asTTle effect sizes template

Morgan Rangi and Tania Linley-Richardson

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About this spreadsheet

This spreadsheet has been designed to help schools who use e-asTTle.

Its main function is to analyse the data from two tabular reports to try to measure if particular strategies are having an "effect"

About this spreadsheet

There are five main data sheets in this template

1. Individual effect sizes
2. Group Summary
3. Group Bar Graphs
4. Named asTTle error bars
5. NCEA readiness

Individual effect sizes

			Reading							
			Test 1		Test 2					
Gender	Language	Ethnicity	Overall Score	Overall Level	Overall Score	Overall Level	Diff in Sub level	Effect size	Difference	Diff in SL
Female	English	Pacific	1392	3B	1429	3A	2	0.59	37	2
Male	English	Other	1546	4A	1557	5B	1	0.18	11	1
Female	English	NZ European	1525	4A	1550	4A	0	0.40	25	0
Male	English	NZ European	1590	5P	1605	5P	0	0.24	15	0
Male	English	NZ European	1540	4A	1556	5B	1	0.26	16	1
Female	English	Maori	1486	4P			#N/A	No result		#N/A
Male	English	Pacific	1514	4A	1470	4P	-1	-0.71	-44	-1
Female	English	Pacific	1528	4A	1525	4A	0	-0.05	-3	0
Female	English	Pacific	1493	4P			#N/A	No result		#N/A
Female	English	Pacific	1462	4B	1508	4A	2	0.74	46	2
Female	English	Maori	1462	4B			#N/A	No result		#N/A
Male	English	Maori	1474	4P	1497	4P	0	0.37	23	0
Male	English	NZ European	1547	4A	1623	5A	3	1.22	76	3
Male	English	Pacific	1486	4P			#N/A	No result		#N/A
Male	English	NZ European	1506	4A	1486	4P	-1	-0.32	-20	-1
Male	English	Other	1487	4P	1407	3P	-3	-1.28	-80	-3
Male	English	NZ European	1474	4P	1519	4A	1	0.72	45	1

About individual effect sizes

Main features:

- Shows **individual effect sizes** for each student

Look for:

- Students that have an effect size that is **green** or **blue** which might indicate accelerated learning

Group Summary

Year 10	asTTle test 2																
	<2B	2B	2P	2A	3B	3P	3A	4B	4P	4A	5B	5P	5A	6B	6P	6A	>6A
<2B	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2B	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2P	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2A	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3B	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0
3P	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4B	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0
4P	0	0	0	0	0	1	0	0	2	1	1	0	0	0	0	0	0
4A	0	0	0	0	0	0	0	0	2	2	2	0	1	0	0	0	0
5B	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0
5P	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0
5A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6B	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6P	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
>6A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

(Row axis: asTTle test 1)

Sub-levels	Number	% of cohort
-3 or less	1	6%
-2 to -1	3	17%
0	6	33%
1 - 2	7	39%
3 or more	1	6%
Total	18	100%

	Number	% of cohort
below asTTle test 1	4	22%
no change	6	33%
above asTTle test 1	8	44%
Total	18	100%

Effect Sizes	Overall Effect size	0.25
0.2 or less	Small	
0.2 - 0.4	Medium	
0.4 - 0.8	Large	
0.8 or more	Extra Large	

Year 10	asTTle test 1	asTTle test 2
Average	1493.58	1509.11
SD	50.76	73.75
Average SD	62.26	

About group summary

Main features:

- Focuses on **differences in sub-levels** between two tests.

