



evaluation
associates

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Mātauranga



2022 NCEA Te Reo Matatini me te Pāngarau | Literacy and Numeracy Pilot Evaluation

Evaluation Report Two

March 2023



Tēnei rā te whakairi ake i te kete o te wānanga,
Tōna mauri nō runga, nō Rangī, nō raro, nō Papa,
Tēnei te mauri o te mātauranga ka whakatakina ake,
Kia wātea ai ēnei pūkenga,
Hui e, tāiki e!

*Bestow the life force of learning,
Upon these repositories,
So that aspiration of quality learning for our children is paramount,
And remains at the forefront of all of our works,
So that they may flourish and thrive,
For all eternity!*

Table of Contents

Executive summary	6
Summary of recommendations	16
Section 1: Introduction	24
1.1 Pilot of Te Reo Matatini me te Pāngarau Literacy and Numeracy standards	24
2021 Pilot.....	24
2022 Pilot.....	24
1.2 Evaluation Approach	25
1.2.1 Scope	25
1.2.2 Evaluation methods	26
1.2.3 Sources of data for evaluating the Literacy and Numeracy Standards	27
1.2.4 Sources of data for evaluating the Te Reo Matatini me te Pāngarau Standards	27
1.2.5 Limitations of the evaluation	28
1.2.6 Report structure	28
PART ONE: TE REO MATATINI ME TE PĀNGARAU UNIT STANDARDS.....	30
Section 2: Participation in Te Reo Matatini me te Pāngarau Unit Standards	30
2.1 Participation by standard	30
2.2 Participation by gender and ethnicity	31
2.3 Participation by decile	32
2.4 Participation by year level	32
Section 3: Ākonga results.....	33
3.1 Results for all ākonga	33
3.2 Results of ākonga re-sitting in September.....	34
3.3 Results of ākonga by gender	34
3.4 Results of ākonga by year level.....	35
3.5 Results of ākonga by ethnicity	36
Section 4: Feedback from kaiako and tumuaki	37
4.1 Experiences and views of the pilot.....	37
PART TWO: LITERACY AND NUMERACY UNIT STANDARDS	42
Section 5: Participation and selection process	42
5.1 Who participated in assessment against the Literacy and Numeracy Unit Standards?	42
5.1.1 Participation by standard and provider type	42
5.1.2 Participation by gender and ethnicity.....	43
5.1.3 Participation by decile	44
5.1.4 Participation by year level	45

5.2	Readiness of participating students indicated by e-asTTle scores	48
5.2.1	Pilot cohort e-asTTle scores by assessment event and standard.....	49
5.2.2	Pilot cohort e-asTTle scores by ethnicity	53
5.2.3	Pilot cohort e-asTTle scores by decile	54
5.3	How were students selected to sit the Literacy/Numeracy CAA?	57
5.3.1	Approaches for selecting students	57
5.3.2	Approaches for determining student readiness.....	59
5.3.3	Teacher perceptions of student readiness.....	61
Section 6: Student results		64
6.1	Secondary student results for Literacy and Numeracy Unit Standards	64
6.1.1	Achievement results for all secondary students	64
6.1.2	Achievement results for students re-sitting in September	66
6.1.3	Comparisons of achievement results for students who were below or at/above the recommended curriculum level (using e-asTTle scores).....	66
6.1.4	Discussion of secondary student achievement results	69
6.2	Secondary student results by gender, year level, ethnicity and school decile	74
6.2.1	Results by gender	74
6.2.2	Results by Year level	75
6.2.3	Results by ethnicity	76
6.2.4	Results by school decile	82
6.3	Sub-group results for the Literacy and Numeracy Standards	91
6.3.1	English Language Learners - results and insights	91
6.3.2	Students who were afforded Special Assessment Conditions - results and insights	94
6.3.3	Teacher insights about Special Assessment Conditions	97
6.3.4	Tertiary/Alternative Education/Te Kura - results and insights.....	102
6.3.5	Realm - results and insights	108
Section 7: Views on the Literacy and Numeracy Standards and their impact.....		117
7.1	Perspectives on the equitability of the Literacy and Numeracy Standards	117
	Discussion of three key barriers to equitability	118
7.2	Student views on the Literacy and Numeracy Unit Standards	124
7.3	Teacher views on reported changes from the Literacy/Numeracy Standards.....	130
7.3.1	Systems and interventions introduced by schools and organisations.	131
Section 8: Experiences and views of the pilot		141
8.1	Views on the supporting resources for the Literacy and Numeracy Unit Standards.....	141
8.2	Pilot teacher views on the delivery of the Literacy and Numeracy Standards	145
Conclusion.....		156
Appendices		158
Appendix 1: List of Charts and Tables.....		158
List of Charts.....		158

List of Tables	160
Appendix 2	163
Sources of Data for the Evaluation.....	163
Appendix 3:.....	166
NCEA Te Reo Māori & Pāngarau Kaiako/Teacher Readiness Report - Dec 2022 Ngā Kura Māori	166
Appendix 4:.....	167
Overall 2022 Participation and Achievement Data Summary Table.....	167
Appendix 5.....	169
2022 NCEA Literacy and Numeracy Pilot - Assessment event two - September.....	169
References	172

Executive summary

Introduction

Evaluation Associates | Te Huinga Kākākura Mātauranga have conducted this evaluation for the 2022 pilot of the Te Reo Matatini me te Pāngarau | Literacy and Numeracy Unit Standards. The pilot has been jointly led by the Ministry of Education (the Ministry) and New Zealand Qualifications Authority (NZQA). These new standards are part of the wider NCEA Change Programme and aim to ensure that ākonga/students¹ with an NCEA qualification will have a foundational level of te reo matatini or literacy and pāngarau or numeracy. The achievement of these standards will meet the requirements of the co-requisites for ākonga/students to be awarded an NCEA qualification.

Ten Māori-medium kura and three English-medium secondary schools providing te reo Māori education were involved in piloting the Te Reo Matatini me te Pāngarau Standards in 2022. The pilot of the Literacy and Numeracy Standards has involved 198 New Zealand schools, seven Tertiary organisations, and seven schools from Realm countries (Cook Islands and Niue). Ākonga/students from these kura, schools and organisations were selected to participate in two assessment events². The first assessment event in June saw 16,368 ākonga/students participate in one or more of the five standards, in the second event in September there were 21,154 ākonga/students.

This second evaluation report for the 2022 pilot-year follows the second assessment event held in September. The report discusses and compares data from the June event, the September event, and the 'overall 2022' data³. The findings from the two events are similar, and further consolidate the key findings discussed in the first report.

The Evaluation

The evaluation aims to:

- understand how the assessments are performing and whether there are opportunities for the assessments to be further refined and improved.
- understand how the pilot schools, kura, and organisations are building their capability and what is needed going forward.

The key learnings from this pilot will inform and further refine the next steps for the effective implementation of these new unit standards.

¹ Throughout this report, the ākonga/students involved in the pilot of the Te Reo Matatini me te Pāngarau Unit Standards are referred to as ākonga. Those participating in the Literacy and Numeracy Unit Standards are referred to as learners or students. When referring to both groups of students, they are called ākonga/students.

² An option for a portfolio assessment was available for assessment against the Te Reo Matatini and Pāngarau standards but none were submitted.

³ Overall 2022 data is a collation of the data for both the June and September events, with the exclusion of the June results for those students who did not achieve and re-sat in September. Just over half of the June students who did not achieve re-sat in September, this number of students meant that approximately 20% of the September cohort were re-sitting the assessment.

Evaluation method

The evaluation uses a mixed methods approach, which includes:

- an analysis of the achievement results.
- pilot teacher end-of-year survey data (71% response rate).⁴
- survey data from students who participated in the Literacy/Numeracy CAA (response rates of 42% Literacy (reading), 42% Literacy (writing), 36% Numeracy).
- thematic analysis of the information gathered from focus groups and key informant interviews representing English Language Learners, Realm country schools, Tertiary and Alternative Education, and Te Kura⁵.
- thematic analysis of data and information gathered about NCEA Te Reo Matatini me te Pāngarau by Tai Huki Consult Ltd (direct feedback, NZQA markers reports about the September assessments and summary discussions from hui).

The first part of this report brings together the participation data and achievement results data for Te Reo Matatini me te Pāngarau Standards, as well as a summary of feedback from kaiako and tumuaki participants from a sample of pilot schools and kura.

The second part of the report focuses on the Literacy and Numeracy Standards and includes a description of the participating students and a discussion of processes used for student selection and determining readiness. Achievement results are reported for the secondary school student cohort, for different demographics within the cohort (gender, Year level, ethnicity, and decile), and specifically for four sub-groups within the pilot (English Language Learners (ELL), students who used Special Assessment Conditions (SACs), students from Realm country schools and Tertiary students. The data from the cohort of 'all secondary' students is inclusive of these sub-groups - with the exception of Tertiary students. The final two sections in the report are focused on teacher and student views about the standards, the changes that are occurring in schools and in teaching and learning, along with teacher experiences of piloting the standards.

Part One: Te Reo Matatini me te Pāngarau Standards

Participation and selection processes

Ākonga who participated in the Te Reo Matatini and/or Pāngarau Standards were from either English-medium secondary schools providing te reo Māori education (n=2) or Māori medium kura (n=8). Kura/schools had the autonomy to decide who was entered into the CAAs and ākonga were selected to participate based on kaiako and tumuaki observation and judgement.

Fewer ākonga participated in the June assessments than in September (Te Reo Matatini 38 vs 124, Pāngarau 95 vs 149) and for both assessment events more ākonga participated in the Pāngarau assessment than were entered into Te Reo Matatini assessment. The September cohort included both ākonga sitting the CAA for the first time and those ākonga who were re-sitting the assessment. Approximately 87% of the students participating in the

⁴ The survey responses represented 128 of the 181 schools/organisations in the Literacy and Numeracy pilot (192 responses in total: n=56 for Literacy (reading), n=47 for Literacy (writing), n=89 for Numeracy).

⁵ Te Aho o Te Kura Pounamu who provide distance education to nearly 6000 secondary aged students.

Te Reo Matatini me te Pāngarau Standards identify as Māori, there is an even gender distribution and school deciles represented are 1,2,3 and 8.

Ākonga results

In both June and September the Te Reo Matatini standard had the highest rate of achievement (44.1% for overall 2022), followed by Pāngarau (32.8% for overall 2022). While there were improvements in the achievement rates from June to September (23.7% to 43.5% for Te Reo Matatini and 17.9% to 30.2% for Pāngarau), the overall rate of achievement in both assessments is low. Female students showed higher achievement rates than male students, with a very small difference in Te Reo Matatini and a greater difference for Pāngarau. However, it is important to be aware that limited conclusions can be drawn from comparisons of achievement rates due to the small numbers of ākonga.

Feedback from kaiako and tumuaki

- While ākonga were able to submit a portfolio-based assessment for both standards, this option was not used. The key reasons for this preference for the CAA over the portfolio include the shorter time needed to complete the CAA (as opposed to the portfolio) and the online nature of the CAA. Kaiako and tumuaki noted in their feedback to Tai Huki Consult Ltd, that further PLD support would assist them in considering and using a portfolio-based assessment approach and there is merit in continuing to support portfolios as an assessment option alongside the CAA.
- Specific PLD support for Te Reo Matatini me te Pāngarau has been well received where provided. Kaiako and tumuaki report feeling more ready and confident in administering the assessments and making changes to internal systems and processes where more time has been available to understand the new standards.
- There appears to be value in longer term engagement of PLD support and this includes understanding the requirements of the new standards sufficiently in order to integrate the appropriate learning within kaupapa and learning programmes.
- As more kura and schools begin to use the standards, assessment resources and information, there will be benefits gained from increased opportunities for collaborative sense-making and connection across kaiako, kura and schools.

Areas for further improvement identified in the Tai Huki Consult Ltd feedback included:

- Improve digital device access to ensure ākonga have the necessary and requisite digital skills to complete the assessment online.
- Maintain the responsive support and “*great service*” that was provided by NZQA during the September assessment event, while also addressing some of the longer delays experienced by those seeking urgent support during the assessment event.
- Improvement to the communications and information sharing approach.
- Managing the load and expectations on Principal’s Nominees.

Part Two: Literacy and Numeracy Unit Standards

Participation and selection processes

The 2022 pilot involved 18,420 students participating in the assessment for Literacy (reading), 17,583 in the Literacy (writing) and 23,555 in the assessment for Numeracy. Both the June and September cohorts had a representative distribution of gender⁶, ethnicities⁷ and school deciles⁸, and 82% of the secondary school participants were Year 10 students. The cohort of 'all secondary' students is inclusive of English Language Learners (ELL), students who used Special Assessment Conditions (SACs), students attending Alternative Education and students from Realm country schools. The data for Tertiary is not included in the 'all secondary' data.

Readiness of participating students

Pilot schools were given a recommendation that the minimum level of readiness for students to undertake a Literacy and Numeracy assessment was late Level 4/early Level 5 of the New Zealand Curriculum (NZC). Schools were also recommended various tools for assessing readiness. For the e-asTTle tool Level 4A is the minimum indicator for student readiness.

In the cohort of 'all secondary students', an analysis was carried out on the sub-group⁹ with valid¹⁰ e-asTTle data¹¹, which shows for both assessment events and for all three standards, between 17% and 27% of this sub-group were assessed as working below the recommended New Zealand Curriculum level (high level 4/low level 5)¹². The proportions of students who were ready vs not ready, varied between the two assessment events, between the three standards, and also by decile groupings and ethnicity groupings. Key findings regarding readiness levels were:

- The cohort of students participating in Literacy (writing) show the lowest levels of readiness and the cohort for Literacy (reading) shows the highest levels of readiness.

⁶ The Ministry currently holds only binary sex data. This means that there is no way to determine whether trans, genderqueer, non-binary, or intersex learners participated in the pilot and, therefore, no way of understanding their experiences of the assessments.

⁷ Ethnicity is reported using a total response method which means students are counted in all ethnic groups they identify with.

⁸ Caution should be used in analysing results by decile groupings, the very recent changes in the decile system (January 2023 saw a transition from deciles to an Equity Index), aims to better represent the nuances in measuring socio-economic disadvantage.

⁹ In September the percentage of secondary students with valid e-asTTle scores were 63% for Literacy (reading), 23% for Literacy (writing) and 50% for Numeracy and these proportions are representative.

¹⁰ A valid e-asTTle score was defined as being either (1) recent (Jan 2022 or later) or (2) if a score is not recent it must be above the sub-level score 4A.

¹¹ e-asTTle data was used as it is held by MoE and was sourced by NZQA for the purpose of this analysis.

¹² Schools were recommended a number of tools for assessing readiness. This analysis has used e-asTTle scores to understand readiness which means a sub-level score of 4A was the recommended minimum indicator for student readiness. Note that it cannot be assumed that in all cases the e-asTTle score is a full and accurate measure of the curriculum level, particularly in writing which is teacher marked.

- Lower decile schools had greater proportions of students participating who were below the recommended curriculum level than higher decile schools. For example, in Literacy (reading) decile 1 and 2 schools had 62.2% (n=361) of students below 4A in comparison, decile 9 and 10 schools had 12.5% (n=451) of students below 4A.
- The e-asTTle analysis for ethnicity-based cohorts showed that the Māori and Pacific Peoples¹³ groupings had greater proportions of students participating who were below the readiness level than the Asian, European and MELAA groupings. For example, in the Numeracy assessment Pacific Peoples had the highest proportion of students below 4A (34.4% n=414) while the Asian grouping had the lowest (13.2% n=253).

Variable levels of student readiness suggests differences in cohort abilities, which has implications for interpreting and understanding the differences in achievement levels.

Approaches for selecting students

Selection processes for students varied depending on the context of the schools and organisations, different perspectives on inclusion, wider school community expectations, and what the school wanted to learn from the pilot.

Key findings regarding student selection from the end-of-year survey were:

- Most schools and organisations selected a whole Year level. Other cohorts selected (either instead of or as well as) were students who met the readiness criteria, students who had not met the standard in the first assessment event, and students who had 'chosen' to participate.
- The selection decisions varied depending on the Year level of the students. The most common Year level entered was Year 10 (82%). Year 9 cohorts tended to include only extension classes or those working at upper level 4 or above of the Curriculum. Students in Year 11, 12 and 13 tended to be entered if they had not yet met the existing NCEA Literacy and Numeracy requirements.
- In the end-of-year teacher survey 185 teachers indicated the various 'readiness' indicators or diagnostic tools they had used. 'Teacher observation through class observation and student work' was the most chosen readiness indicator (21%) but nearly all of these teachers selected 'teacher observation' alongside another tools. The e-asTTle tool was the next most selected (17%). A small number (9%) indicated they were not determining readiness at this stage.
- Selecting students based on readiness created a tension for some schools where 'selecting' students felt at odds with other more inclusive approaches in their schools, such as discontinuing academic streaming.

Decisions made by schools and organisations about who participates in the CAAs have implications for the extent to which students are likely to be 'ready' to achieve the assessment. This is evident in some of the achievement results findings.

¹³ Note that no students from Realm schools had available e-asTTle data meaning Pacific Peoples e-asTTle scores are representative of New Zealand-based students only.

Student results¹⁴

In both assessment events the Literacy (reading) assessment had the highest rate of achievement (67% for overall 2022), this was closely followed by Numeracy (64% for overall 2022) and Literacy (writing) had the lowest rate (50% for overall 2022).

Approximately a quarter of students participating in the September assessments were 're-sitting' after not achieving in June. These students achieved the standards at lower rates than the overall cohort with 36% achieving Literacy (reading), 38% achieving Literacy (writing) and 39% achieving Numeracy.

The comparison of the June and September event data showed a decrease in achievement for Literacy (reading) (from 64% in June to 58% in September) and a significant increase in achievement for the Literacy (writing) Standard (from 34% to 46%). Numeracy results were very similar (56% to 57%).

Analysis of the achievement rate for the CAAs against students' e-asTTle scores suggests a predictive relationship, particularly for Literacy (reading) and Numeracy. The recommended minimum readiness level of 4A (e-asTTle) means nearly three-quarters of students will achieve the standards within two attempts - 75% for Literacy (reading) and 71% for Numeracy and Literacy (writing). Using 5B as the indicator increases the likelihood of achieving the standard by between 7 and 23 percentage points (depending on which CAA). The e-asTTle Writing assessment appears to be less predictive of achieving the Literacy (writing) CAA which is possibly because the two assessments measure different aspects of writing and rely more on teacher judgement.

There is not a clear explanation for the lower rate of achievement in Literacy (writing), but it is likely that as teachers gain greater clarity about the requirements of the assessment, in relation to the criteria in the standard, that effective teaching and learning will support more students who are at the recommended level to achieve.

Movement in achievement rates between the two assessment events is likely to be influenced by the different levels of abilities/readiness of the two cohorts. However, the interplay between readiness and achievement is complex and is likely to be affected by other variables such as the accuracy of e-asTTle results, the Reading, Writing and Mathematics e-asTTles being equally reliable indicators of readiness, the assumption that the schools in the two assessment events were equally ready for implementing the assessments, the impact of the COVID 19 pandemic, and reduced student attendance in many schools. Not being able to control for these factors in this evaluation means that it is difficult to draw accurate conclusions about the differences between the two assessment events.

Results and insights for pilot sub-groups

One aspect of examining the equitability of the standards involves comparing results for different cohorts (by gender, Year level, ethnicity and school decile) and also looking at differences in achievement for four sub-groups in the pilot. These are English Language Learners (ELL), students using Special Assessment Conditions, students enrolled with tertiary providers, and students from Realm countries.

