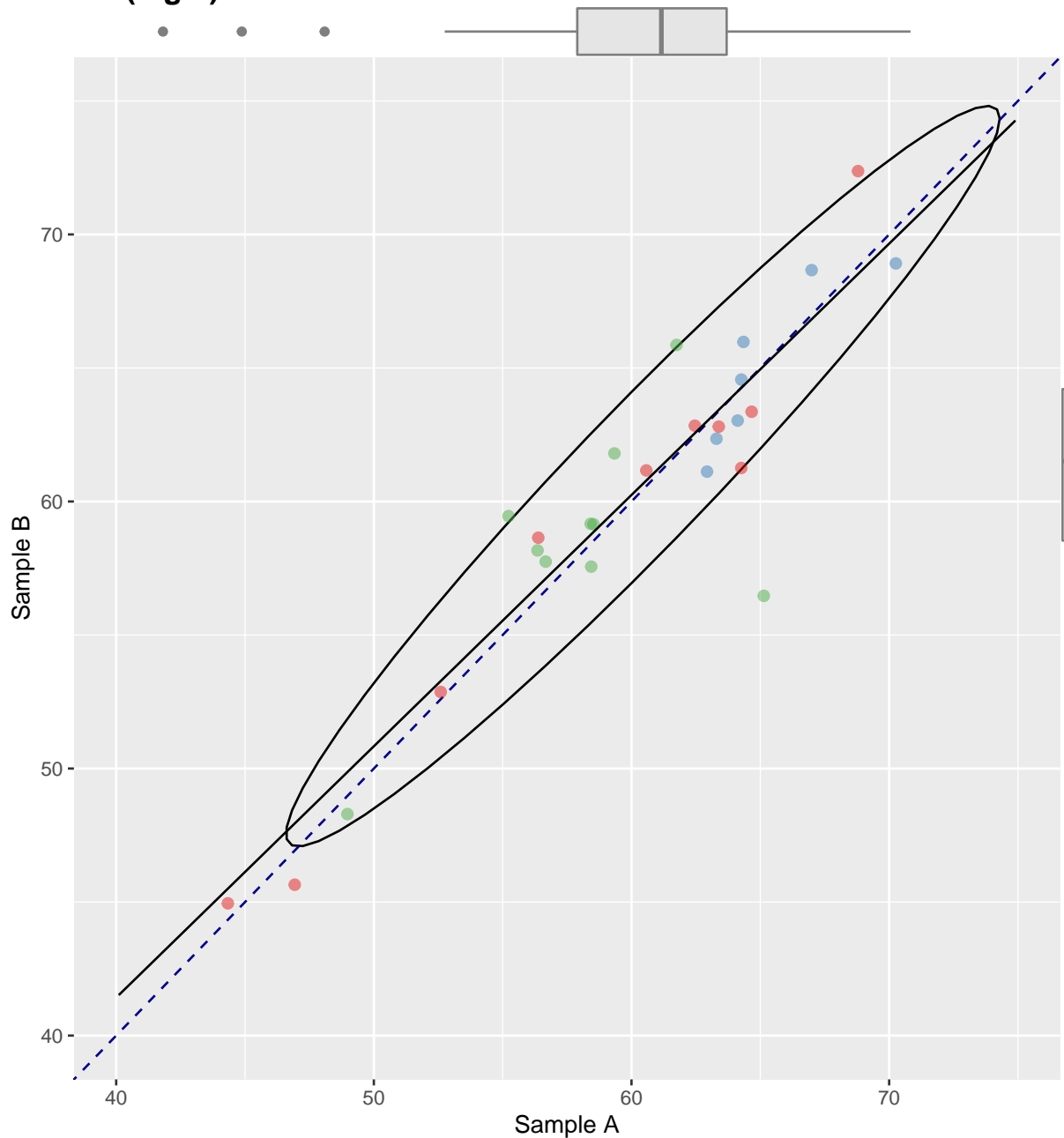
Method ● Flame AAS ● ICP ● Other

Sample	A	B
No of cases	20	20
Minimum	20	20
Maximum	35	35
Range	15	15
Median	27	27
<b>Mean</b>	<b>27</b>	<b>28</b>
95% CI Upper	29	29
95% CI Lower	26	26
<b>Standard Deviation</b>	<b>3</b>	<b>3</b>
Coefficient of Variation	12.46%	12.48%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Flame AAS	9
ICP	7
Other	4