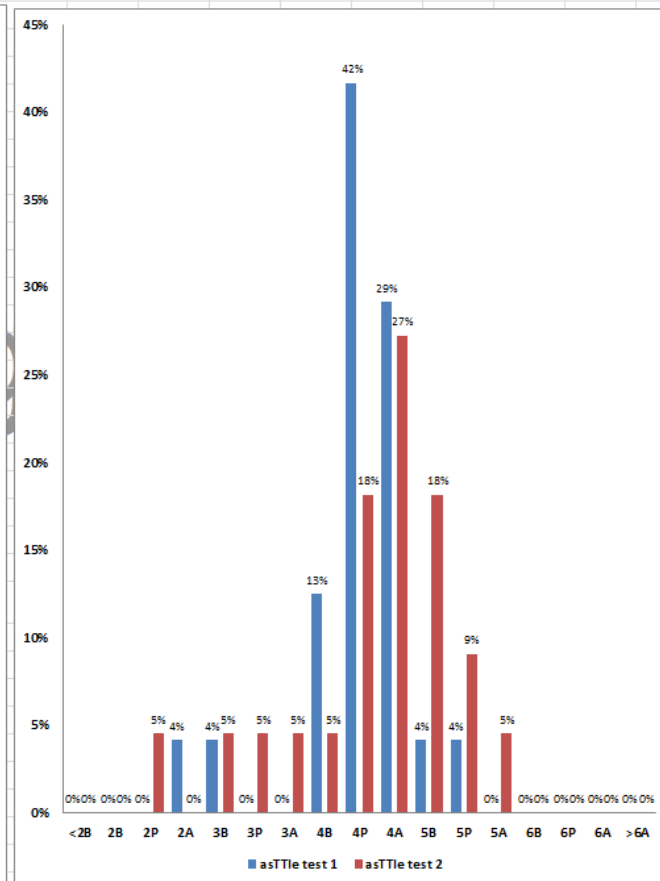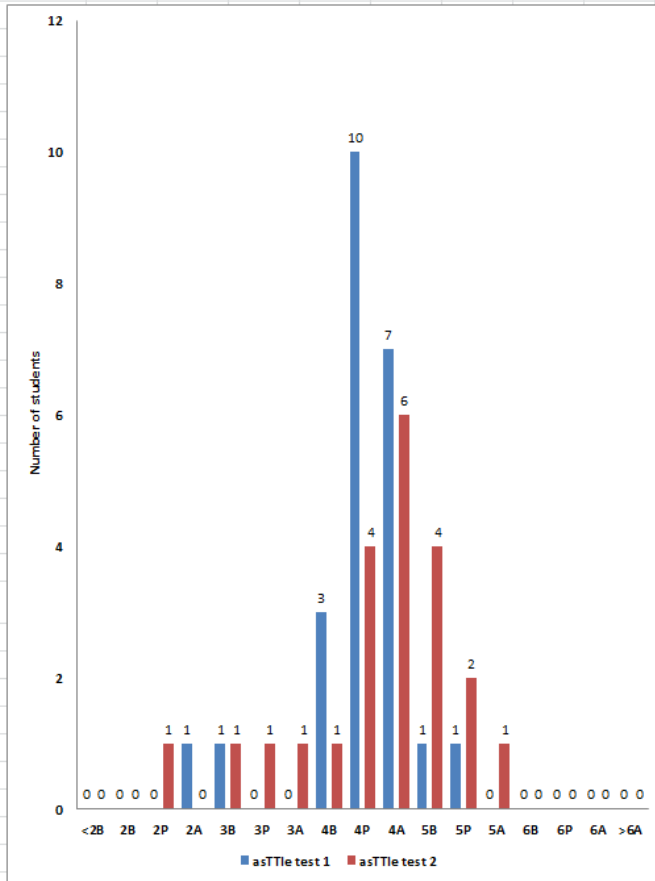- Summarizes the two test results for matched students

Look for:

- Students who are achieving **two or more** sub-levels

Group Bar Graphs

	<2B	2B	2P	2A	3B	3P	3A	4B	4P	4A	5B	5P	5A	6B	6P	6A	>6A	total
asTTle test 1	0	0	0	1	1	0	0	3	10	7	1	1	0	0	0	0	0	24
asTTle test 2	0	0	1	0	1	1	1	1	4	6	4	2	1	0	0	0	0	22
asTTle test 1	0%	0%	0%	4%	4%	0%	0%	13%	42%	29%	4%	4%	0%	0%	0%	0%	0%	
asTTle test 2	0%	0%	5%	0%	5%	5%	5%	5%	18%	27%	18%	9%	5%	0%	0%	0%	0%	

About group bar graphs

Main features:

- Shows the **groups shift** between tests

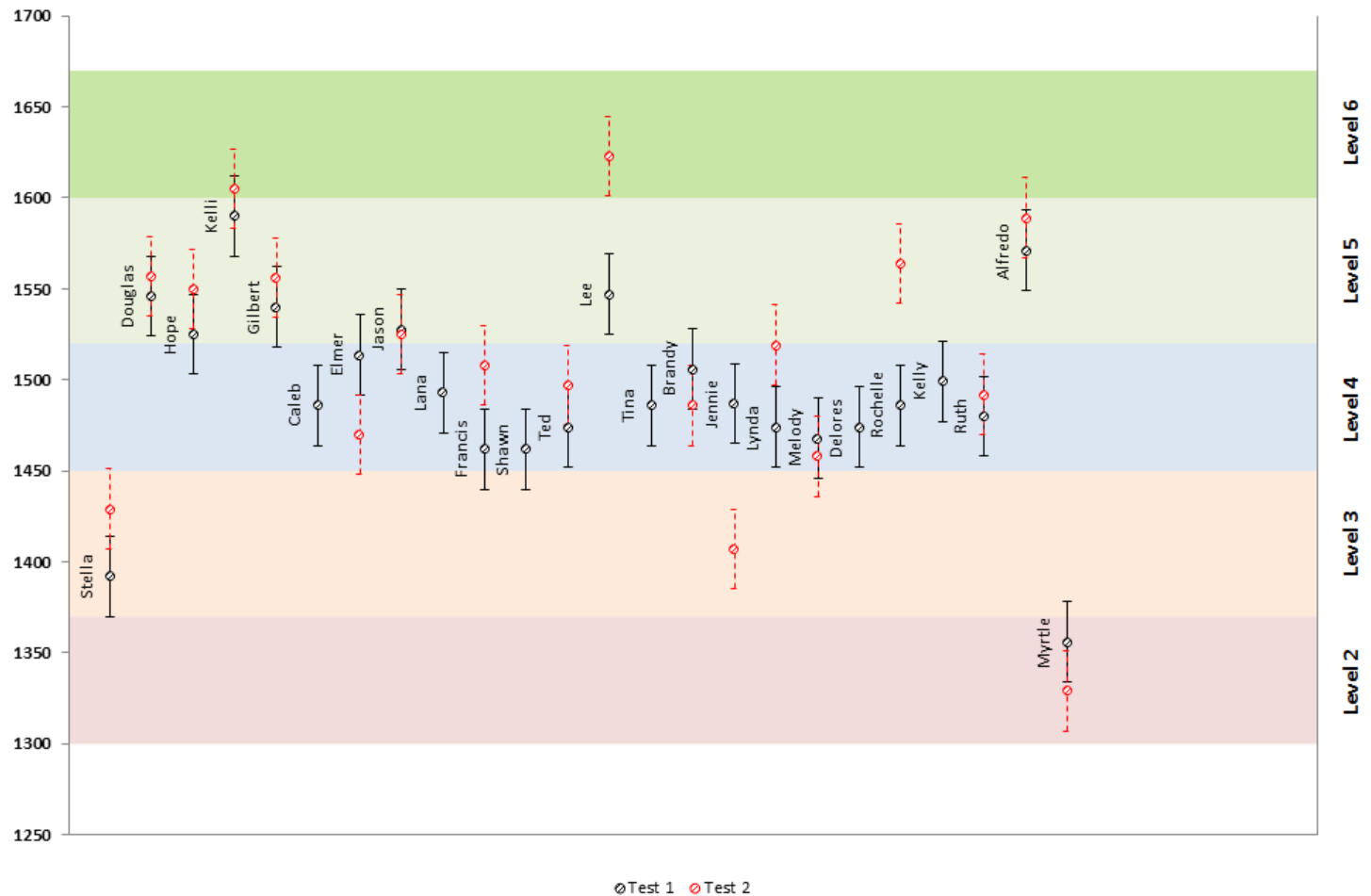- Shows the **readiness** of the group against asTTle levels

Look for:

- The red bars being more towards the right side of the graph to see positive shift (improvement)
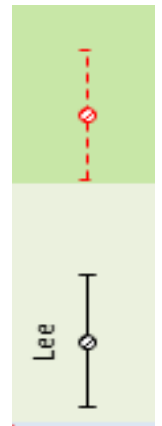
Named asTTle Error bars

About named asTTle error bars

Main features:

- Named asTTle test scores plotted along with the error bars (+ or - 25 points).

- Approximate curriculum bands and where students are currently placed

Look for:

- Significant Differences: two intervals with **no** overlap

NCEA readiness

asTTle test 1

Less NCEA ready															More NCEA ready	
0	0	0	1	1	0	0	3	10	7	1	1	0	0	0	0	0
<2B	2B	2P	2A	3B	3P	3A	4B	4P	4A	5B	5P	5A	6B	6P	6A	>6A
0%	0%	0%	4%	4%	0%	0%	13%	42%	29%	4%	4%	0%	0%	0%	0%	0%

asTTle test 2

Less NCEA ready															More NCEA ready	
0	0	1	0	1	1	1	1	4	6	4	2	1	0	0	0	0
<2B	2B	2P	2A	3B	3P	3A	4B	4P	4A	5B	5P	5A	6B	6P	6A	>6A
0%	0%	5%	0%	5%	5%	5%	5%	18%	27%	18%	9%	5%	0%	0%	0%	0%

Page 1

About NCEA readiness

Main features:

- Shows where the students are grouped against an

    approximate **NCEA readiness** measure

- Shows shift between tests

Look for:

- More numbers moving closer towards the NCEA

    ready side of the display