¹⁴ A table summarising achievement results for all secondary students and by gender, ethnicity, decile, ELL, students with special assessment conditions, Realm countries and Tertiary is shown in Appendix 4.

There were differences identified in the results by gender with female students showing higher achievement levels than male students in Literacy (writing) and slightly higher levels in Literacy (reading). Male students showed slightly higher achievement levels in Numeracy.

For all three standards the differences between decile groupings showed an overall trend of higher decile schools having higher achievement rates. For all three standards the differences in the five ethnicity groupings showed students identifying as Asian, European and MELAA having similar results that were above the mean achievement rate, while students identifying as Pacific Peoples and Māori showed lower achievement levels with results below the mean. The four sub-groups (ELL, students using SAC, tertiary students, and Realm students) also showed lower rates of achievement than the overall cohort across all three Standards and in both assessment events.

An important factor in understanding these differences in achievement results is the corresponding differences in readiness levels between the groupings. The decile and ethnicity groupings with lower rates of achievement also had lower levels of readiness (as indicated by the proportion of participating students with e-asTTle scores below the recommended readiness level).

It is likely that this is due to many schools taking a Year level approach rather than a readiness approach to selecting students. New Zealand research on student achievement shows that rates of progress appear similar across all ethnicity-based sub-groups on average, with differences in achievement appearing to be related to different start-points. (Caygill, Zhao, Hunter & Park, 2021). The pattern of results shown in the pilot provides an understanding that there will be inequitable impacts on particular students and schools as a result of a Year level selection approach. Understanding this should be a key consideration for how selection decisions are made about which students should participate in the Literacy and Numeracy assessments.

When only the results for students who were 'at or above' the readiness level were compared by-decile and by-ethnicity, the achievement gaps between the groupings were reduced, but not eliminated. This analysis suggests that differences in cohort readiness contributed to some of the differences in achievement - but not all. The achievement gaps that remain between these sub-groups and the overall cohort are likely to be largely influenced by existing inequalities within the wider system. However, there was also feedback in the teacher end-of-year survey, and from the interviews and focus groups conducted that identified issues relating to accessibility and assessment design that may impact some students more than others. These issues included:

- The digital/on-line approach was seen to contribute to disparities due to variable access to devices and the resulting impact on students' digital skills (which were seen to be impacted by socio-economic circumstances). Connectivity issues were an issue for some geographical areas but particularly Realm countries.
- Additional challenges for students with neurodiversity and other learning needs.
- Aspects of the assessment design included the level of literacy required to access/understand the questions (particularly in the Numeracy Standard) and the relevance/relatability of some contexts for ELL and Realm students. The method of assessment used (exam-style) was identified as a barrier for some learners and the limited frequency of the assessment events was seen as a barrier for tertiary students.

- The standards are co-requisites for achieving an NCEA qualification and the implications of particular groups of students being less likely to achieve them was seen to be significant – there was a clear view from teachers working with these sub-groups that “fewer priority learners¹⁵ will achieve an NCEA qualification”.

The addition of the new Literacy and Numeracy Standards was seen by many pilot participants to be ‘high stakes’. Key to reducing, rather than perpetuating, the disparities that exist within the education system is ensuring that barriers in the assessment design and implementation approach are identified and successfully addressed, and that the necessary supports to enhance teaching and learning programmes are provided.

Reported changes in schools and organisations

It is important to recognise that the assessments are the final step for the schools and organisations implementing the Literacy and Numeracy Standards. The intent is for the new standards to be well supported by effective teaching and learning across all areas of the New Zealand Curriculum. Every teacher is expected to be a teacher of literacy and numeracy in their subject and provide rich learning opportunities that support students to ultimately achieve the Literacy and Numeracy assessments.

It is anticipated that schools/organisations and teachers will be planning and making a wide range of changes which may include system level changes, the use of assessment and progress monitoring tools, changes to subject planning and curriculum delivery, and changes to learning support programmes and interventions. In the end-of-year survey 189 pilot teachers rated whether they agreed that particular changes would occur in their school as a result of their involvement in the pilot. Most teachers believed that ‘teaching and learning’ programmes’ (82%) and the way ‘teachers support literacy and numeracy learning programmes’ (79%) would change, fewer teachers believed that there would be ‘changes to the organisation of classes’ (35%).

It is anticipated that the implementation of the new standards will facilitate changes in schools. The following changes were described by 128 teachers:

- Some schools and organisations (17%) are focusing on broader system change, mostly in the form of cross-curricula activities. Other schools reported creating in-school leader roles for literacy and numeracy. These school wide systems go together with a growing awareness of each teacher and department’s responsibility for the literacy and numeracy levels of their students.
- A lot of the change reported (47%) can be seen as small-scale changes to teaching and learning programmes such as literacy or numeracy starters, units of work which incorporate specific literacy and numeracy skills and practice questions and tasks which mirror the expected questions and problems found in the assessment activities. Teachers also reported targeted strategies aimed at specific students or the use of commercial resources¹⁶. Some schools/organisations reported more time allocated to numeracy and literacy classes.

¹⁵ Priority learners are groups of students who have been identified as historically not experiencing success in the New Zealand schooling system. These include many Māori and Pacific learners, those from low socio-economic backgrounds, and students with special education needs (ERO, 2012)

¹⁶ Note the NZAMT free bank of questions is available via nzamt.org.nz/resources

- A number of schools (35%) described changes that were intended or planned but not yet actioned due to waiting for assessment results to inform final decisions.

School and organisations experiences and views of the pilot

The views of the resources on the NCEA website to support the Literacy and Numeracy standards were not particularly positive, with 52% of the 186 teachers disagreeing or strongly disagreeing that 'the teaching, learning and assessment resources available on the NCEA website are designed to appropriately support all students to achieve the standards'. Teachers reported valuing the sample assessment activities and more examples were requested. Teachers also requested practice assessments with marking schedules, questions/question banks, starter activities, and annotated exemplars.

A majority (64%) of schools and organisations agreed/strongly agreed they had received the necessary support to pilot the Standards and 64% also agreed/strongly agreed that the process for administering the CAA was straightforward. Opportunities identified by teachers for strengthening the administration of the assessments focused on the following:

- Technical/digital issues were raised as a significant issue, with specific concerns that as the rollout continues these issues will increase due to schools not having the infrastructure to cope with these digital demands.
- Logistical issues were raised by many of the respondents: workload, stress and wellbeing, students rostered home, teachers supervising the CAA, lack of teacher aides and spaces for students requiring learning support, budget implications, technical support, and timetabling.

However, teachers also reported observing greater awareness and understanding of literacy and numeracy, with increased understanding about student selection and also acceptance that all teachers contribute to developing students' literacy and numeracy levels. A range of views were expressed about the impact on students. Concerns were raised about the prospects for students who struggle with learning and others emphasised increased engagement and motivation from students as a result of participating in the Literacy and Numeracy Standards.

Conclusion

The findings from the June and September assessment events suggest that the Literacy and Numeracy assessments continue to generally perform well against the levelling of the standards and also suggest good alignment with another measure of attainment (e-asTTle). This is particularly true for the Literacy (reading) and Numeracy assessments.

The results data for ākongā who participated in the Te Reo Matatini me te Pāngarau assessments is inconclusive but does provide an indicative measure of achievement at this time. With the smaller datasets, further monitoring would be helpful to identify more useful trends and patterns of participation and achievement over time.

The distribution of the results by ethnicity and decile reveals lower levels of achievement for students who identify as Māori and Pasifika and also for students in lower decile schools. Due to many schools taking a Year level approach rather than a readiness approach to selecting students, these groupings also had a greater proportion of students who were not at the recommended readiness level. However, using a 'readiness' approach was also questioned by some schools who wished to be more inclusive. Being

aware of potential impacts from the two approaches will be an important consideration for more clearly defining and communicating the most appropriate student selection approach.

Even when differences in readiness levels are accounted for achievement gaps are still evident and such results continue to draw attention to the issues of the known inequities in our education system and wider socio-economic inequality. Lower rates of achievement were also reported for the four sub-groups (ELL, students using SACs, Tertiary, and students from Realm countries).

In addition to the known wider inequities, there were issues reported in teacher surveys and interviews/focus groups that also suggests there may be opportunities to address barriers that are related to the accessibility and design of the assessments. Digital inequality was seen to be a critical factor. The implications of the standards being a NCEA co-requisite were also raised as a particular concern.

Building the capability of schools, kura and organisations to implement the standards and for all teachers to support the development of literacy and numeracy skills of all students across all subjects will require significant system and pedagogical shifts. Teachers play a vital role in supporting student success and this includes ensuring students are engaged in effective teaching and learning and being well prepared for the CAAs. The extent of strategic and responsive development occurring within schools and their teaching and learning programmes varies, with many schools (35%) yet to enact any changes or development.

Additional technical/logistical problem-solving, clearer communication, and for schools, kura and organisations to have access to more suitable resources and professional development are all seen to be necessary and beneficial next steps. This is applicable to schools, kura and organisations that are using both the Literacy and Numeracy, and Te Reo Matatini me te Pāngarau standards. Students and ākonga experiencing equitable access to the standards will be dependent on all schools and organisations having the necessary capability and capacity for delivering the standards and administering the assessments.

The readiness of the whole education sector (not just New Zealand secondary schools), to develop and implement the needed systems, processes, and student-focused programmes and interventions, will be critical to ensure all students are adequately prepared for success.

Summary of recommendations

1 Te Reo Matatini me te Pāngarau Unit Standards

Relevant recommendations from Report One

- 1.1 Regarding the option for portfolio assessment for ākonga in kura and secondary schools, NZQA has already begun developing more specific resources to assist kaiako and ākonga to understand how learning can best be captured and presented using portfolios. Feedback from assessment experts notes the additional complexity to undertaking portfolios and the time this requires to grow and build capability, so this will be an area of ongoing development to monitor closely.
- 1.2 For kura and organisations delivering Te Reo Matatini and/or Pāngarau programmes, further support, tools, and guidance are required to set these assessments within the context of their marau ā-kura, the redesign of Te Marautanga o Aotearoa (Te Tīrewa Marautanga), and the development and implementation of Hei Raukura Mō Te Mokopuna.
- 1.3 Embedding the NCEA Te Reo Matatini me te Pāngarau standards more firmly within this vision of Hei Raukura Mō Te Mokopuna will create greater cohesion with the overarching focus of Te Tamaiti Hei Raukura and Te Tīrewa Marautanga. This would support a necessary shift in thinking to consider more broadly the definition of what ākonga achievement and progress looks like, sounds like, and feels like, particularly within the local context of each kura and school.

Additional recommendations from Report Two

- 1.4 With the small number of secondary schools and wharekura using Te Reo Matatini me te Pāngarau standards during the pilot period it was challenging to obtain the perspectives and voice of ākonga regarding the assessment activities and related processes. It would be useful to maintain ongoing engagement with the pilot kura where kaiako are likely to be more familiar and conversant with the use and application of the assessments to gather their ākonga voice.
- 1.5 At this time, the online resources and information regarding Te Reo Matatini me te Pāngarau appear to be spread across multiple websites and portals including the Ministry's NCEA site, NZQA's site, several TKI subsites and other collaborative platforms. Coordinating and centralising key information from across the Ministry and NZQA into one online space (such as Tāhūrangi) may assist with streamlining information for kaiako and tumuaki.
- 1.6 It would be helpful to clarify and reinforce the range of key support staff for Te Reo Matatini me te Pāngarau within the Ministry (at local, regional and national levels) and NZQA, as well as external PLD providers and organisations such as Te Rūnanga Nui o Ngā Kura Kaupapa Māori o Aotearoa and Ngā Kura ā Iwi o Aotearoa. High quality PLD will be a critical contributor to ensuring kaiako and tumuaki feel well prepared and ready to implement the Te Reo Matatini me te Pāngarau standards.
- 1.7 From the two Te Reo Matatini me te Pāngarau assessment events in 2022, NZQA will have data and analysis of the tasks from which to further refine and improve

the quality of the assessments. This should include checking concerns raised by some kaiako and tumuaki interviewed by Tai Huki Consult Ltd about the level of te reo Māori in the assessment tasks.

Literacy and Numeracy Unit Standards:

2 Student readiness and selection processes

Relevant recommendations from Report One

- 2.1 Further understanding of student readiness for the CAAs is required. Many teachers stated they did not understand the student level required, and some schools indicated they used the pilot to understand the level of readiness needed rather than use selection methods such as data from the recommended readiness tools.
- 2.2 School, kura, and organisations could benefit from more focused PLD about the curriculum levels of the readiness indicators and the tools that can help them indicate student and ākonga readiness. Webinars and in-school PLD could support teachers' understanding and practice in this area.
- 2.3 Further resources and activities set at the CAAs levels of difficulty may also support teacher confidence and understanding of the levels required. This could include marking schedules, exemplars and task activities, and question banks. This will require careful design and messaging so that these are used in ways that support the overall purpose of the standards. To prevent teaching to the test, it would be necessary to identify activities and tasks that could broaden units of work and teaching and learning programmes (versus one-off activities aimed to "teach to the test").
- 2.4 Many teachers indicated they would like the return of student papers as it would give them the opportunity to understand the marking of the papers and the standard that students need to reach to pass the exam.

Additional recommendations for Report Two

- 2.5 Further understanding regarding some of the tensions schools are facing about their approach to student selection for the CAA will enable clearer framing of the guidance given to schools.
- 2.6 Support schools and organisations with the provision or development of effective messaging and communication to their students and school community regarding student selection being based on 'readiness' to participate in the assessments.

3 Student results

Relevant recommendations from Report One

- 3.1 The rates of those achieving the standard in Literacy (writing) is lower compared to Literacy (reading) and Numeracy, even if they have achieved similar levels in e-asTTle. For example, those students who had scored 5A in e-asTTle had a 98% achievement rate in Literacy (reading), 96% achievement rate in Numeracy, and only a 77% achievement rate in Literacy (writing). This warrants further analysis if similar rates of achievement are wanted across all three standards.

- 3.2 Further clarity is required regarding expected achievement rates for each of the assessments in order to determine the appropriateness of the readiness indicators used in the pilot.

Additional recommendations for Report Two

- 3.3 Ensure the Literacy (writing) assessment requirements, in relation to the criteria in the standard, are clearly communicated to teachers and well understood.

4 Student results by gender, Year level, ethnicity and decile

Relevant recommendations from Report One

- 4.1 The breakdown of achievement by ethnicity again highlights the wider inequity of the education system and the importance of maintaining, and potentially increasing, the wider capability building and support to remedy this. NZQA will continue to make further improvement to the assessments, however there is a limit to what can be achieved through assessment without wider change occurring.
- 4.2 Understanding more about the significant differences in achievement for low decile schools and tertiary/alternative education organisations is important. The second phase of this evaluation will seek the available e-asTTle data for these sub-groups, and further analysis will better determine whether the variation in results is reflective of the already known differences in achievement or if the CAA design is inequitable.

Additional recommendations for Report Two

- 4.3 Recognise that selecting students to participate by Year level cohorts will result in greater proportions of students from low decile schools and who identify as Māori or Pasifika not being at the appropriate level of readiness and therefore less likely to achieving the standard.
- 4.4 Continue to advocate for and address digital equity, recognising that disproportionate access to digital devices may be a contributing factor to inequitable achievement rates in the Literacy and Numeracy assessments for low decile schools and some Māori and Pasifika students.

5 Sub-group results and insights

Relevant recommendations from Report One

- 5.1 Understanding more about the significant differences in achievement for low decile schools and tertiary/alternative education organisations is important. The second phase of this evaluation will seek the available e-asTTle data for these sub-groups, and further analysis will better determine whether the variation in results is reflective of the already known differences in achievement or if the CAA design is inequitable.

Additional recommendations for Report Two

- 5.2 Clear written information that summarises the SAC processes needs to be available for all schools and organisation early in the school year. An 'understand/know/do' document would assist in developing staff understanding

of SACs and provide enough time for teachers to assess whether the students are able to meet the Literacy and Numeracy Standards with support.

- 5.3 Recognise and resolve the balance of creating question contexts that are culturally inclusive of New Zealand and also Māori and Pasifika students versus culturally 'neutral' content that does not create barriers for migrants, English Language Learners and students from Realm countries.
- 5.4 Ensure the literacy requirements to access the assessment tasks are at the appropriate level.
- 5.5 Review the recommendation regarding Stage 3 on the ELLP being an appropriate readiness indicator for participating in the Literacy and Numeracy assessments, in light of the suggestion that Stage 4 is potentially a better indicator. If appropriate this could be included in the advice and guidance to schools and organisations for determining readiness.
- 5.6 Seek further understanding of the implications for the Literacy and Numeracy Standards being co-requisites and identify the aspects of implementing the assessments that are impacting on attainment.
- 5.7 The proposed administration of the Literacy and Numeracy assessments 3x yearly appears to limit opportunities for some students due to the short duration of many tertiary courses and students who enrol with Te Kura specifically to gain the Literacy and Numeracy Unit Standards. Creating additional options for such students to access the assessments (opportunities to both sit and re-sit) should be considered. This could also avoid Te Kura students needing to sit all three assessments in one day.
- 5.8 Communication and guidance to schools/organisations should emphasise the flexibility in the CAA administration and how the needs of individual students can be catered for. The assessments appear to have been viewed as 'exams', however the conditions for the CAA suggest greater flexibility and support could be incorporated by schools which may assist in reducing student anxiety.
- 5.9 Building on the Ministry's current investigation into portfolios, further explore the suggestions for a portfolio of evidence option to be available for the achievement of the Literacy and Numeracy Standards.
- 5.10 Support the development of resources and professional learning opportunities focused on increasing the quality of literacy and numeracy teaching and learning that will be accessible and appropriate for Tertiary and Alternative Education providers.
- 5.11 Continue to work with the key parties regarding the digital and connectivity issues impacting on the participation of schools in the Realm countries and consider whether paper-based options for sitting the CAA should be retained until these difficulties are improved. Identify schools in which there is a need for appropriate training for staff using the Assessment Master platform.
- 5.12 Explore alternative and further opportunities to more intensively support schools in Realm countries to implement the Literacy and Numeracy Standards, both in the long term and short term.

- 5.13 Support the provision of professional development for schools in Realm countries to access and utilise appropriate assessment tools that can be used as readiness indicators for participation in the CAAs.

6 The equitability of the Literacy and Numeracy assessment activities

Relevant recommendations from Report One

- 6.1 Teachers play a vital role in supporting student success, and it is important to reinforce this. This role includes students being engaged in effective teaching and learning and being well prepared for the CAAs.
- 6.2 Encourage schools to consider what specific actions are needed to support student learning and to prepare them in ways that gives them a good chance to achieve the standards.

Additional recommendations for Report Two

- 6.3 Continue to improve the functionality of the digital platform, including addressing scrolling issues, specific features for students with dyslexia, the addition of a calculator for numeracy, and a spell-check for Literacy (writing).
- 6.4 While the 'digital-first' approach is guiding the implementation of the Literacy and Numeracy Standards there were many suggestions for increased flexibility around this. Consider providing access to paper-based question booklets (for reader/writers and also for students as required) and also some suggestions for the option of completing the assessment completely on paper if this better caters to a student's needs.
- 6.5 Continue to advocate for and address digital equity, recognising that disproportionate access to digital devices may be a contributing factor to inequitable achievement rates in the Literacy and Numeracy assessments for low decile schools and some Māori and Pasifika students.
- 6.6 Teachers identified that this type of assessment can create additional challenges for neuro-diverse students. The development of resources that provide tips, strategies and guidance may assist teachers to ameliorate the barriers so neuro-diverse students are appropriately supported to participate in the assessments.
- 6.7 Concerted effort to upskill all teachers to understand and implement the range of provisions that can be made for neuro-diverse students participating in the Literacy and Numeracy assessments.
- 6.8 Ensure the literacy requirements to access the assessment tasks are at the appropriate level.
- 6.9 Communication and guidance to schools/organisations should emphasise the flexibility in the CAA administration and the how the needs of individual students can be catered for. The assessments appear to have been viewed as 'exams', however the conditions for the CAA suggest greater flexibility and support could be incorporated by schools which may assist in reducing student anxiety.