# Calcium (mg/L)



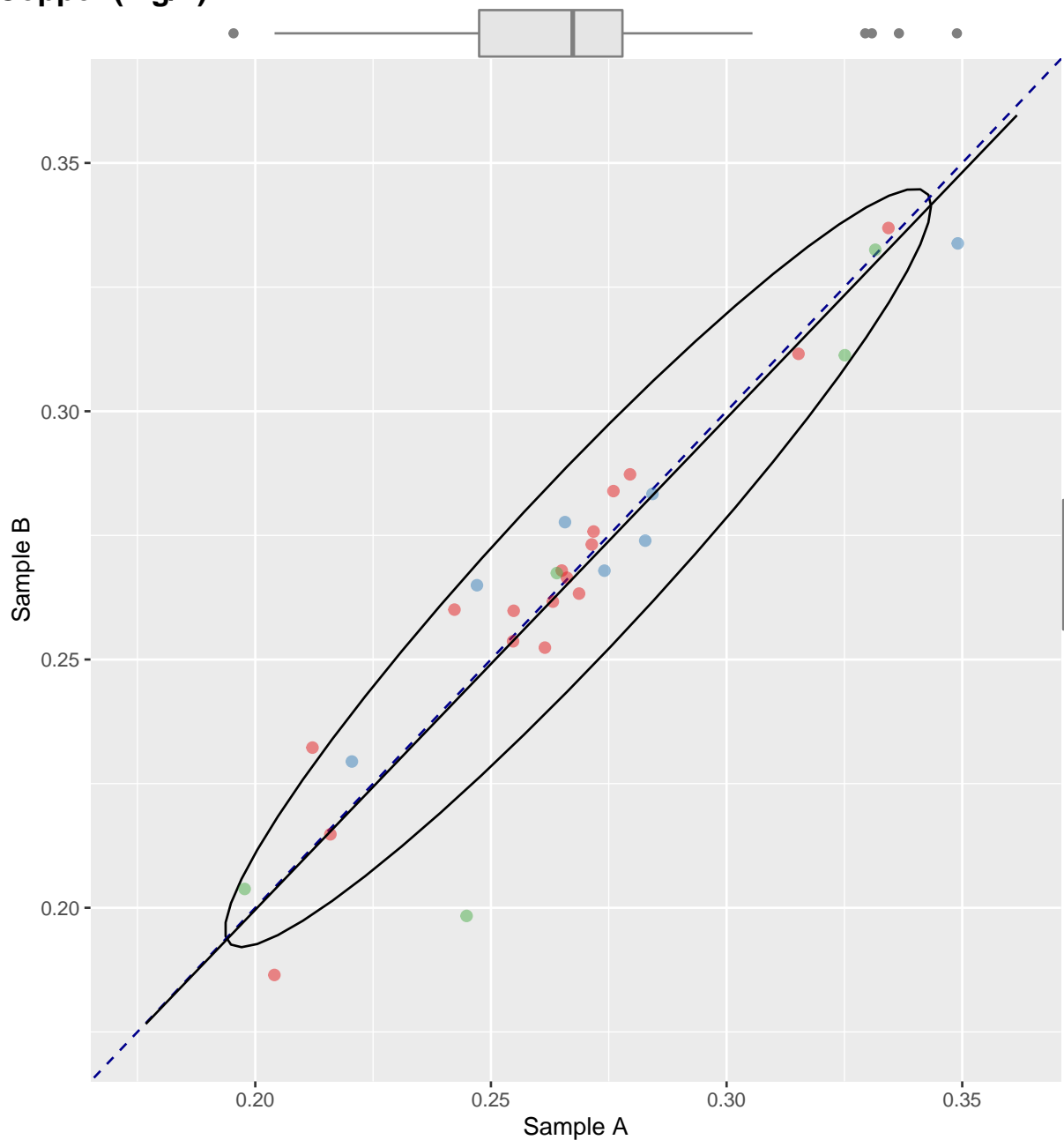
Method ● Flame AAS ● ICP ● Other

Sample	A	B
No of cases	27	27
Minimum	43	44
Maximum	70	72
Range	27	28
Median	62	61
<b>Mean</b>	<b>60</b>	<b>60</b>
95% CI Upper	62	63
95% CI Lower	57	58
<b>Standard Deviation</b>	<b>7</b>	<b>7</b>
Coefficient of Variation	11.06%	11.06%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Flame AAS	10
ICP	7
Other	10