7 Teacher views on the standards and reported changes occurring in schools

Relevant recommendations from Report One:

- 7.1 A range of case studies showcasing effective literacy and numeracy practice for students and tips for managing the CAA processes effectively would provide the opportunities for schools and other organisations to see and understand how the Literacy and Numeracy Standards and Common Assessment Activities are best applied in a variety of settings. These could be in the form of webinars, written examples, and materials.
- 7.2 The development and sharing of different literacy and numeracy approaches should be encouraged. The setting up of spaces in which to collaborate and discuss resources and approaches, plus brainstorm solutions, may increase confidence levels and feelings of support. The use of online hubs and professional learning groups are good ways to encourage this and might improve students' levels of preparedness for the assessments. Likewise, the use of online hubs and professional learning groups are good ways to create effective professional practice.
- 7.3 Illustrating different ways of incorporating activities into units of work would prevent "teaching to the test." A cross-curricula approach to incorporating literacy and numeracy skills will promote rich curriculum experiences and also possibly preventing the use of ability groupings and the narrowing of the curriculum.
- 7.4 Teachers play a vital role in supporting student success, and it is important to reinforce this. This role includes students being engaged in effective teaching and learning and being well prepared for the CAAs.
- 7.5 Positive experiences should be highlighted within resources such as case studies. Despite this being early in the process for most, some teachers have commented on increased confidence and student engagement. Engaging students only when they have a good chance of achieving the standard should be a key message.
- 7.6 Encourage schools to consider what specific actions are needed to support student learning and to prepare them in ways that gives them a good chance to achieve the standards.
- 7.7 Webinars and case studies could provide a useful framework for schools/organisations implementing the standards in 2023 and 2024; these should highlight the need for schools to prepare students for the assessment events.

Additional recommendations for Report Two

- 7.8 Provide/Include a range of cases studies, pedagogical programmes, webinars, school timetabling approaches, ways to integrate literacy and numeracy approaches within existing learning programmes which will support schools and teachers to develop rigorous teaching and learning programmes.

- 7.9 Facilitated professional learning within schools or groups of schools for teachers to support skills, understanding and confidence to develop effective programmes.
- 7.10 Consider how reading programmes for junior secondary students can be best supported to increase student achievement.
- 7.11 Ensure that primary and intermediate schools understand the expectations of the Literacy and Numeracy progression frameworks and Curriculum Levels so there is a greater alignment between primary/intermediate and secondary schools. This will ensure greater numbers of students will enter Year 9 with the literacy and numeracy skills to be successful at secondary school.
- 7.12 As more schools offer Literacy and Numeracy Standards and the CAA to their students, schools may benefit from sharing ways that they will support students who have not achieved the standards.
- 7.13 Maintain awareness of the potential for the implementation of the Literacy and Numeracy Standards to result in streaming and 'teaching to the assessment' by some schools. Consider how this can be addressed.

8 Resources and pilot delivery

Relevant recommendations from Report One

- 8.1 Leaders and teachers must understand the purposes of the pilot and their role in preparing students for the assessments. Several participants did little to prepare their students or were using the assessments as a way of identifying students' strengths and weaknesses before changing teaching and learning programmes.
- 8.2 For further assessment events, schools will need to consider logistics carefully. Aspects such as technical issues, resourcing, workload, budget, and staffing were identified as issues in their schools. Increased support for school administration and examples of effective administrative practice would be beneficial for all schools.
- 8.3 Some participants indicated there was a requirement to administer the assessment at the same time for all students, and that it made logistics difficult. Some consideration could be given to allow the sitting of CAA in sessions, so adequate classrooms and staffing are available.
- 8.4 Further resources to support the preparation and understanding of the levels required would make teachers feel more supported. This could include marking schedules, exemplars and task activities, and question banks. This will require careful design and messaging so that these are used in ways that support the overall purpose of the standards.

Additional recommendations for Report Two

- 8.5 Consider the development of pedagogical guides (similar to the Level one NCEA Pedagogical Guides) for a range of different subjects in the junior secondary school that would assist curriculum subjects with integrating literacy numeracy skills and knowledge into their specialised subjects.

- 8.6 Continue to address and problem-solve the technical issues that affect the implementation of the CAA. Possible solutions identified by pilot teachers include software and system upgrades in some schools, more funding of technical support positions in schools; more flexible timetabling of CAA and the involvement of schools, particularly Principal's Nominees to identify and help solve complex technical issues.
- 8.7 Continue to further resource and support the preparation and understanding of the literacy and numeracy levels required through marking schedules, exemplars and task activities, and question banks which are designed so that these are used in ways that support the overall purpose of the standards.
- 8.8 Consider the implications of the increased workload for schools (particularly Principal's Nominees), and increased demands on staffing and classroom spaces for supervision. Possible solutions identified by pilot teachers include increased staffing funding or provision of external supervision similar to other external NCEA assessments.

Section 1: Introduction

Evaluation Associates | Te Huinga Kākākura Mātauranga have conducted this evaluation for the 2022 pilot of the Te Reo Matatini me te Pāngarau | Literacy and Numeracy Unit Standards. These new standards, part of the wider NCEA Change Programme, aim to ensure that ākonga/students¹⁷ with an NCEA qualification will have a foundational level of te reo matatini or literacy and pāngarau or numeracy. The achievement of these standards will meet the requirements of the co-requisites for ākonga/students to be awarded an NCEA qualification.

This evaluation report, the second of two for the 2022 pilot-year, follows the second assessment event held in September.

1.1 Pilot of Te Reo Matatini me te Pāngarau | Literacy and Numeracy standards

2021 Pilot

2021 was the first year of a two-phase pilot seeking to understand whether the five new standards and the methods of assessing these new standards were appropriate and whether participants were ready for change. NZQA and the Ministry of Education, with involvement from Massey University, conducted the 2021 pilot, which was small scale. The pilot included 13 secondary schools, six kura and two tertiary providers. COVID-19 affected the number of entries received from these participants, and only 2,313 ākonga/students from the 5,810 entries submitted assessments. The 2021 pilot involved a qualitative and quantitative analysis and made several recommendations that have informed the 2022 pilot.

2022 Pilot

Phase two (2022) of the pilot is on a much larger scale and provides greater detail, critical for quality assurance purposes ahead of a transition year in 2023 and the full implementation of Te Reo Matatini me te Pāngarau | Literacy and Numeracy standards in 2024. In the 2022 pilot ākonga/students were selected to participate in two assessment events, and these were held in June and September. The first evaluation report was completed following the first assessment event and this second report further consolidates the key findings that were identified in that report.

Pilot participants

The pilot of the Literacy and Numeracy standards involved 198 New Zealand schools, seven Tertiary/Alternative Education organisations, and seven schools from Realm countries. Ten Māori-medium kura and three English-medium secondary schools providing te reo Māori education are involved in piloting the Te Reo Matatini me te Pāngarau standards.

¹⁷ Throughout this report, the ākonga/students involved in the pilot of the Te Reo Matatini me te Pāngarau Unit Standards are referred to as ākonga. Those participating in the Literacy and Numeracy Unit Standards are referred to as learners or students. When referring to both groups of students, they are called ākonga/students.

The pilot schools, kura, and organisations are diverse, provide national coverage, and represent different timetable structures and teaching and learning approaches. The selection of schools, kura, and organisations entered reflect the diversity of NCEA learning environments throughout Aotearoa and support an understanding of how the new requirements work in practice in a variety of contexts.

The schools, kura, and organisations who participated in the pilot entered ākongā/students in either one or both assessment events.

Table 1: Numbers of pilot schools and organisations who entered students in the Literacy and Numeracy Standards - June and September

Type of school/organisation	Total schools/organisations participating	June: schools/organisations (n)	September: schools/organisations (n)
English-medium schools	198	140	170
Tertiary organisations	7	4	4
Realm country schools ¹⁸	7	6	7

There were a small number of schools (n=5) and organisations (n=8) who had planned to participate in the pilot but did not enter any students into the assessments.

Table 2: Numbers of pilot kura and schools who entered students in the Te Reo Matatini me te Pāngarau Standards - June and September

Type of kura/school	Total kura/schools participating	June: kura/schools (n)	September: kura/schools (n)
Māori-medium kura	10	4	8
English-medium schools providing te reo Māori education	3	3	2

For the September assessment event there were 21,154 students/ākongā participating in one or more of the assessments. Approximately a third more students/ākongā participated in the second assessment event than the first event, which had a total of 16,368.

1.2 Evaluation Approach

1.2.1 Scope

This evaluation measures the extent to which the objectives of the 2022 pilot of the Te Reo Matatini me te Pāngarau | Literacy and Numeracy Standards and assessments have been achieved. The evaluation aims to do the following:

¹⁸ The Realm countries are Niue (1 school) and the Cook Islands (6 schools).

- understand how the assessments are performing and whether there are opportunities for the assessments to be further refined and improved.
- understand how schools, kura, and organisations are building their capability and what is needed going forward.

The key learnings from this pilot will inform and further refine the next steps for the effective implementation of these new unit standards by the Ministry of Education, NZQA, schools and organisations.

The evaluation is in two phases that are structured around the two assessment events. The first phase of data collection and analysis followed the assessment event held in July, and the evaluation of this data was presented in the first report.

This second report presents the findings from the September event and also looks at the combined results from both assessment events.

Note that analysis or critique of the assessment tasks is not within the scope of this evaluation.

1.2.2 Evaluation methods

This evaluation uses a mixed-methods approach, which involves collecting, analysing, and mixing both quantitative and qualitative data. This approach provides a comprehensive account of what is happening.

Quantitative methods:

- Analysis of the NCEA assessment results by year level, gender¹⁹, decile, ethnicity, ELL status, and type of organisation.
- Psychometric analysis (completed by NZCER)
- Analysis of relationship between student achievement in e-asTTle and the Literacy and Numeracy CAAs.
- Analysis of quantitative survey data (teacher survey and learner survey).

Qualitative methods:

- Thematic analysis of the qualitative survey data (teacher survey and learner survey).
- Thematic analysis of the information gathered from focus groups and key informant interviews (for Report 2).
- Thematic analysis of data and information gathered about NCEA Te Reo Matatini me te Pāngarau by Tai Huki Consult Ltd (direct feedback, guidance from NZQA markers about the assessments conducted in September and summary discussions from hui about Te Reo Matatini me te Pāngarau).

¹⁹ The MoE currently holds only binary sex data. This means that there is no way to determine whether trans, genderqueer, non-binary, or intersex learners participated in the pilot and, therefore, no way of understanding their experiences of the assessments.

1.2.3 Sources of data for evaluating the Literacy and Numeracy Standards

The following sources of data and evaluation information were used. Appendix A provides more detailed information about each data source, including survey questions, response rates, and limitations.

- A pilot teacher end-of-year survey for Literacy and Numeracy Standards
- A learner survey was administered following each of the September Literacy and Numeracy Common Assessment Activities (CAAs)
- Results data from the Literacy and Numeracy CAAs provided by NZQA by gender, ethnicity, decile, year level, ELL status and type of organisation
- Available e-astTTle data for participating students
- Focus groups and interviews regarding: Alternative Education, Tertiary, Te Aho o Te Kura Pounamu, English Language Learners, and Realm country schools.

1.2.4 Sources of data for evaluating the Te Reo Matatini me te Pāngarau Standards

Given the smaller number of pilot Māori-medium kura and secondary schools providing te reo Māori education, it was agreed that a different approach was required to gather data and information about the Te Reo Matatini me te Pāngarau standards. This would give recognition to kaupapa Māori philosophies, as outlined by Tai Huki Consult Ltd²⁰, as well as the general feedback about ākonga and kaiako wellbeing.

Tai Huki Consult Ltd outlined the range of “best-fit Māori data-gathering opportunities” they would use to engage with and seek responses from pilot participants between October and December 2022. This included in-school, face to face visits with tumuaki/principals as well as kaiako te reo matatini and kaiako pāngarau. Tai Huki Consult Ltd also provided opportunities for participants to talk and share via online hui (Zoom/Huitopa). In addition to their own specific set of questions and lines of inquiry for kaiako and tumuaki, Tai Huki Consult Ltd also referred to prompts from a survey developed by Evaluation Associates.

Data also arose from feedback gathered at hui about Te Reo Matatini me te Pāngarau, involving multiple stakeholders in the development of PLD and other supports for kura and secondary schools using these standards.

As noted by Tai Huki Consult Ltd, the number of participants is small, therefore ongoing evaluation and support for ākonga, kaiako and leaders in Māori medium and kaupapa Māori settings is recommended to effectively implement the standards for Te Reo Matatini me te Pāngarau.

²⁰ The link to the full report by Tai Huki Consult Ltd is in Appendix 3.

1.2.5 Limitations of the evaluation

- The completion rate²¹ for the September learner survey is a statistically representative sample, however, because the completion of the learner survey was optional, it is unclear if the individuals who chose to complete the survey adequately represent the full cohort of pilot participants.
- The response rate for the learner survey was slightly higher for those students who achieved the standard than for those who did not. (4 percentage points higher for Literacy (reading) and Numeracy, and 5 percentage points higher for Literacy (writing)).
- This pilot of the Te Reo Matatini and Pāngarau Standards involves only a small number of kura and secondary schools, which makes the size of the sample statistically unrepresentative. While this is the case from a statistical perspective, the findings at this point do reflect and support the recommendations for the Māori-medium and kaupapa Māori sector outlined in ERO's evaluation of Te Reo Matatini me te Pāngarau from 2021.
- There are small numbers of Tertiary institutions, Alternative Education providers involved in the pilot and so the generalisability of findings in the report is limited.

1.2.6 Report structure

This report is in two parts. The first part focuses on the Te Reo Matatini me te Pāngarau standards while the second part focuses on Literacy and Numeracy Standards. Observations and recommendations are included at the end of the main sections. A full list of the recommendations appears after the executive summary. A list of the charts and tables in the report is included in the appendices.

PART ONE: Te Reo Matatini me te Pāngarau Unit Standards

Section 2: details the cohort of students who participated in the assessments for the Te Reo Matatini me te Pāngarau Standards.

Section 3: describes the achievement results data for Te Reo Matatini me te Pāngarau Standards.

Section 4: brings together a summary of feedback from kaiako and tumuaki participants from a sample of pilot schools and kura.

PART TWO: Literacy and Numeracy Standards

Section 5: outlines the background and the pilot for the Literacy and Numeracy Standards. It also details the evaluation purpose and approach.

Section 6: describes the cohort of students who participated in the assessments for the Literacy and Numeracy Standards and how the schools and organisations selected these students.

²¹ Learner survey completion rate for September event was Literacy (reading) 42% n=4,664, Literacy (writing) 42% n=5206, and Numeracy 36% n=5,613

Section 7: reports the overall results for each of the assessments. More detailed analysis of the results includes a discussion of the Literacy and Numeracy CAA results for particular sub-groups; English Language Learners, students from Realm countries, students with Special Assessment Conditions, and students in Tertiary settings.

Section 8: focuses firstly on understanding the views expressed by teachers and students about the Literacy and Numeracy Standards. This is followed by a discussion about the reported changes and other impacts from the standards.

Section 9: discusses the pilot from a delivery perspective.

PART ONE: TE REO MATATINI ME TE PĀNGARAU UNIT STANDARDS

This part of the report brings together the participation data and achievement data for Te Reo Matatini me te Pāngarau, as well as a summary of feedback from kaiako and tumuaki participants from a sample of pilot schools and kura. The section concludes with a summary of key findings from the data, and a list of recommendations to support the delivery of these standards.

As previously noted in this report, Tai Huki Consult Ltd has been instrumental in gathering the feedback from kaiako and tumuaki in relation to their experiences of the pilot. A copy of their findings can be found in Appendix 3.

Section 2: Participation in Te Reo Matatini me te Pāngarau Unit Standards

This section describes the demographics for the ākonga participating in the 2022 pilot for the Te Reo Matatini and Pāngarau Standards.

There are two assessment options available for Te Reo Matatini me te Pāngarau, that is, ākonga can choose to demonstrate their achievement of the standards by completing the CAA or by submitting a portfolio of evidence that shows their achievement of the standards. In the June and September assessment events, all ākonga used the CAA and no portfolios were submitted.

Ākonga who participated in the Te Reo Matatini and/or Pāngarau CAAs were from either English-medium secondary schools providing te reo Māori education (n=2) or Māori medium kura (n=8).

In their feedback to Tai Huki Consult Ltd, kaiako and tumuaki indicated that they used their professional knowledge of ākonga to determine their readiness for the CAA. This included kaiako observation of how well ākonga participated in the learning programmes and achievement in internal assessments at school and kura. This is an area to explore further alongside tumuaki and kaiako, that is, what specific tools and approaches are currently used and what else might be needed to identify and confirm the readiness of ākonga for the new standards.

2.1 Participation by standard

Table 3 below compares the numbers of ākonga who participated in the June and September assessment events for Te Reo Matatini and Pāngarau, as well as the numbers of ākonga who participated in both events.

Table 4 also shows the proportion of ākonga from the June assessment event who were re-sitting the standards in September event. Therefore, the September cohort includes both ākonga sitting the CAA for the first time and those ākonga who were re-sitting the assessment. The percentage of ākonga who did not achieve the standards in June and then re-sat the assessment in September was 15.3% for Te Reo Matatini and 38.9% for Pāngarau.

Table 3: Number of participating ākonga by standard - June, September and overall 2022

Subject	June All ākonga (n)	September			Overall 2022 ākonga (n)
		All ākonga (n)	Re-sitting ākonga (n)	% of Sept cohort re-sitting	
Te Reo Matatini	38	124	19	15.3%	143
Pāngarau	95	149	58	38.9%	186
TOTAL	133				

For both standards there were more ākonga participating in the September event than the June event. For both assessment events more ākonga participated in the Pāngarau standard than participated in Te Reo Matatini standard.

Ākonga participated in different combinations of standards, as shown below in Table 4. In the June assessment event the largest group of students (60.4%) participated in Pāngarau only. In the September assessment event the proportion of ākonga who participated in Pāngarau only had decreased to 34.3%. The proportion of ākonga who participated Te Reo Matatini only has increased from 1% (one ākonga) in June to 21.2% (40 ākonga) in September, the largest proportion of students (44.4%) were entered into both standards.

Table 4: Proportion of students participating in Te Reo Matatini me te Pāngarau CAA by unit standard combination type (June & Sept 2022)

Combination of Standards	June: proportion of participants (%) (n)		September: proportion of participants (%) (n)	
	Pāngarau & Te Reo Matatini	38.5%	37	44.4%
Pāngarau only	60.4%	58	34.3%	65
Te Reo Matatini only	1.0%	1	21.2%	40

2.2 Participation by gender and ethnicity

The gender data for participating ākonga shows a relatively even balance of females and males for both standards. Overall, 2022 participants in Te Reo Matatini were 54% female (n=77) and 46% male (n=66). For Pāngarau there were 51% female (n=96) and 49% male (n=90).

Table 5 shows the ethnicity distribution for ākonga that participated in the September assessment event and the overall 2022 data. Ethnicity is reported using a total response method²². Most students participating in the Te Reo Matatini me te Pāngarau CAAs identify as Māori.

²² Total response ethnicity counts a student in all ethnic groups they identify with. Enrolment forms for schools, Student Management Systems used by the education sector, MoE and NZQA information systems allow students to identify with up to three ethnic groups.

Table 5: Participation by ethnicity in Te Reo Matatini me te Pāngarau (September)

Ethnicity	Te Reo Matatini		Pāngarau	
	September (n)	Overall 2022 (n)	September (n)	Overall, 2022 (n)
Māori	122	140	146	182
Pacific Peoples	9	12	9	18
Asian	3	3	2	3
MELAA	1	1	1	1
European	3	3	5	6

2.3 Participation by decile

Table 6 presents the numbers of ākonga who participated in the Te Reo Matatini and Pāngarau CAA by decile. This data is separated into the June and September assessment events and overall 2022. The overall 2022 data excludes the June results for those students who were re-sitting in September.

Table 6: Participation in Te Reo Matatini me te Pāngarau by decile - June, Sept, overall 2022

Decile	Te Reo Matatini						Pāngarau					
	June		Sept		Overall 2022		June		Sept		Overall 2022	
	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)
1	22	45.6%	19	15.3%	31	21.6%	52	54.7%	38	25.5%	58	31.2%
2	16	33.3%	25	20.0%	32	22.4%	16	16.8%	20	13.4%	27	14.5%
3			74	59.6%	74	51.7%	27	28.4%	63	42.3%	73	39.2%
8			6	4.8%	6	4.2%			28	18.8%	28	15.0%

Ākonga participating in the Te Reo Matatini CAA were only from deciles 1 and 2 kura/schools in the June event. In the September event, a relatively similar number of ākonga from decile 1 and 2 kura/schools participated but over half of the cohort were also from decile 3 kura/schools and a small number (4.8%) from a decile 8 kura/school.

In the Pāngarau CAA ākonga in the June event were from deciles 1, 2 and 3. In September, there were also ākonga from deciles 1, 2 and 3 but 18.8% of the cohort were also from a decile 8 kura/school. There were no schools participating from deciles, 4,5,6,7,9 and 10.

2.4 Participation by year level

Table 7 below details the numbers of ākonga by year level and also the percentage each year group made up of the total cohort.

Ākonga from Years 9, 10 and 11 participated in the June assessment event for both standards. In the September assessment event, two ākonga from Year 12 also participated. The overall 2022 numbers for Te Reo Matatini show Year 10 ākonga made up the largest group with 43.3% of the overall cohort in June and 50% of the overall cohort in September.

Table 7: Year level of ākonga participating in Te Reo Matatini me te Pāngarau - September

Year Level	Te Reo Matatini						Pāngarau					
	June		Sept		Overall 2022		June		Sept		Overall 2022	
	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)
Year 9	25	31.6%	39	31.4%	41	29.7%	21	22.1%	36	24.2%	42	22.6%
Year 10	25	31.6%	58	46.7%	62	43.3%	40	42.1%	79	53.0%	93	50.0%
Year 11	29	36.7%	25	20.1%	38	26.6%	34	35.8%	32	21.4%	49	26.3%
Year 12			2	1.6%	2	1.4%			2	1.3%	2	1.1%
TOTAL	79		124		143		95		149		186	

Section 3: Ākonga results

The overall achievement results for Te Reo Matatini me te Pāngarau in 2022 are reported below. This includes comparison of the results from the June assessment event with the results from the September assessment event. Also included in this section is a more detailed look at the results by gender, year level, ethnicity, and school decile.

The overall 2022 results are a collation of the achievement data for both assessment events, with the exclusion of some June results for those ākonga who did not achieve and re-sat the assessment in September. For students who participated in both June and September, only the result for their second assessment is counted.

This section also reports the differences in achievement rates for the Te Reo Matatini me te Pāngarau assessments for ākonga broken down by gender, year level, ethnicity and school decile. Note throughout this section that participation numbers are small, meaning that firm conclusions cannot be drawn.

3.1 Results for all ākonga

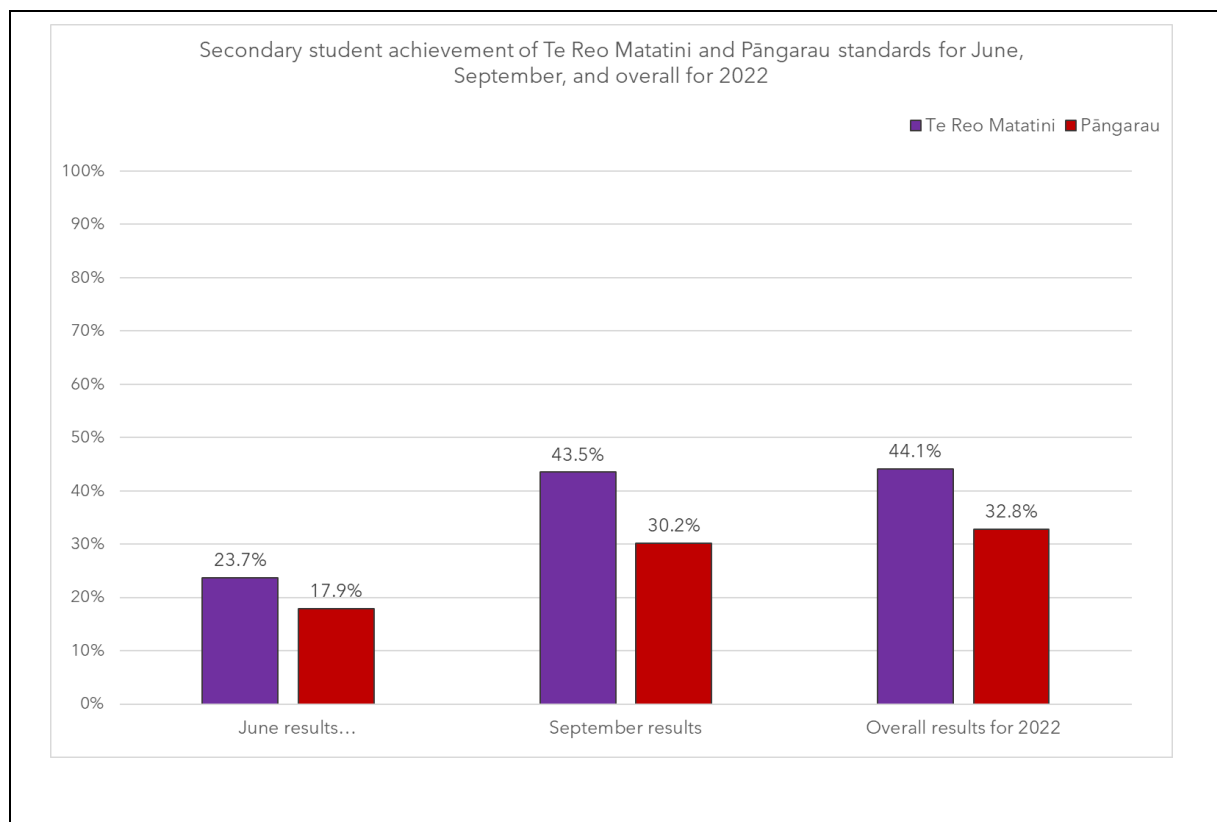
Table 8 shows there was definite improvement in the rate of achievement from June to September, however the overall rate of achievement in both assessments is low (44.1% for Te Reo Matatini, and 32.8% for Pāngarau).

Across both assessment events, the achievement rate was higher in Te Reo Matatini assessments than in Pāngarau, with a more pronounced difference between the two assessments noted in September (13.3 percentage points) than in June (5.8 percentage points). In terms of the overall number of ākonga participating in the assessments, there were more ākonga who participated in Pāngarau assessments than in Te Reo Matatini.

Table 8: Ākonga achievement for Te Reo Matatini me te Pāngarau - June, September, and Overall 2022

Standard	June Results			September Results			Overall 2022 Results		
	All students	Achieved (n)	Achieved (%)	All students	Achieved (n)	Achieved (%)	All students	Achieved (n)	Achieved (%)
Te Reo Matatini	38	9	23.7	124	54	43.5	143	63	44.1
Pāngarau	95	17	17.9	149	45	30.2	186	61	32.8

Chart 1: Achievement for Te Reo Matatini me te Pāngarau for June, September, and overall 2022



3.2 Results of ākonga re-sitting in September

As shown in Table 9 below, the proportion of ākonga who were repeating the Pāngarau assessment was higher than those repeating the Te Reo Matatini assessment. While the participation numbers for ākonga repeating these assessments in September are relative to the participation numbers from June, the rate of achievement remains much higher for those ākonga in the Te Reo Matatini assessments.

Table 9: Achievement results for ākonga re-sitting Te Reo Matatini me te Pāngarau Standards - September

Standard	September repeating ākonga		
	Participated (n)	Achieved (n)	Achieved (%)
Te Reo Matatini	19	9	47.4%
Pāngarau	57	6	10.5%

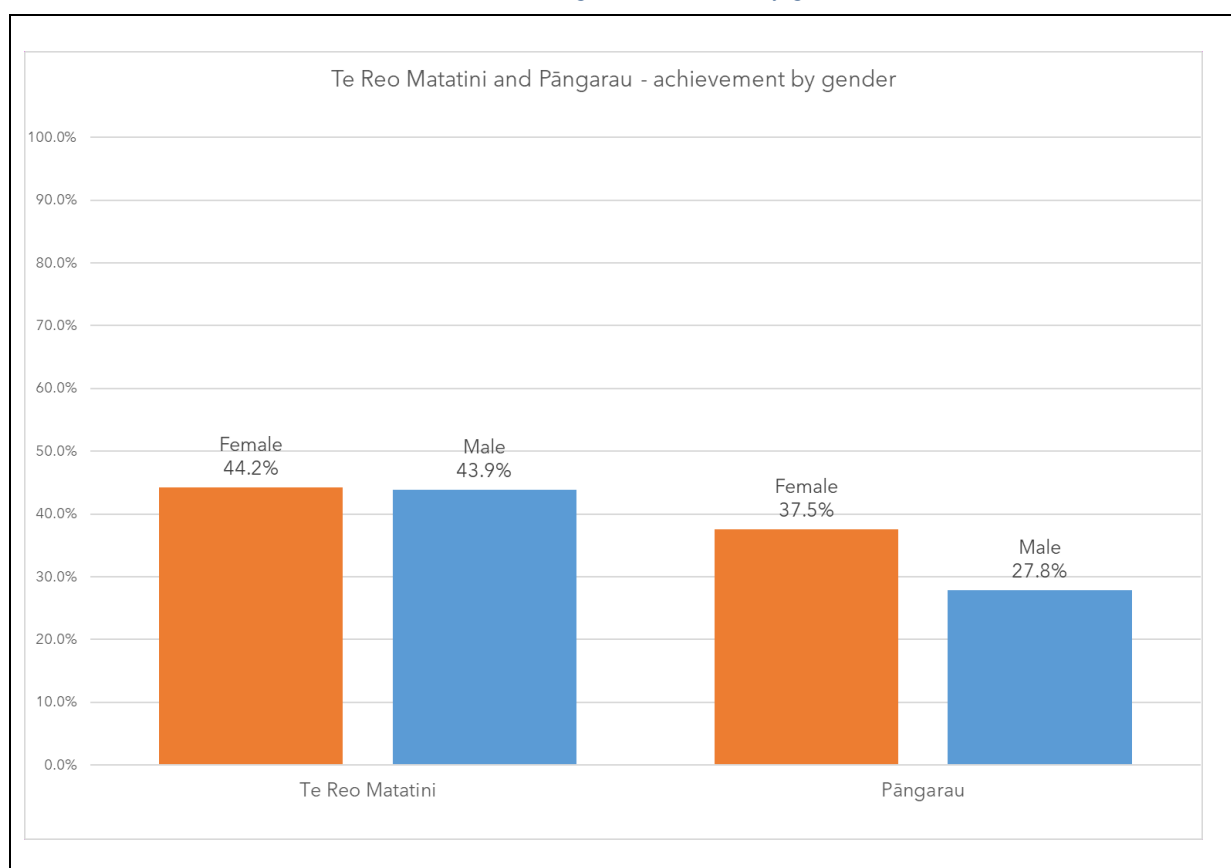
3.3 Results of ākonga by gender

In the overall 2022 results, achievement by gender shows female ākonga performing marginally better than male ākonga in Te Reo Matatini (44.2% for females and 43.9% for males), and slightly better in Pāngarau (37.5% for females and 27.8% for males).

Table 10: Ākonga achievement by gender in Te Reo Matatini me te Pāngarau Standards for June, September and overall 2022

Standard	Gender	June Achieved students		September Achieved students		Overall 2022 Achieved students		
		(n)	(%)	(n)	(%)	Participating (n)	(n)	(%)
Te Reo Matatini	Female	6	27.3%	28	43.1%	77	34	44.2%
	Male	3	18.8%	26	44.1%	66	29	43.9%
Pāngarau	Female	10	18.9%	26	33.3%	96	36	37.5%
	Male	7	16.7%	19	26.8%	90	25	27.8%

Chart 2: Achievement of Te Reo Matatini me te Pāngarau Standards by gender for overall 2022



3.4 Results of ākonga by year level

Year 10 ākonga were the largest cohort to participate across both Te Reo Matatini and Pāngarau. In terms of Te Reo Matatini, the overall achievement rate for Year 9 ākonga (51.2%) was higher than ākonga in Year 10 (40.3%) and Year 11 (44.7%). Although the overall achievement rate in across all Year levels in Pāngarau was low, Year 10 ākonga had the highest achievement rate at 38.7%, followed by Year 11 (28.6%) and Year 9 (26.2%).

Table 11: Ākonga achievement by Year level in Te Reo Matatini me te Pāngarau for June, September and overall 2022

Standard	Year Level	June		September		Overall 2022		
		Achieved students (n)	(%)	Achieved students (n)	(%)	Participating (n)	Achieved students (n)	(%)
Te Reo Matatini	9	2	25.0%	19	48.7%	41	21	51.2%
	10	3	37.5%	22	37.9%	62	25	40.3%
	11	4	18.2%	13	52.0%	38	17	44.7%
	12	0	0.0%	0	0.0%	2	0	0.0%
Pāngarau	9	1	4.8%	10	27.8%	42	11	26.2%
	10	11	27.5%	26	32.9%	93	36	38.7%
	11	5	14.7%	9	28.1%	49	14	28.6%
	12	0	0.0%	0	0.0%	2	0	0.0%

3.5 Results of ākonga by ethnicity

The achievement by ethnicity is organised in large ethnic groupings of Māori, Pacific Peoples, Asian, MELAA²³, and European. Ethnicity is reported using a total response method, where students are counted for each ethnicity they identify with.

Table 12 shows the rates of achievement by ethnicity for the June and September assessment events and also the results overall for 2022. This overall 2022 data excludes the first result for students who re-sat the assessment in September event after not achieving in the June event.

The comparison of achievement data by ethnicity is reported below, however due to the very small numbers of non-Māori/tauīwi ākonga, conclusions about the results cannot be reliably drawn.

Table 12: Ākonga achievement by ethnicity in Te Reo Matatini me te Pāngarau for June, September and overall 2022

Standard / Ethnicity	June		September		Overall 2022			
	Achieved (n)	Achieved (%)	Achieved (n)	Achieved (%)	Participating (n)	Achieved (n)	Achieved (%)	
Te Reo Matatini	Māori	9	24.3%	53	43.4%	140	62	44.3%
	Pacific Peoples	0	0.0%	1	11.1%	12	1	8.3%
	Asian	-	-	1	33.3%	3	1	33.3%
	MELAA	-	-	0	0.0%	1	0	0.0%
	European	-	-	3	100.0%	3	3	100.0%
Pāngarau	Māori	17	18.3%	45	30.8%	182	61	33.5%
	Pacific Peoples	3	18.8%	1	11.1%	18	4	22.2%
	Asian	1	50.0%	1	50.0%	3	2	66.7%
	MELAA	0	0.0%	0	0.0%	1	0	0.0%
	European	1	50.0%	1	20.0%	6	2	33.3%

²³ MELAA = Middle Eastern, Latin American, African students

Section 4: Feedback from kaiako and tumuaki

Due to the small data and evidence base available for Te Reo Matatini me te Pāngarau, commentary about the views of kaiako and ākonga relating to these standards has been collated below. This commentary makes references to the findings and recommendations provided by Tai Huki Consult Ltd in their report - see Appendix 3.

4.1 Experiences and views of the pilot

Preference for CAA approach in pilot

Kaiako and tumuaki interviewed by Tai Huki Consult Ltd indicated a stronger preference for the CAA in the September assessment event. As such, no ākonga were entered into the portfolio-based assessment, and all standards assessed used the CAA.

The key reasons for this preference for the CAA over the portfolio include the shorter period of time required to complete the CAA (as opposed to the portfolio) and the online nature of the CAA. As noted in their feedback to Tai Huki Consult Ltd, further PLD support would assist in considering and using portfolio-based assessment approach. At present, the portfolio approach is still relatively new and does require additional time for kaiako to deeply understand the requirements and expectations in order to support ākonga to use this approach. There is merit in continuing to support portfolios as an assessment option alongside the CAA.

Support to engage with and use the portfolio-based assessment approach

Kaiako and tumuaki reported to Tai Huki Consult Ltd they are open to and interested in the portfolio-based assessment approach despite all ākonga using the CAA. Kaiako and tumuaki indicated a desire for more in-depth PLD including “further understanding of what assessors are looking for, especially within the Portfolio-based assessment.”

From what was shared with Tai Huki Consult Ltd, there are reported inconsistencies in the information, guidelines and resources about portfolio-based assessments which must be checked to ensure there is clarity for kaiako and tumuaki considering this approach. Specifically, kaiako and tumuaki highlighted the need for greater clarity about what constitutes quality evidence and how to best to curate this evidence over the period of learning and assessment, as well as deeply understanding the relevant curriculum levels as these apply to the evidence gathered.

Feedback also indicates a preference to have “exemplars of best practice and/or case studies” to help understand what is meant and required for portfolio-based assessments.

PLD support for kaiako and tumuaki

From the data and feedback gathered by Tai Huki Consult Ltd over 2022, there appears to be value in longer term engagement of PLD support by schools and kura to assist with delivery of the new standards. Where more time has been available to learn about and understand the new standards, the more ready and confident kaiako and tumuaki report to be in administering the assessments and making changes to internal systems and processes. This includes understanding the requirements of the new standards sufficiently in order to incorporate and integrate the learning within kaupapa and learning programmes.

Further to this, kaiako have indicated the need for support to design programmes that are kaupapa driven (Tai Huki, 2022). This could include guidance and resources that are more focussed on curriculum, rather than the assessments.

As more kura and schools begin to use the standards, assessment resources and information, there will be more opportunity for collaborative sense-making and connection between kaiako, with other kura and schools. At present, with the relatively small number of pilot participants using the new standards for Te Reo Matatini me te Pāngarau, there has been limited engagement across the wider network of kura and schools. In their report, Tai Huki Consult Ltd identified that some kaiako found value in being part of other wānanga and cluster-type hui with schools and kura which helped to grow awareness.

Specific PLD support for Te Reo Matatini me te Pāngarau has been well received where provided and has contributed to improving kaiako knowledge, understanding and confidence to use the standards. This support has included hui, information sharing, and brokering communications with NZQA and the Ministry of Education.