# Copper (mg/L)



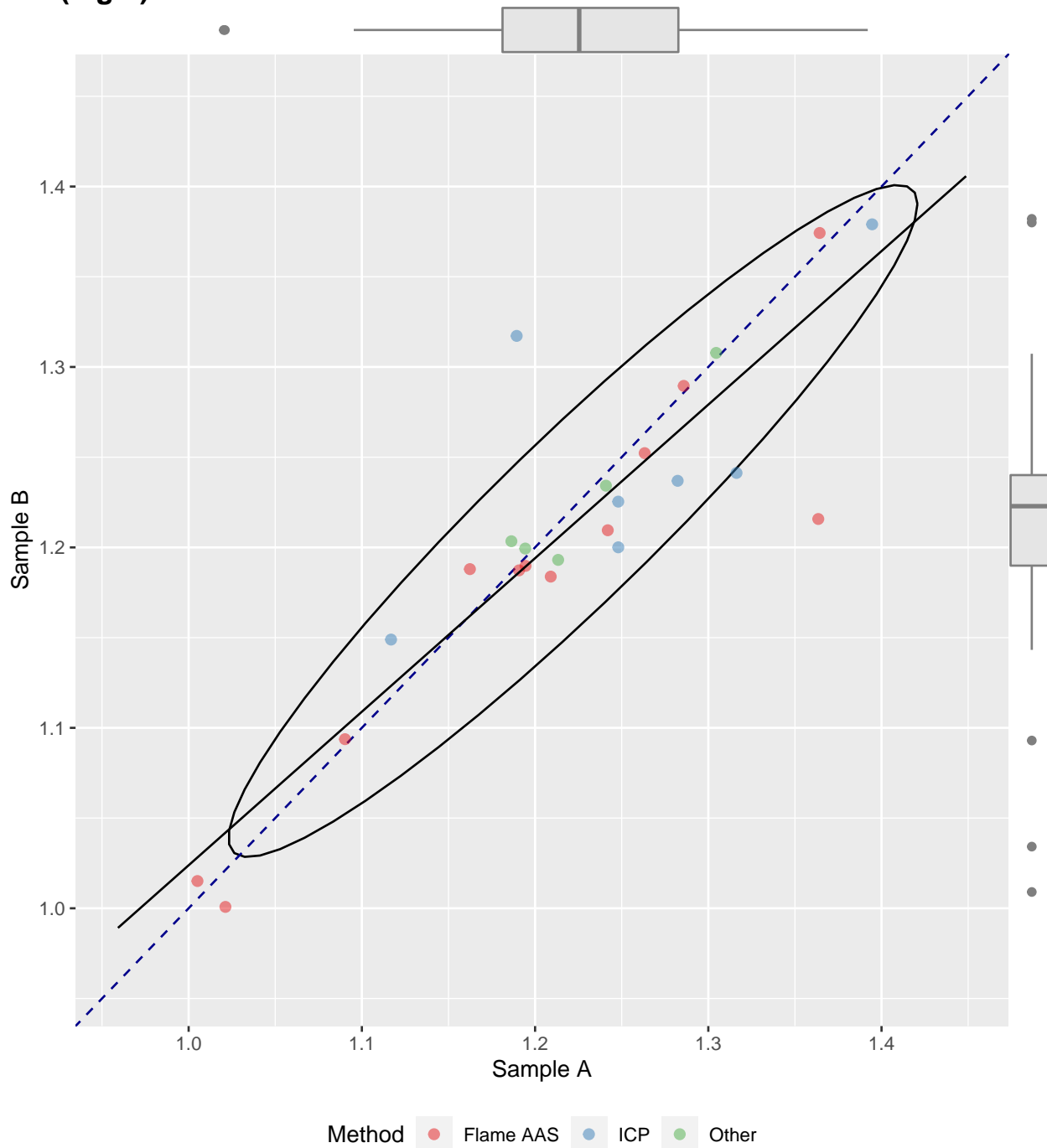
Method ● Flame AAS ● ICP ● Other

Sample	A	B
No of cases	29	29
Minimum	0.20	0.19
Maximum	0.35	0.34
Range	0.15	0.15
Median	0.27	0.27
<b>Mean</b>	<b>0.27</b>	<b>0.27</b>
95% CI Upper	0.28	0.28
95% CI Lower	0.25	0.25
<b>Standard Deviation</b>	<b>0.04</b>	<b>0.04</b>
Coefficient of Variation	13.86%	14.53%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Flame AAS	17
ICP	7
Other	5