Based on the overall results from 2022, including the respective results from each of the assessment events, it appears that Pāngarau requires a more intensive, deliberate support mechanism to ensure ākonga can meet the standards.

In terms of resourcing that would be required, it is recommended that the Ministry and NZQA continue to engage and work with sector representatives, PLD providers, and tumuaki/kaiako to determine the needs beyond what has been implemented as part of the pilot.

Ongoing improvements to CAA online

Within the process for administering and completing the CAA online during the pilot, there are areas for further improvement identified in the feedback gathered by Tai Huki Consult Ltd that would enhance the overall assessment experiences for ākonga and kaiako. These include:

- ready access by ākonga to reliable digital devices to complete the CAA and ensuring ākonga have a well-grounded foundation of digital fluency and capability to be able to focus on the Te Reo Matatini and/or Pāngarau assessment task, rather than “learning how to use their device and required support equipment at the same time.”
- ensuring there is a physical space and environment for ākonga that is conducive to completing an online assessment while still adhering to the required assessment conditions; this can be challenging for some kura that may not have space readily available for the periods of assessment where reliable connectivity is in place, and where noise and other distractions can be minimised.
- maintaining the responsive support and “*great service*” that was provided by NZQA team members during the September assessment event, while also addressing some of the longer delays experienced by those seeking urgent support during the assessment event.
- reconsidering the communications and information sharing approach, in particular the volume, timing and format of the information, with participants noting “...*large*

amounts of information were emailed... required a lot of effort to read them... struggled to find the time."

- managing the load and expectations on Principal's Nominees, in particular with regards to the administration and registration for the online assessments.

Strategic alignment with Hei Raukura mō te Mokopuna

Development work for Hei Raukura mō te Mokopuna is ongoing at this time, and it will be critical to ensure strong alignment of that strategy and its associated action plans with the expectations outlined in the co-requisites. Continuing to strengthen and communicate the alignment and connection of the standards to the strategy work would help to clarify the pathway and progress of ākonga in relation to the Te Reo Matatini and Pāngarau standards.

The Ministry's work programme to support the redesign of Te Marautanga o Aotearoa (including Hei Raukura mō te Mokopuna) will likely already consider what might be needed to assist with marau ā-kura development or improvement as it relates to senior secondary school or wharekura level, opportunities to develop more kaupapa-driven teaching and learning programmes that help to embed the learning required for the new standards, and strengthening aromatawai practices and approaches that are suitable for ākonga at Levels 6 to 8 of the curriculum.

Summary: Te Reo Matatini me te Pāngarau Standards

- Overall results (combined results from June and September) show that 44.1% of ākonga achieved in Te Reo Matatini, while 32.8% achieved in Pāngarau. While these levels of achievement are low, there was an increase in participation and achievement for both standards from the June assessment event to the second event in September.
- Most ākonga participated in both Pāngarau and Te Reo Matatini. By comparison overall, more ākonga participated in the Pāngarau assessment than Te Reo Matatini, however, a greater proportion of ākonga achieved in Te Reo Matatini than in Pāngarau.
- Where ākonga repeated a standard in September which they did not achieve in June, the results show that ākonga were more likely to achieve the Te Reo Matatini standard (47.4% of repeating ākonga achieved) compared with the Pāngarau standard (10.5%).
- By gender, the achievement in Te Reo Matatini by female ākonga and male ākonga was comparable (44.2% female and 43.9% male). For Pāngarau, however, more female ākonga (37.5%) achieved the standard than male ākonga (27.8%).
- Although there are two assessment approaches available to support ākonga with Te Reo Matatini me te Pāngarau, all ākonga in 2022 participated using the CAA and none used the portfolio-based assessment approach. Feedback from kaiako and tumuaki affirms their interest in portfolio as a valid approach and alternative to the CAA, though more time and support is needed to use portfolios.
- There remains concern from some kaiako and tumuaki interviewed by Tai Huki Consult Ltd for cohorts of priority ākonga during the transitional period into using the new Te Reo Matatini and Pāngarau assessment. In particular, whether there is sufficient support and guidance in place to ensure ākonga are ready for the new co-requisite standards.
- The ongoing alignment between the new standards and the emerging work programme for the redesign of Te Marautanga o Aotearoa (including Hei Raukura mō te Mokopuna) is critical.

Recommendations: Te Reo Matatini me te Pāngarau

Relevant recommendations from Report One

1. Regarding the option for portfolio assessment for ākonga in kura and secondary schools, NZQA has begun developing more specific resources to assist kaiako and ākonga to understand how learning can be captured and presented using portfolios. Feedback from assessment experts notes the additional complexity to undertaking portfolios and the time this requires to grow and build capability, so this will be an area of ongoing development to monitor closely.
2. For kura and organisations delivering Te Reo Matatini and/or Pāngarau programmes, further support, tools, and guidance are required to set these assessments within the context of their marau ā-kura, the redesign of Te Marautanga o Aotearoa (Te Tīrewa Marautanga), and the development and implementation of Hei Raukura Mō Te Mokopuna.
3. Embedding the NCEA Te Reo Matatini and Pāngarau standards more firmly within this vision of Hei Raukura Mō Te Mokopuna will create greater cohesion with the overarching focus of Te Tamaiti Hei Raukura and Te Tīrewa Marautanga. This would support a necessary shift in thinking to consider more broadly the definition of what ākonga achievement and progress looks like, sounds like, and feels like, particularly within the local context of each kura and school.

Additional recommendations from Report Two

4. With the small number of secondary schools and wharekura using the Te Reo Matatini me te Pāngarau standards during the pilot period it was challenging to obtain the perspectives and voice of ākonga regarding the assessment activities and related processes. It would be useful to maintain ongoing engagement with the pilot kura where kaiako are likely to be more familiar and conversant with the use and application of the assessments to gather their ākonga voice.
5. At this time, the online resources and information regarding Te Reo Matatini me te Pāngarau appear to be spread across multiple websites and portals including the Ministry's NCEA site, NZQA's site, several TKI subsites and other collaborative platforms. Coordinating and centralising key information from across the Ministry and NZQA into one online space (such as Tāhūrangi) may assist with streamlining information for kaiako and tumuaki.
6. It would be helpful to clarify and reinforce the range of key support staff for Te Reo Matatini me te Pāngarau within the Ministry (at local, regional and national levels) and NZQA, as well as external PLD providers and organisations such as Te Rūnanga Nui o Ngā Kura Kaupapa Māori o Aotearoa and Ngā Kura ā Iwi o Aotearoa. High quality PLD will be a critical contributor to ensuring kaiako and tumuaki feel well prepared and ready to implement the Te Reo Matatini me te Pāngarau standards.
7. From the two Te Reo Matatini me te Pāngarau assessment events in 2022, NZQA will have data and analysis of the tasks from which to further refine and improve the quality of the assessments. This should include checking concerns raised by some kaiako and tumuaki interviewed by Tai Huki Consult Ltd about the level of te reo Māori in the assessment tasks.

PART TWO: LITERACY AND NUMERACY UNIT STANDARDS

Section 5: Participation and selection process

The 2022 pilot involved a total of 37,744 ākonga/students participating in one or both of the assessment events for one or more of the Literacy and Numeracy Standards. Table 13 below provides the basic participant information for the two assessment events.

There were a small proportion of students/ākonga who participated in both assessment events, due to not achieving the Standard in the June assessment and resitting the assessment(s) in September. When data is reported as the 'overall 2022', for those students who participated in an assessment in both June and September, the June result is excluded and only the result for their second assessment is counted.

This section provides information about the pilot cohort of ākonga/students that participated in the CAAs for the Literacy and Numeracy standards and how the schools and organisations selected these students.

5.1 Who participated in assessment against the Literacy and Numeracy Unit Standards?

5.1.1 Participation by standard and provider type

Table 13 shows the breakdown of participating student numbers for each of the Literacy/Numeracy CAA for either the June or the September events. The numbers are separated into participating secondary students and participating tertiary students. Note that the cohort of 'all secondary' students is inclusive of English Language Learners, students with Special Assessment Conditions, students attending Alternative Education and students from Realm country schools. The data for Tertiary is not included in the 'all secondary' data.

The cohort participating in the September assessment is made up of students sitting the CAA for the first time and of students who were re-sitting the assessment due to non-achievement in the June assessment. Not all June students who did not achieve re-sat in September. The percentage of non-achieving June students who re-sat the assessment in September was 57% for Literacy (reading), 60% for Literacy (writing) and 57% for Numeracy.

Table 13 details both the numbers of 're-sit' students and the percentage they make up of the September cohort, showing Literacy (writing) to have the highest proportion of students resitting at 29%.

Table 13: Number of all participating students by Literacy and Numeracy CAA – June, September, and overall 2022

Standard	Provider Type	Students from Realm countries		All participating students (including Realm)				All students overall 2022 (incl Realm)
		June	Sept	June	n= all students	September n= students resitting	% of Sept cohort resitting	
Reading	Sec	234	180	9,346	11,005	1,931	17.5%	18,420
Writing	Sec	235	179	8,822	12,286	3,525	28.7%	17,583
Numeracy	Sec	240	120	13,402	15,505	3,372	21.7%	25,535
Reading	Tertiary	-	-	40	17	0	-	57
Writing	Tertiary	-	-	33	13	0	-	46
Numeracy	Tertiary	-	-	39	21	1	4.7%	59

Students participated in various combinations of standards, and the breakdown of this for the September assessment event is detailed in Table 14 below.

Table 14: Proportion of all students participating in CAA by assessment standard combination type - June and Sept

Combination of Standards	June: Proportion of Participants	September: Proportion of Participants
Reading & Writing	11.0%	14.0%
Reading & Numeracy	4.5%	3.5%
Writing & Numeracy	2.6%	5.3%
Reading, Writing, & Numeracy	38.3%	30.1%
Reading only	3.9%	4.1%
Writing only	2.5%	8.4%
Numeracy only	37.2%	34.5%

The various combinations of assessments that students participated in are similar for the two assessment events, with approximately a third of participating students sitting Numeracy only, and another third (approximately) of students were assessed against all three Standards. More students sat all three assessments in the June event (38.3%) than the September event (30.1%).

5.1.2 Participation by gender and ethnicity

The gender data for participating students shows a relatively even balance of females and males. In both the September assessment event and the overall 2022 data there are slightly more females participating with 52% for Literacy (writing) and 53% for Literacy (reading) and Numeracy.

Table 15 shows the ethnicity distribution for secondary students who participated in the September assessment event and also the overall 2022 distribution, which is both

assessment events combined, excluding the June results for those students re-sitting the assessment. Ethnicity is reported using a total response method²⁴.

Table 15: Secondary Student participation in Literacy (reading) and Literacy (writing) CAAs by ethnicity - September and overall 2022

Ethnicity	Literacy (reading)		Literacy (writing)		Numeracy	
	Sept	Overall 2022	Sept	Overall 2022	Sept	Overall 2022
Māori	2,463	3,834	2,597	3,543	3,423	5,219
Pacific Peoples ²⁵	1,362	2,328	1,385	2,243	1,811	2,931
Asian ²⁶	1,534	2,807	1,727	2,723	2,192	3,915
MELAA ²⁷	251	434	304	421	393	600
European	7,448	12,230	8,525	11,736	10,688	17,535

5.1.3 Participation by decile

Table 16 and 17 presents the breakdown of secondary students who participated in the Literacy and Numeracy assessments by the decile of the school they attend. Numbers and percentages are used to show what proportion of participating students attend schools of each decile. This data is for overall 2022, which is both assessment events combined, excluding the June results for those students re-sitting the assessment.

Note that caution should be used in analysing student data by decile groupings, the very recent changes in the decile system²⁸ aims to better represent the nuances in measuring socio-economic disadvantage.

Table 16: Secondary student participation in Literacy (reading) and Literacy (writing) CAAs by decile - September and overall 2022

Decile	Literacy (reading)				Literacy (writing)			
	Sept (n)	Sept (%)	Overall 2022 (n)	Overall 2022 (%)	Sept (n)	Sept %	Overall 2022 (n)	Overall 2022 (%)
1	180	1.7%	341	1.9%	154	1.3%	282	1.6%
2	218	2.0%	573	3.2%	233	1.9%	544	3.1%
3	1,072	9.9%	1,354	7.5%	1,037	8.6%	1,314	7.6%
4	1,224	11.4%	2,483	13.7%	1,435	11.9%	2,323	13.5%
5	974	9.0%	1,337	7.4%	975	8.1%	1,136	6.6%

²⁴ Total response ethnicity counts a student in all ethnic groups they identify with. Enrolment forms for schools, Student Management Systems used by the education sector, MoE and NZQA information systems allow students to identify with up to three ethnic groups.

²⁵ Both the terms 'Pacific Peoples' and Pasifika are used in this report as a collective term to refer to students who identify themselves with the islands and /or cultures of Samoa, Cook Islands, Tonga, Niue, Tokelau, Fiji, Solomon Islands, Tuvalu and other Pasifika or mixed heritages. Pacific peoples are not homogenous, hence the use of 'peoples' rather than 'people'. The terminology includes those peoples who have been born in New Zealand or overseas.

²⁶ Asian ethnicity in New Zealand can be categorised into: Chinese, Indian, and other Asian.

²⁷ MELAA = Middle Eastern, Latin American, African students

²⁸ January 2023 saw a transition from deciles to an Equity Index

Decile	Literacy (reading)				Literacy (writing)			
	Sept		Overall 2022		Sept		Overall 2022	
	(n)	(%)	(n)	(%)	(n)	%	(n)	(%)
6	1,989	18.4%	3,190	17.6%	2,285	18.9%	3,071	17.8%
7	1,153	10.7%	2,548	14.1%	1,477	12.2%	2,498	14.5%
8	1,519	14.1%	2,752	15.2%	1,937	16.0%	2,738	15.8%
9	1,337	12.4%	1,831	10.1%	1,331	11.0%	1,738	10.1%
10	1,115	10.3%	1,679	9.3%	1,207	10.0%	1,627	9.4%
TOTAL	10,781		18,088		12,071		17,271	

Table 17: Secondary student participation in Numeracy CAA by decile - September and overall 2022

Decile	Numeracy			
	Sept		Overall 2022	
	(n)	%	(n)	(%)
1	161	1.1%	322	1.3%
2	168	1.1%	471	1.9%
3	1,292	8.4%	1,743	6.9%
4	1,926	12.6%	3,442	13.7%
5	1,117	7.3%	2,188	8.7%
6	2,861	18.7%	4,054	16.1%
7	1,930	12.6%	3,876	15.4%
8	2,141	14.0%	3,645	14.5%
9	2,230	14.5%	3,076	12.2%
10	1,506	9.8%	2,396	9.5%
TOTAL	15,332		25,213	

The data shows that for all Standards participation is not evenly distributed across the decile groupings. Deciles 1 and 2 and 3 are under-represented in all the assessments, while deciles 6, 7, 8 and 9 are over-represented in some of the assessments.

5.1.4 Participation by year level

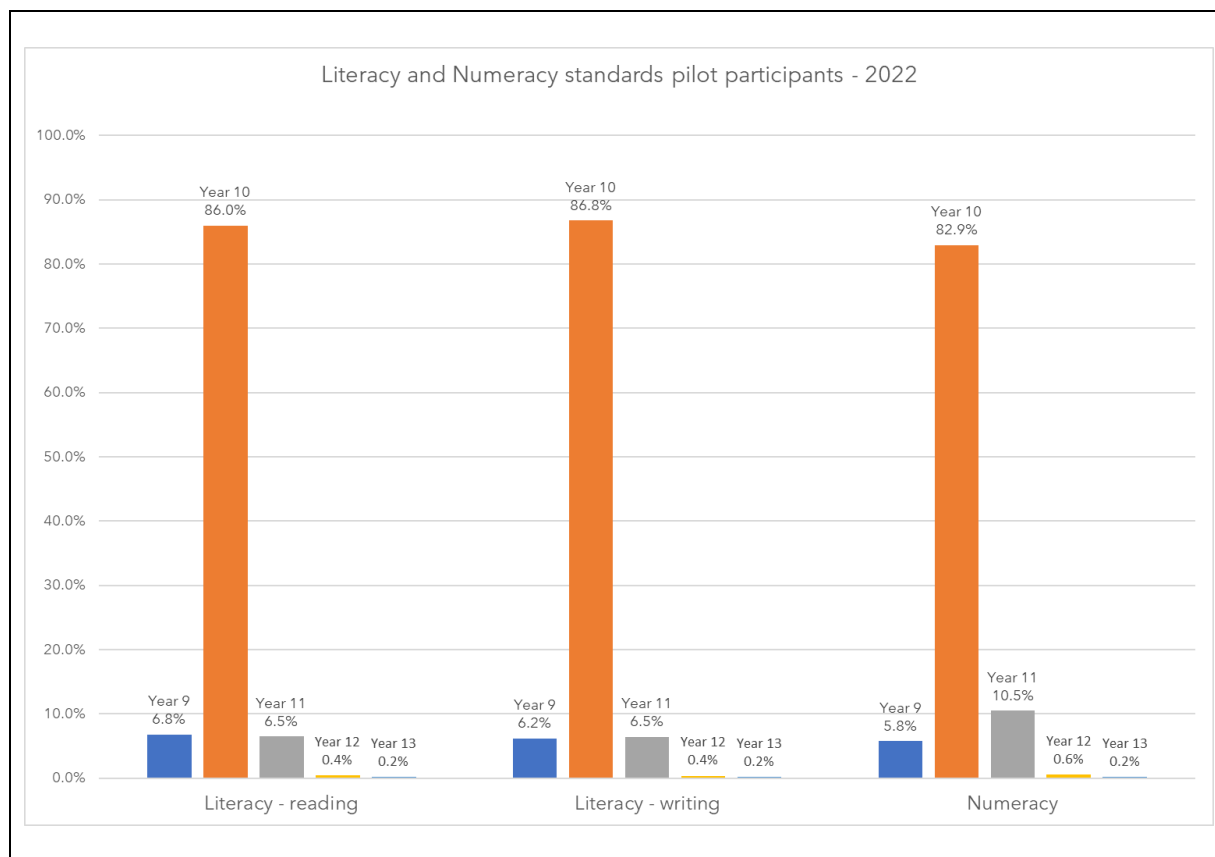
Students from Year 9 through to Year 13 participated in the Literacy and Numeracy assessments. Table 18 below details for each unit standard, the overall 2022 numbers of students participating from each year level and also the percentage each year group made up of the total cohort. The table is followed by a graph showing the percentage breakdown of year level for each standard.

Table 18: Participation in Literacy and Numeracy CAAs by year level and standard for secondary students - overall 2022

Year Level	Literacy (reading)		Literacy (writing)		Numeracy	
	(n)	% of total	(n)	% of total	(n)	% of total
Year 9	1,259	7.9%	1,087	6.2%	1,472	5.8%
Year 10	15,847	86.0%	15,268	86.7%	21,188	82.9%
Year 11	1,197	6.5%	1,135	6.5%	2,682	10.5%
Year 12	79	0.4%	69	0.4%	152	0.6%
Year 13	44	0.2%	35	0.2%	52	0.2%

Year Level	Literacy (reading)		Literacy (writing)		Numeracy	
	(n)	% of total	(n)	% of total	(n)	% of total
TOTAL	18,426		17,594		25,546	

Chart 3: Percentage of secondary students by year level participating in the Literacy and Numeracy CAA - overall 2022



The chart clearly shows that most students participating in all three assessments are in Year 10. There is a small variation in the Numeracy cohort with the proportion of Year 10 students being slightly less and Year 11 students being slightly more than the proportions shown for the Literacy standards.

The pilot schools and organisations described the various combinations of student year groups they entered into the three Literacy and Numeracy CAAs in the end-of-year survey. The table below shows the various year level combinations that were chosen by schools, with the majority of schools (58%) entering only Year 10 students.

Table 19: Year level of students participating in the September Literacy/Numeracy CAAs

Combination of year levels	Number of schools/organisations (n=183 ²⁹)
<i>Secondary Schools</i>	
Year 10	107
Year 10, Year 11	28
Year 9, Year 10, Year 11	8
Year 9, Year 10	6
Year 11	6

²⁹ Note that 11 schools submitted two surveys for one subject area and so this data excludes the second survey submitted to avoid duplication.

Combination of year levels	Number of schools/ organisations (n=183 ²⁹)
Year 9, Year 10, Year 11, Year 12	4
Year 9	3
Year 9, Year 10, Teen Parents age 13-21	3
Year 10, Year 11, Year 12	3
Year 10, Year 11, Year 12, Year 13	3
Year 10 Year 12	3
<i>Tertiary/Alternative Education/Te Kura</i>	
Year 9, Connected Learning Centre	1
Year 9, Year 10, Adults – Corrections ³⁰	1
Year 9, Year 10, Year 11, Year 12, Year 13	1
No student eligible ³¹	1
16-19 year olds	1
Any student who didn't have level 1	1
NCEA Level 1/2 learners -- 16 years old	1
No response	1

Summary of Participation in the June and September assessment events

	June Event	September Event
Number of students (in 1 or more CAA)	16,368	21,376
% of students in Year 10	82%	82%
Number of secondary schools	138	170
Number of tertiary providers	4	4

5.2 Readiness of participating students indicated by e-asTTle scores

This section looks more closely at the subgroup of students who had recent and available e-asTTle³² scores for Reading, Writing, and Mathematics to understand to what extent the pilot cohort fits the recommended criteria for being 'ready' to undertake assessment against a Literacy and Numeracy Standard. The e-asTTle data for participating students is also analysed in relation to the results data for different standards, the school decile and for the different ethnicity groupings.

³⁰ One of the pilot schools was Te Kura who provides education to young people from a wide range of circumstances and included in this pilot were 18- and 19-year-olds in a prison-based youth unit.

³¹ One of the pilot schools was a specialist school providing education to young people in youth justice and care and protection residences. For both assessment events they reported that there were not any students who were 'ready' to sit the CAA.

³² This analysis uses e-asTTle data because it is data held by the Ministry and supplied to NZQA for this analysis. Other assessment tools are also used by schools to determine readiness but this data is not accessible. e-asTTle provides an indication of the level of the curriculum students are working at for reading, writing, mathematics.

The recommendation to pilot schools was that the minimum level of readiness for students to undertake a Literacy and Numeracy assessment was late Level 4/ early Level 5 of the New Zealand Curriculum (NZC). Schools were also recommended a number of tools for assessing readiness and for the e-asTTle tool Level 4A was recommended as the minimum indicator for student readiness. Based on this guidance, in this report e-asTTle scores 4A and above are used to describe students who are 'at and above' the recommended level. Students with scores below 4A are seen to be below the recommended level.

Note regarding the use of e-asTTle

The analysis of e-asTTle data provides useful insights that support this evaluation. Research published by the Ministry of Education on the e-asTTle tool states there is substantial evidence that e-asTTle scores are valid and reliable (Webber, 2020). However, caution should still be applied as it cannot be assumed that in all cases the e-asTTle score is a full and accurate measure of the curriculum level. This is due to:

- the range of ways it can be administered by schools, particularly for Writing which is teacher marked.
- the e-asTTle assessments do not necessarily map exactly to the requirements of the unit standards, as reflected in the Literacy and Numeracy assessments.

The percentage of students with valid e-asTTle scores are detailed in the table below. The definition of a valid e-asTTle score was determined by NZQA and states that the score must be either (1) recent (Jan 2022 or later) or (2) if a score is not recent it must be above the sub-level score 4A.

Table 20: Percentage of secondary students with usable e-asTTle scores

Standard	June: students with usable e-asTTle scores		September: students with usable e-asTTle scores	
	(n)	(%)	(n)	(%)
Reading	6,340	67.6%	6,971	63.0%
Writing	2,270	25.6%	2,870	23.3%
Numeracy	7,769	58.8%	7,778	50.0%

These numbers are statistically representative of the wider cohort of participating students³³ however there was no usable e-asTTle data from students in Realm country schools.

5.2.1 Pilot cohort e-asTTle scores by assessment event and standard

This analysis of e-asTTle scores aims to help with understanding differences between the readiness levels of students participating in the different standards and also the relative abilities of the June and September cohorts.

Table 21 below summarises the numbers and percentages of secondary students for both assessment events individually and the overall 2022 cohort showing the proportions of students who were below or at/above the recommended e-asTTle level for each standard.

³³ 98% confidence level 2% margin of error.

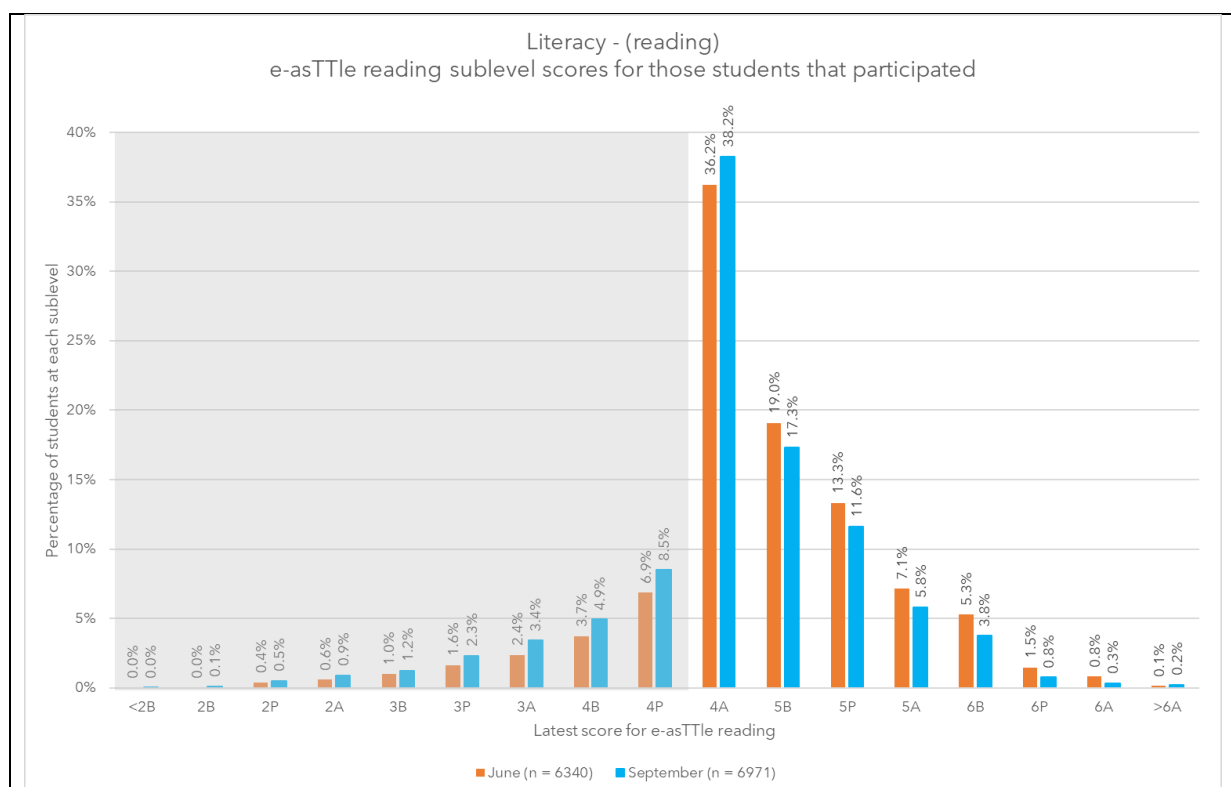
Table 21: Percentage of participating secondary students with e-asTTle scores below or at/above the recommended level - June, September and overall 2022

Standard	June		September		Overall 2022	
	below 4A	at /above 4A	below 4A	at/above 4A	below 4A	at/above 4A
Reading	16.6%	83.3%	21.8%	79.7%	18.1%	81.9%
Writing	26.5%	73.5%	20.3%	79.3%	20.7%	79.3%
Numeracy	21.2%	78.9%	26.2%	73.9%	21.0%	79.0%

The three charts that follow show a more detailed breakdown of the spread of e-asTTle scores by Standard, comparing the September cohort of students with the June cohort (for those students with valid³⁴ e-asTTle scores). For each chart the students below the recommended curriculum level (e-asTTle sublevel 4A) are shaded grey.

Note that the criteria for a valid score means that e-asTTle scores below 4A will be recent (within 12 months) but scores above 4A may or may not be recent. The assumption is that that these students will be at that curriculum level or higher.

Chart 4: Comparison of e-asTTle Reading sublevel scores for students who participated in the Literacy (reading) CAA - June and September

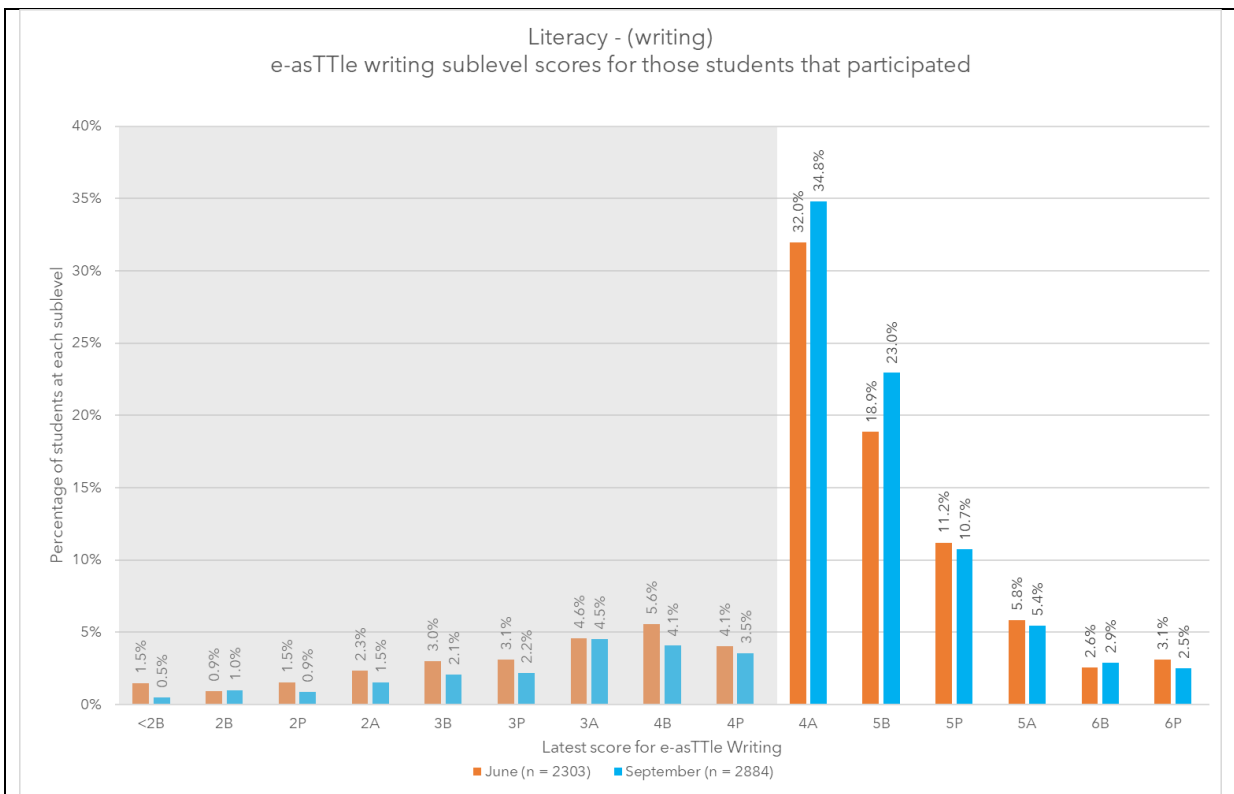


In Literacy (reading) the September cohort had 21.8% of students below the recommended curriculum level, students at the recommended level (4A/5B) made up 55.5% of the group, and 24.2% were above 5B.

By comparison, the June cohort had fewer (16.6%) students below the recommended minimum level (4A), a similar proportion (55.2%) at 4A/5B, and more (28.1%) above 5B.

³⁴ A valid e-asTTle score must be either (1) recent (Jan 2022 or later) or (2) if a score is not recent it must be above the sub-level score 4A.

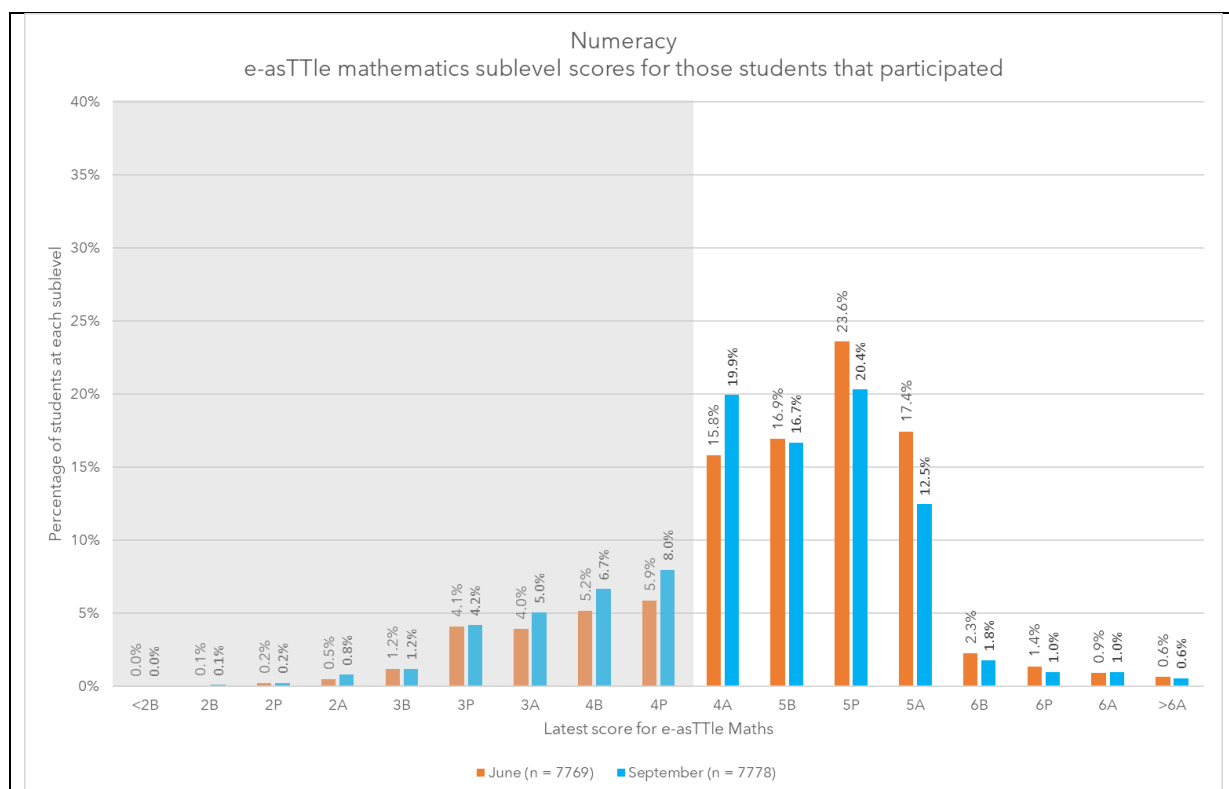
Chart 5: Comparison of e-asTTle Writing sublevel scores for students who participated in the Literacy (writing) CAA – June and September



In Literacy (writing) the September cohort had 20.3% of students below the recommended curriculum level. Students at the recommended level (4A/5B) made up 57.8% of the group, and 21.5% were above 5B.

By comparison, the June cohort had more students (26.5%) below the recommended minimum level (4A), fewer students (50.9%) at 4A/5B, and slightly more students (22.6%) above 5B.

Chart 6: Comparison of e-asTTle Maths sublevel scores for students who participated in the Numeracy CAA - June and September



In Numeracy the September cohort had 26.2% of students below the recommended curriculum level, students at the recommended level (4A/5B) made up 36.6% of the group, and 37.3% were above 5B.

By comparison, the June cohort had fewer students (21.2%) below the recommended minimum level (4A), fewer students (32.7%) at 4A/5B, and more students (46.2%) above 5B.

In summary, this analysis aimed to understand the extent to which the pilot cohort aligns with the recommended participation criteria across all three standards and for both assessment events. The key findings are:

- Across the three standards and the two events, between 17% and 27% of all secondary students (with usable e-asTTle scores) were below the recommended minimum curriculum level for participation.
- Compared to the June cohort, September had slightly fewer students below the recommended level for Literacy (reading) but a greater proportion of students below the recommended level in Literacy (writing) and Numeracy.

Later in this section the issues that may have influenced the adherence to the readiness criteria are explored further as the various selection processes and approaches for determining readiness used by the pilot schools are discussed.

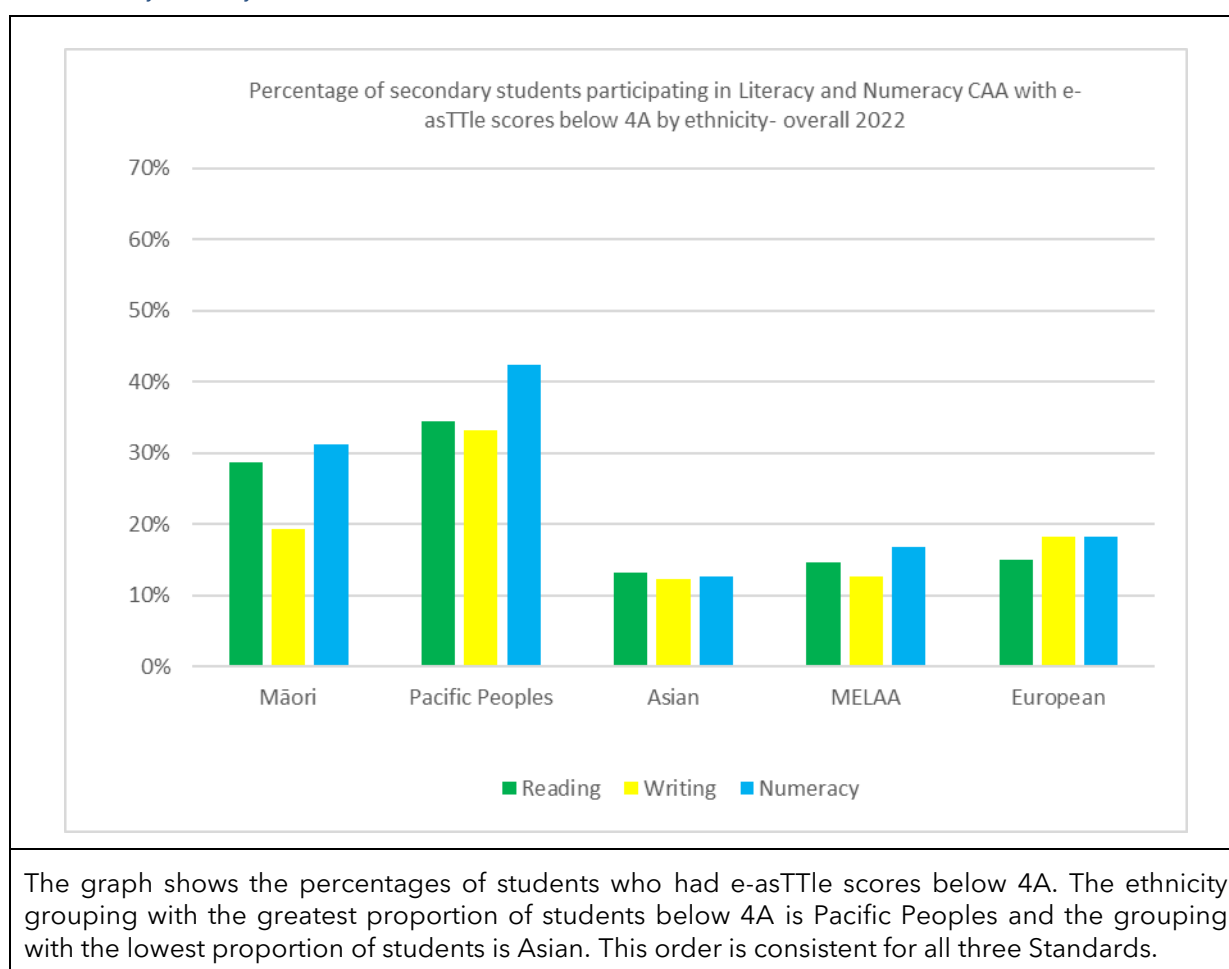
5.2.2 Pilot cohort e-asTTle scores by ethnicity

Table 22 provides information about the distribution of e-asTTle scores across ethnicity groupings. The percentages show the proportion of students either below or 'at/above' the minimum recommended readiness level of 4A. Chart 7 below presents a comparison between the ethnicity groups for the percentage of students who had e-asTTle scores below 4A.