# Iron (mg/L)



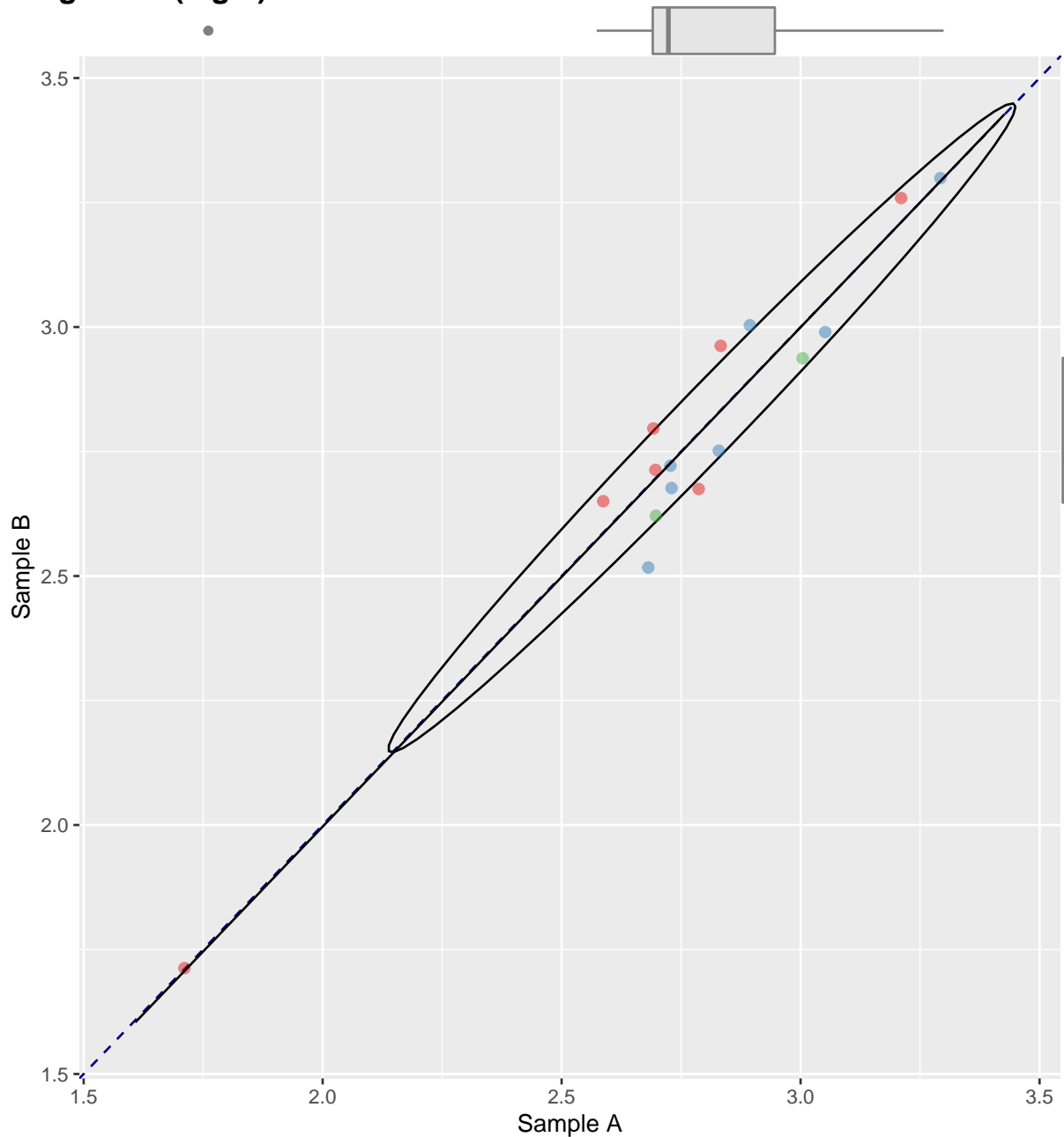
Sample	A	B
No of cases	24	24
Minimum	1.00	1.00
Maximum	1.41	1.39
Range	0.41	0.39
Median	1.23	1.21
<b>Mean</b>	<b>1.22</b>	<b>1.21</b>
95% CI Upper	1.26	1.25
95% CI Lower	1.18	1.18
<b>Standard Deviation</b>	<b>0.10</b>	<b>0.09</b>
Coefficient of Variation	7.90%	7.42%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Flame AAS	12
ICP	7
Other	5





# Manganese (mg/L)



Method ● Flame AAS ● ICP ● Other

Sample	A	B
No of cases	16	16
Minimum	1.75	1.74
Maximum	3.30	3.29
Range	1.54	1.55
Median	2.71	2.74
<b>Mean</b>	<b>2.76</b>	<b>2.76</b>
95% CI Upper	2.93	2.93
95% CI Lower	2.59	2.59
<b>Standard Deviation</b>	<b>0.35</b>	<b>0.35</b>
Coefficient of Variation	12.51%	12.66%
Lab Result		
Lab Z-Score Result		
Other Result		

Method	Count
Flame AAS	7
ICP	7
Other	2

## Manganese Z-Scores

Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B	Stats ID	Sample A	Sample B
6	0.1	0.1															
9	-0.3	-0.2															
14	-0.4	-0.7															
20	-0.2	-0.3															
36	-0.4	-0.3															
45	1.4	1.5															
59	0.8	0.6															
90	0.5	0.6															
99	-0.1	-0.1															
105	0.2	0.4															
108	-0.2	0.0															
138	-0.3	-0.3															
167	0.6	0.5															
178	-0.4	-0.3															
181	-2.9	-2.9															
218	1.5	1.5															

**END OF REPORT**