Table 22: Comparison by ethnicity of e-asTTle scores above 4A compared with below 4A for students participating in the Literacy and Numeracy CAA - overall 2022

Ethnicity	Literacy (reading)				Literacy (writing)				Numeracy			
	Below 4A (n)	At/above 4A (%)	At/above 4A (n)	Below 4A (%)	Below 4A (n)	At/above 4A (%)	At/above 4A (n)	Below 4A (%)	Below 4A (n)	At/above 4A (%)	At/above 4A (n)	Below 4A (%)
Māori	674	28.6%	1,684	71.4%	139	19.3%	583	80.7%	507	31.2%	1119	68.8%
Pacific Peoples	414	34.4%	791	65.6%	141	33.2%	283	66.8%	574	42.4%	781	57.6%
Asian	253	13.2%	1,670	86.8%	95	12.3%	675	87.7%	304	12.6%	2104	87.4%
MELAA	39	14.7%	226	85.3%	13	12.6%	90	87.4%	47	16.7%	234	83.3%
European	1305	15.0%	7,399	85.0%	568	18.3%	2,540	81.7%	1767	18.2%	7,963	81.8%

Chart 7: Percentage of secondary students participating in Literacy and Numeracy CAA with e-asTTle scores below 4A by ethnicity - overall 2022



The differences shown between the five ethnicity groupings in the proportion of students who are below the minimum recommended readiness level provide a picture of the variability in the levels of cohort readiness. Noting these differences in cohort readiness is important to understanding the analysis of assessment achievement results by ethnicity in Section 6.2.3.

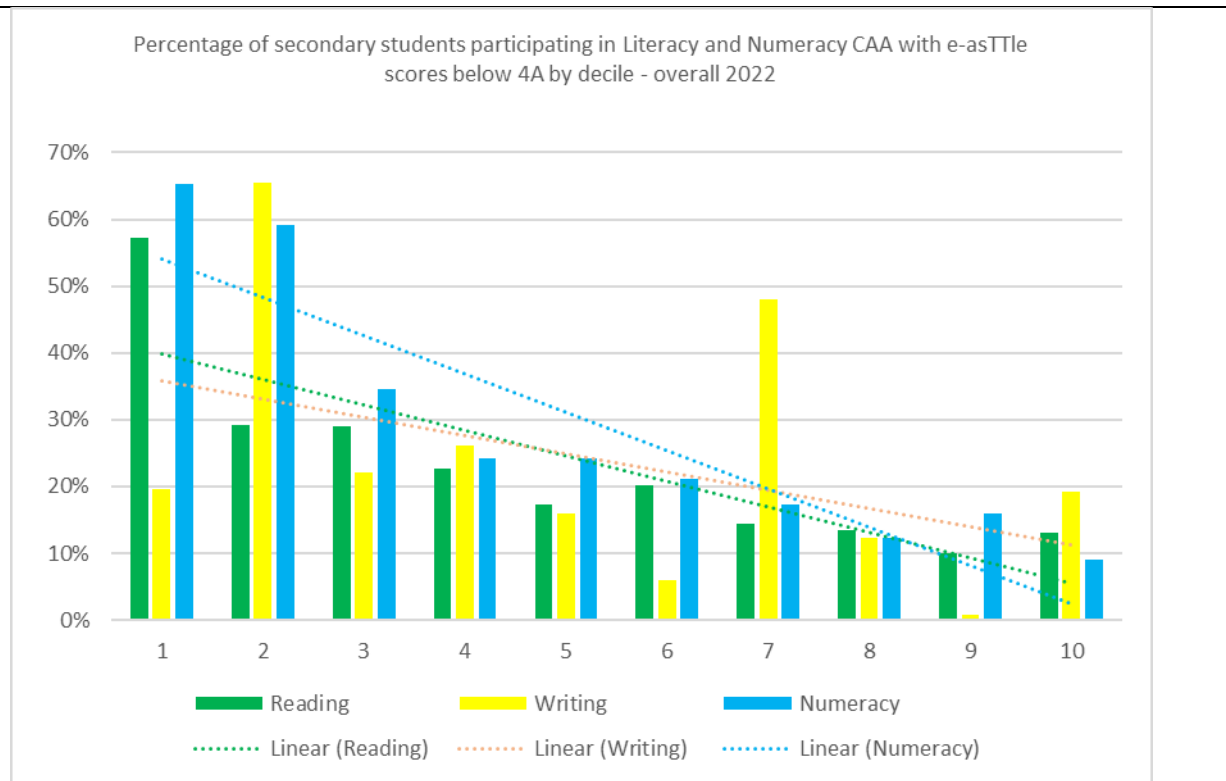
5.2.3 Pilot cohort e-asTTle scores by decile

Table 23 provides information about the distribution of e-asTTle scores across decile groupings seeking to understand any differences in the readiness levels and the relative abilities of students. Each decile cohort is separated into the proportion of students who were either below or 'at/above' the minimum recommended readiness level of 4A. Chart 8 presents a comparison between the school deciles of the percentage of students who had e-asTTle scores below 4A.

Table 23: Comparison by decile of e-asTTle scores below 4A compared with at/above 4A for students participating in the Literacy and Numeracy CAA - overall 2022

Decile	Literacy (reading)				Literacy (writing)				Numeracy			
	Below 4A		At/above 4A		Below 4A		At/above 4A		Below 4A		At/above 4A	
	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)	(n)	(%)
1	120	57.1%	90	42.9%	9	19.6%	37	80.4%	143	65.3%	76	34.7%
2	98	29.3%	237	70.7%	174	65.4%	92	34.6%	218	59.1%	151	40.9%
3	255	29.0%	624	71.0%	72	22.1%	254	77.9%	366	34.5%	695	65.5%
4	377	22.6%	1288	77.4%	172	26.1%	486	73.9%	504	24.2%	1576	75.8%
5	157	17.3%	750	82.7%	34	16.0%	179	84.0%	297	24.3%	926	75.7%
6	468	20.1%	1858	79.9%	47	6.0%	741	94.0%	472	21.1%	1765	78.9%
7	255	14.3%	1523	85.7%	247	48.1%	267	51.9%	287	17.2%	1377	82.8%
8	203	13.4%	1313	86.6%	71	12.4%	502	87.6%	216	12.2%	1552	87.8%
9	144	10.0%	1293	90.0%	5	0.9%	578	99.1%	335	15.9%	1774	84.1%
10	182	13.1%	1211	86.9%	90	19.1%	380	80.9%	116	9.0%	1179	91.0%

Chart 8: Percentage of secondary students participating in Literacy and Numeracy CAA with e-asTTle scores below 4A by decile - overall 2022



The chart shows the distribution of students who were not at the recommended curriculum level by decile. While there is some variability, for each of the CAA the overall trendline shows that low decile schools had a greater proportion of students participating in the CAA who had e-asTTle scores below 4A than high decile schools. There seems to be greater variability in the Writing e-asTTle scores. It is important to note the lower number of available/valid e-asTTle scores for students participating in the writing CAA. For all three CAA the numbers of students participating from decile 1 and 2 schools is also comparatively lower than the decile 3 to 10 schools.

Summary: Readiness of participating students (as indicated by e-asTTle levels)

This section has examined available e-asTTle data for the secondary students who participated in the Literacy and Numeracy Standards, revealing the following findings about the readiness of the overall secondary cohort and also more specifically for groupings of students by decile and ethnicity (note that students with valid e-asTTle scores make up only 68% of the Literacy (reading), 26% of the Literacy (writing), and 59% of the Numeracy cohorts).

- In both assessment events and for all three Standards, between 17% and 27% of the sub-set of the cohort of students with valid e-asTTle scores were working below the recommended curriculum level. Between 22% and 46% of students were working above the recommended curriculum level.
- The proportions of students who are below, at, or above the readiness level vary across the five ethnicity groupings. The cohort showing the highest levels of readiness is students who identify as Asian, followed by European, closely followed by MELAA, and then Māori and Pacific Peoples. This order is consistent for all three standards.
- Lower decile schools had a greater proportion of students who were not at the recommended readiness level than higher decile schools. This was particularly true for the Literacy (reading) and Numeracy standards.
- Higher decile schools had a greater proportion of students participating who were above the recommended curriculum level. This was particularly true for the Literacy (reading) and Numeracy standards.

This variability with regard to student readiness and relative abilities of different cohorts between assessment events, standards, deciles, and also between ethnicities has implications for interpreting and understanding the differences in rates of achievement.

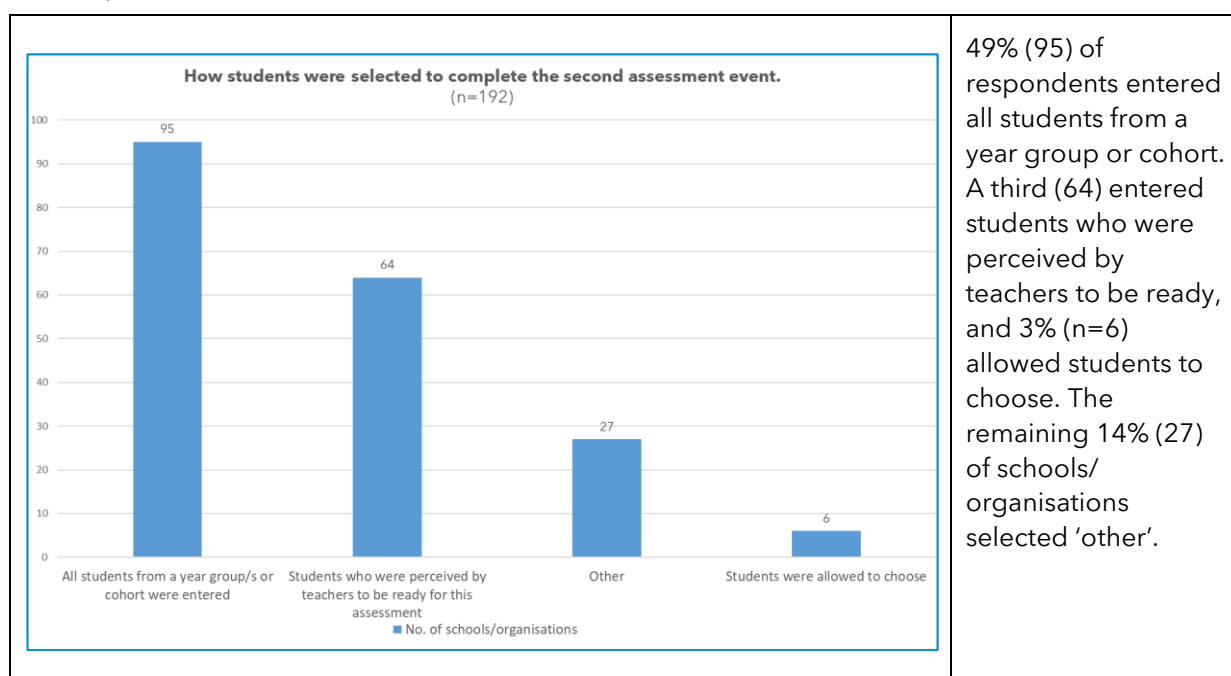
5.3 How were students selected to sit the Literacy/Numeracy CAA?

While pilot schools and organisations were given guidance³⁵ about which students should be selected to participate in the assessment activities for Literacy and Numeracy, this guidance has been applied in different ways. The first part of this section draws on data from the end-of-year teacher survey³⁶ to describe the different approaches that the pilot schools and organisations used for selecting students. The second part describes the approaches used by schools for determining student readiness, and the third part reports teachers' perceptions of student readiness.

5.3.1 Approaches for selecting students

In the end-of-year survey teachers were asked to choose one option (out of four) that best describes how students were selected to complete the second assessment event. The distribution of responses is shown below in Chart 9.

Chart 9: Approach used by schools/organisations to select students to participate in the Literacy/Numeracy CAA - September



Teachers were also given the option to provide further explanation about the process if they wished. Although not every school/organisation commented on their specific selection process, 102 out of 192 (53%) respondents provided a response. A range of explanations were given, suggesting that selection processes used by

³⁵ The recommendation to pilot schools was that the readiness level for students to undertake the Literacy and Numeracy Standards was late Level 4 / early Level 5 of the NZ Curriculum. Schools were also recommended a number of tools for assessing readiness and for the e-asTTle tool Level 4a was recommended as the minimum indicator for student readiness.

³⁶ There were 192 respondents to the pilot teacher end-of-year survey (71% response rate). Questions in the survey were not compulsory so the number of responses for each question is noted when the question is reported.

schools/organisations were flexible and complex, reflecting the specific context, stage and beliefs of the individuals leading the changes in their context.

The options selected by teachers in Chart 9 appear to represent the main approaches used by each organisation. Teachers could only select one of the options, however, in the comments providing an explanation 51% described using one or more of the approaches for selecting students. The main themes regarding the selection approaches described are described below:

- One criteria was given by 25% (n=26) of respondents to this question to explain their student selection approach. In addition to the approaches shown in Chart 9, other approaches included: students who were absent for the June assessment, or they had not achieved the CAA in the June assessment. As one school explained: *"For the second assessment we gave the students who failed the first, the option to have a second go. Not all sat the second assessment."*
- Two criteria were given by 41% (n=42). Most of these selected 'all students from a year group or cohort' (as illustrated in Chart 9) and additionally allowed some students from other year levels to participate in the second assessment event, using different selection criteria. Thirteen responses described student choice as one of the criteria for selection. One school described the two aspects to their selection process. *"Year 10 were chosen based on e-asTTle literacy results. Year 11 students were allowed to choose."* In another example the school explained; *"Anyone who failed or didn't sit opportunity one was entered from Y10 and Y11. Y12s who' didn't have numeracy yet were also entered. It was their choice."*
- Three criteria were used by 10% (n=10). This was explained by one school:
We used a combination of all three. All Y10 and 11 were entered and those who did not pass the first attempt could sit again. Teachers also identified which students would benefit from sitting it again and encouraged those students to try again. Some Y9 students, identified by their teachers as working at Level 5 was also given the opportunity to sit the CAA.

Drivers for selection approach

- *Internal learning:* Some schools described using the pilot as an opportunity for them to better understand the accuracy of their own internal assessment processes and to understand the new assessments. One school said that this was done *"in the hope it would give us a better gauge of where we are."* While another school who entered their entire cohort explained that assessing all would *"give us a good picture for our school against the new standard."* These views were also reported in the mid-year survey and imply that post-pilot their student selection processes, and approach may change.
- *Logistics:* One school was more pragmatic in their reasons for selecting only two classes from their cohort as they *'were limited by the number of computer pods we could use and wanted to manage the log-in process...without problems associated with personal devices.'* This contrasts with another school who entered all students as they thought they did not have enough data to select students *"due to poor attendance and covid related absences."*

- *Inclusion:* Amongst the explanations provided by teachers about student selection a potential issue was raised regarding the recommended process. This was around inclusiveness - selecting students to participate in the Literacy/Numeracy CAA based on curriculum level seems to be at odds with a current push within the education sector for schools to move away from academic streaming.

We also felt being asked as teachers/as a school to be selective about who is and isn't able to enter the co-requisites puts us in a very precarious position politically - in terms of parents and the community who might feel put out by this, and it is another way of schools labelling students. By entering the whole cohort, we were able to create a culture that "everyone is in it together" and giving it a go.

A small number of other schools agreed with the need for inclusiveness and highlighted issues of maintaining equity. One school asked the question: "How can we as teachers deny some students the opportunity to gain numeracy?"

More schools and organisations than at mid-year illustrated their support for a more inclusive approach to student selection by 'offering' students the opportunity to sit the assessments. One school explained their reasoning for this approach:

We let students choose, but with strong emphasis on Year 10 Students who were 4P or above and Year 9 Students who were 4P or above. Others could choose, but teachers did say that we don't think you're quite at the right level, so it's more of a learning experience and getting used to the exam situation.

It is also worth noting that some schools and organisations reported differences in who was selected to participate in the CAA and those students who participated. For example, schools often entered all their Year 10 cohort, but some students did not sit the assessment because of absenteeism, stress, lack of teacher aides in the case of students requiring learning support, and students choosing to withdraw.

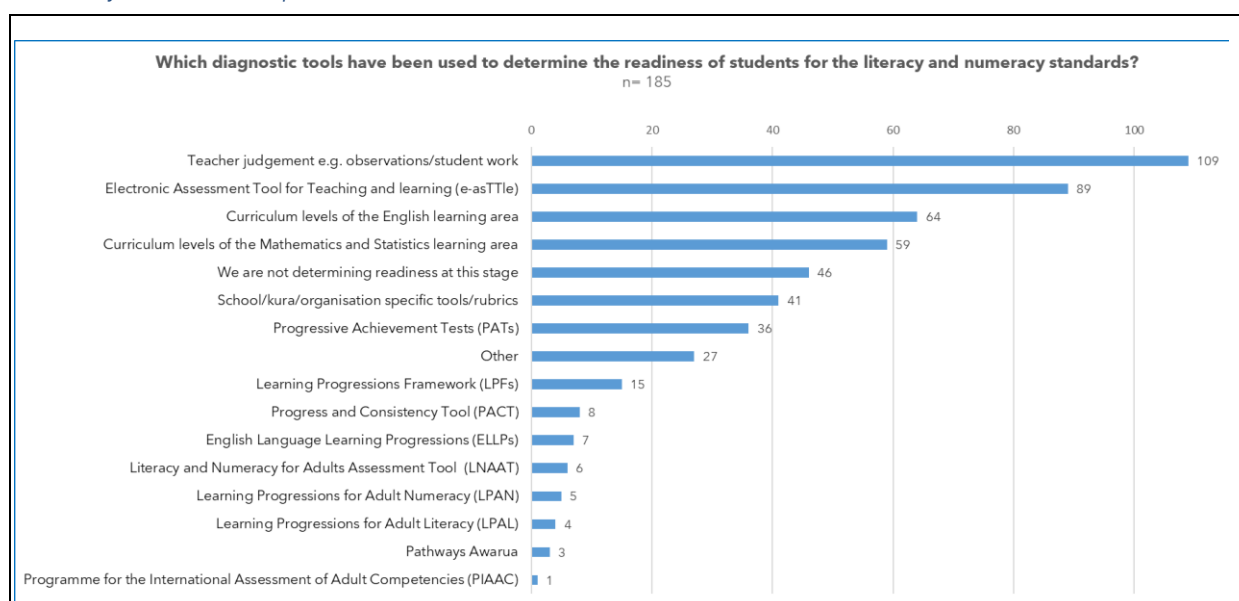
In conclusion, school selection processes are complex and idiosyncratic. There was considerable variability in the selection choices made by schools. Most schools and organisations applied different selection criteria depending on the year level of the students. Different views about the purpose of the pilot at a school level, and different perspectives on inclusion and wider school community expectations also influenced selection decision making. It is important to note that selection processes will have an impact on attainment. This issue is illustrated and further discussed as part of the analysis of achievement data in Section three of the report.

5.3.2 Approaches for determining student readiness

Pilot schools and organisations were advised by the Ministry of Education to enter students for the assessment only when they are working at or above the upper Level four of the curriculum. This guidance implies that schools understand curriculum levels and /or will use specific diagnostic methods or tools to determine the readiness of students for sitting the Literacy and Numeracy CAAs.

In the end-of-year survey teachers were provided with a list of diagnostic tools³⁷ and asked to indicate the tool(s) they had used. Also included in the list were the options of 'teacher judgement', 'we are not determining readiness at this stage', and 'other'. The frequency count for each option in the list is shown in Chart 10 below. This question was answered by 185 schools and organisations, with multiple responses given by most participants: a total of 520 responses in all. In both the end-of-year and mid-year surveys the proportion of schools/organisations using the various tools to help identify student readiness were very similar. This is not surprising given the short time span between the two assessment events and subsequent surveys. Participants had also not seen the results of their students' CAAs and were unable to fully assess whether the individual diagnostic tool had given them meaningful feedback or accurate results.

Chart 10: Diagnostic tools used by schools/organisations to determine student readiness for the Literacy and Numeracy Standards - September



The readiness indicator most frequently selected by respondents (n=109, 21%) was 'teacher observation through observations and student work'. Only 5 of these respondents had teacher observation as their only indicator.

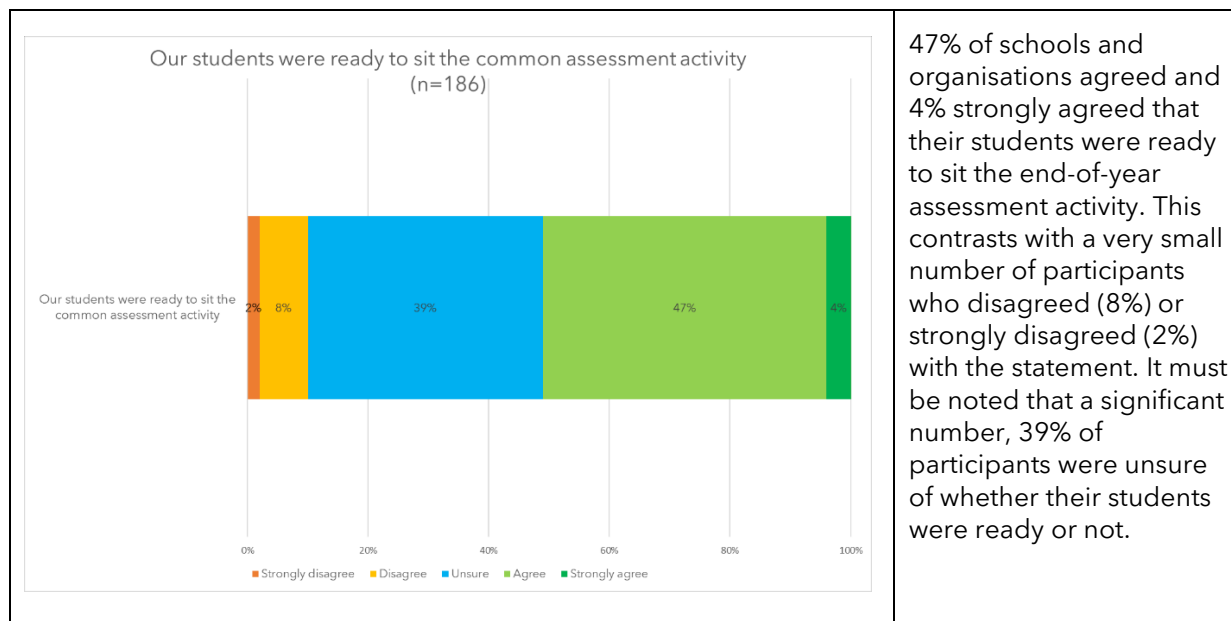
The second largest response was from 89 (17%) participants who used e-asTTle as a diagnostic tool. Almost equal numbers of pilot participants used the Curriculum levels of the English learning area (n=64, 12%) and the Curriculum levels of the Mathematical and Statistics learning area (n=59, 11%), to determine readiness. Forty-six respondents (9%) said that they were not determining readiness at this stage.

³⁷ These 14 different tools and benchmarks were published in two official NCEA documents: *Unpacking Literacy 2022, Final version* and *Unpacking Numeracy 2022, Final version*. These documents are part of the supporting materials for the NCEA Literacy and Numeracy standards available on the NCEA website.

5.3.3 Teacher perceptions of student readiness

In the end-of-year survey teachers rated the extent to which they agreed with the statement: 'our students were ready to sit the common assessment activity, using a five-point scale. There were 186 schools/organisations that rated this statement.

Chart 11: Agreement rating for 'our students were ready to sit the common assessment activity'



Factors creating uncertainty about student readiness to participate in the end-of year assessment activities were highlighted in a survey question about the student selection processes of schools and organisations. The following factors were reported in several of the survey responses and may help understand why 39% of participants were unsure about their student readiness and. They include:

- Many schools and organisations entered all their year 10 cohort even if they did not meet the recommended readiness level of upper level 4 /lower level 5 the NZ Curriculum.
- Many schools and organisations entered all students who had not achieved the CAA in the June assessment event regardless of whether they met the readiness levels or not.
- Student results had not been received before the survey question was asked so some schools and organisations could not test the validity of their selection process.
- A small number of participants indicated they were unsure about the reliability of some readiness tools.
- This is a new and a different type of assessment and there is still uncertainty about many aspects of the Literacy/Numeracy changes.
- Tertiary institutions often had a 20-week course with only one, or at best two, assessment opportunities so it is unrealistic to only enter students who are 'ready.'

The uncertainty that some teachers expressed about readiness tools and student levels of readiness may reflect the newness of the Literacy and Numeracy assessments, the 'high stakes nature of these assessments, as well as them being a different type of assessment from the approaches used for achievement standards.

Summary: Student selection processes

Student selection processes for entering students in the Literacy and Numeracy Standards varied depending on the context of their schools and organisations, different perspectives on inclusion, wider school community expectations, and what the school wanted to learn from the pilot.

Key findings from this section were:

- Schools and organisations have not consistently applied the recommended criteria for which students should participate in the CAAs.
- Most schools and organisations selected a whole Year level. Other cohorts selected were those students who had not achieved in the first assessment event. Some of these students were allowed to choose whether they were ready for the second assessment event.
- The selection processes varied depending on the ability and Year level of the students. The most common Year level entered as a whole cohort was Year 10. Year 9 cohorts tended to include only those working at upper level 4 or above of the Curriculum. Students in Year 11, 12 and 13 tended to be entered if they had not yet met the Literacy and Numeracy requirements for the award of an NCEA.
- There was often a difference in who was selected to participate and who participated in the assessments. While a whole Year level may have been entered, not all would participate. There were a variety of reasons including absenteeism, stress, lack of teacher aides for students requiring learning support, student choices, and teachers deciding that students were not ready.
- Most schools and organisations indicated they used 'readiness' indicators or diagnostic tools to support their selection process. Noting that teachers tended to select more than one approach, the most frequently used readiness indicator was teacher observation through class observation and student work. This was followed by e-asTTle.
- Selecting students on 'readiness' created a tension for some schools where 'selecting' students to participate felt at odds with other more inclusive approaches in their school, such as discontinuing academic streaming.

Decisions that schools and organisations make about who participates in the CAAs have implications for the extent to which students are likely to be 'ready' to achieve the assessment.

Recommendations: Student readiness and selection processes

Relevant recommendations from Report One

1. Further understanding of student readiness for the CAAs is required. Many teachers stated they did not understand the student level required, and some schools indicated they used the pilot to understand the level of readiness needed rather than use selection methods such as data from the recommended readiness tools.
2. School, kura, and organisations could benefit from more focused PLD about the curriculum levels of the readiness indicators and the tools that can help them indicate student and ākonga readiness. Webinars and in-school PLD could support teachers' understanding and practice in this area.
3. Further resources and activities set at the CAAs levels of difficulty may also support teacher confidence and understanding of the levels required. This could include marking schedules, exemplars and task activities, and question banks. This will require careful design and messaging so that these are used in ways that support the overall purpose of the standards. To prevent teaching to the test, it would be necessary to identify activities and tasks that could broaden units of work and teaching and learning programmes (versus one-off activities aimed to "teach to the test").
4. Many teachers indicated they would like the return of student papers as it would give them the opportunity to understand the marking of the papers and the standard that students need to reach to pass the exam.

Additional recommendations for Report Two

1. Further understanding regarding some of the tensions schools are facing about their approach to student selection for the CAA will enable clearer framing of the guidance given to schools.
2. Support schools and organisations in the provision of effective messaging communication to their students and school community regarding student selection being based on 'readiness' to participate in the assessments.

Section 6: Student results

This section presents the results for the Literacy and Numeracy Standards. The overall 2022 results are reported and for comparative purposes the September results are compared with the results from the June assessment event.

All secondary student results for Literacy and Numeracy are described first, followed by a more detailed comparison of achievement with e-asTTle scores. The results are then broken down by gender, ethnicity, decile, and year level.

Four different sub-groups within the overall pilot cohort are then looked at. These are English Language Learners (ELL), students who were afforded Special Assessment Conditions (SACs), students from Realm countries, and students from Tertiary³⁸. For each of these sub-groups the achievement results are reported and discussed and some key perspectives and insights, gathered via interviews and focus groups with teachers and other experts working in these specialist areas, are also provided.

Appendix 4 contains a table that summarises the results for all secondary students and also by gender, ethnicity, decile, ELL, students with special assessment conditions, Realm countries and Tertiary.

6.1 Secondary student results for Literacy and Numeracy Unit Standards

The secondary student data discussed in this section is made up of both New Zealand secondary school and Realm secondary school data. The results from students enrolled with Tertiary providers is discussed in Section 6.3.4. The Realm data is also looked at separately in Section 6.3.5.

The achievement results for all secondary students are presented first, then the results for students in the September event who were re-sitting the assessment. This is followed by a comparison of results for all secondary students with results for those students who were 'at and above' the recommended readiness level.

The section ends with a discussion of these secondary student results, looking at the trends across the three standards, the trends between the two assessment events and finally a discussion regarding readiness levels and achievement.

6.1.1 Achievement results for all secondary students

The achievement rates for all secondary students in the June and September assessment events and also for overall 2022 are shown in Table 24. The overall 2022 results are a collation of the achievement data for both assessment events, with the exclusion of the June results for those students who did not achieve and re-sat the assessment in September³⁹. For students who participated in both June and September, only the result

³⁸ The participation and results data for English Language Learners, students with Special Assessment Conditions, and students from Realm country schools is also included in the 'all secondary' student cohort data. The participation and results data for Tertiary and Alternative Education is not included on the 'all secondary' data.

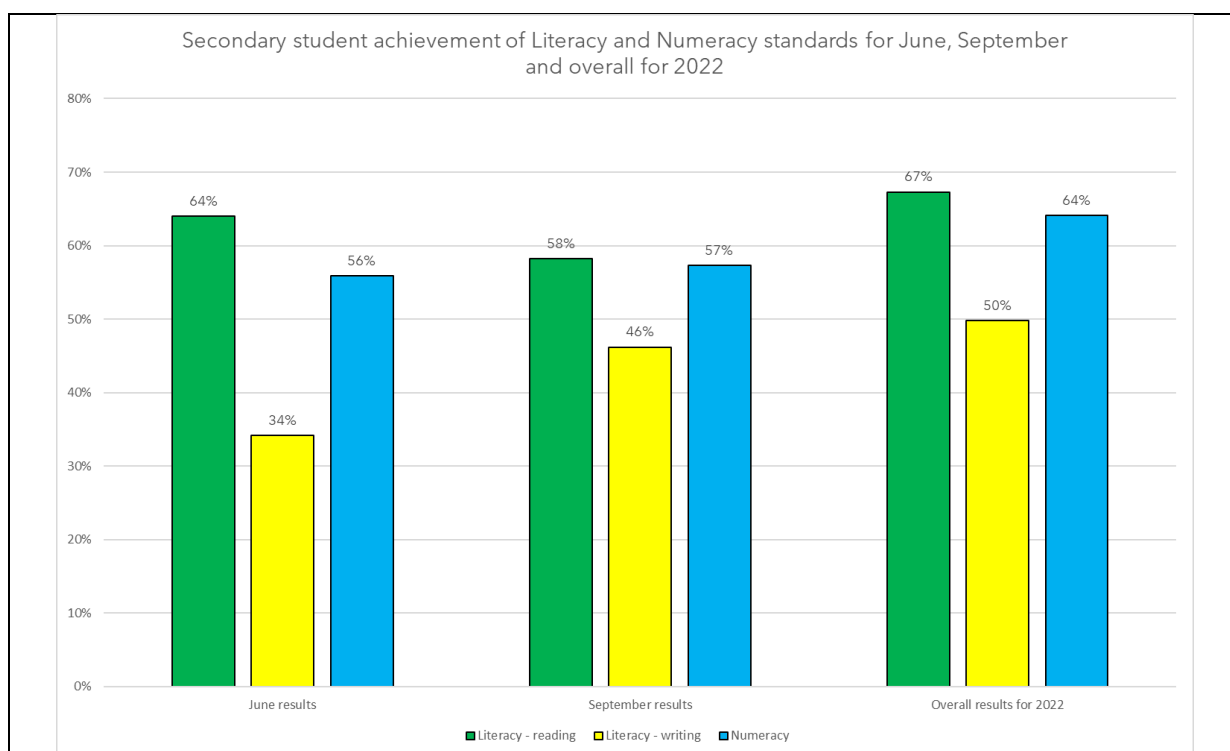
³⁹ The percentage of students who did not achieve in June and re-sat in September is 57% Literacy (reading), 60% Literacy (writing), 57% Numeracy. The percentage of the participating secondary and tertiary students in the September event that re-sat assessments is: 17% Literacy (reading), 29% Literacy (writing), 22% Numeracy.

for their second assessment is counted. This table of data is then presented as a graph in Chart 12.

Table 24: Secondary student achievement for Literacy and Numeracy standards - June, September and overall 2022

Standard	June Results			September Results			Overall 2022 Results		
	All students	Achieved (n)	Achieved (%)	All students	Achieved (n)	Achieved (%)	All students	Achieved (n)	Achieved (%)
Reading	9,386	6,016	64.0%	11,022	6,418	58.2%	18,420	12,388	67.3%
Writing	8,855	3,029	34.2%	12,299	5,688	46.2%	17,583	8,752	49.8%
Numeracy	13,441	7,512	55.9%	15,526	8,899	57.3%	25,535	16,371	64.1%

Chart 12: Secondary student achievement of Literacy and Numeracy standards for June, September, and overall 2022



While there is some variability in the achievement rates between the June and September assessment events, the overall picture of achievement is the same, the highest rate of achievement being for Literacy (reading) assessment, followed closely by Numeracy and then Literacy (writing).

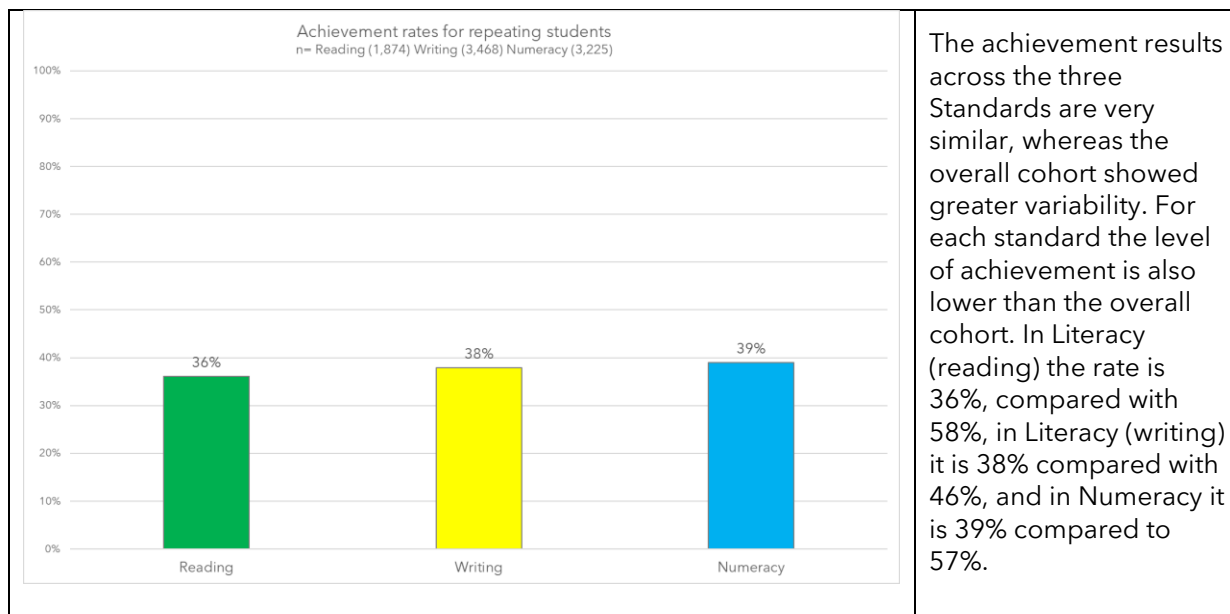
The differences noted between the June and September assessment events are a decrease in achievement for Literacy (reading) from 64% to 58%, and an increase in achievement rates for Literacy (writing), from 34% to 46%.

The achievement rates for the overall 2022 data are higher than both the individual June and September assessment events. This is because repeat students who are successful on their second attempt increase the overall achievement rate as only their second result is recorded in the overall data.

6.1.2 Achievement results for students re-sitting in September

The September cohort includes students who participated for the first time and students who were re-sitting the assessment due to non-achievement in the June assessment. The 're-sitting' students made up 17% of the Literacy (reading), 29% of the Literacy (writing) and 22% of the Numeracy cohort. Chart 13 below shows the achievement rates for these students.

Chart 13: Achievement of Literacy and Numeracy Standards for secondary students who re-sat the Literacy and Numeracy CAA in September



6.1.3 Comparisons of achievement results for students who were below or at/above the recommended curriculum level (using e-asTTle scores)

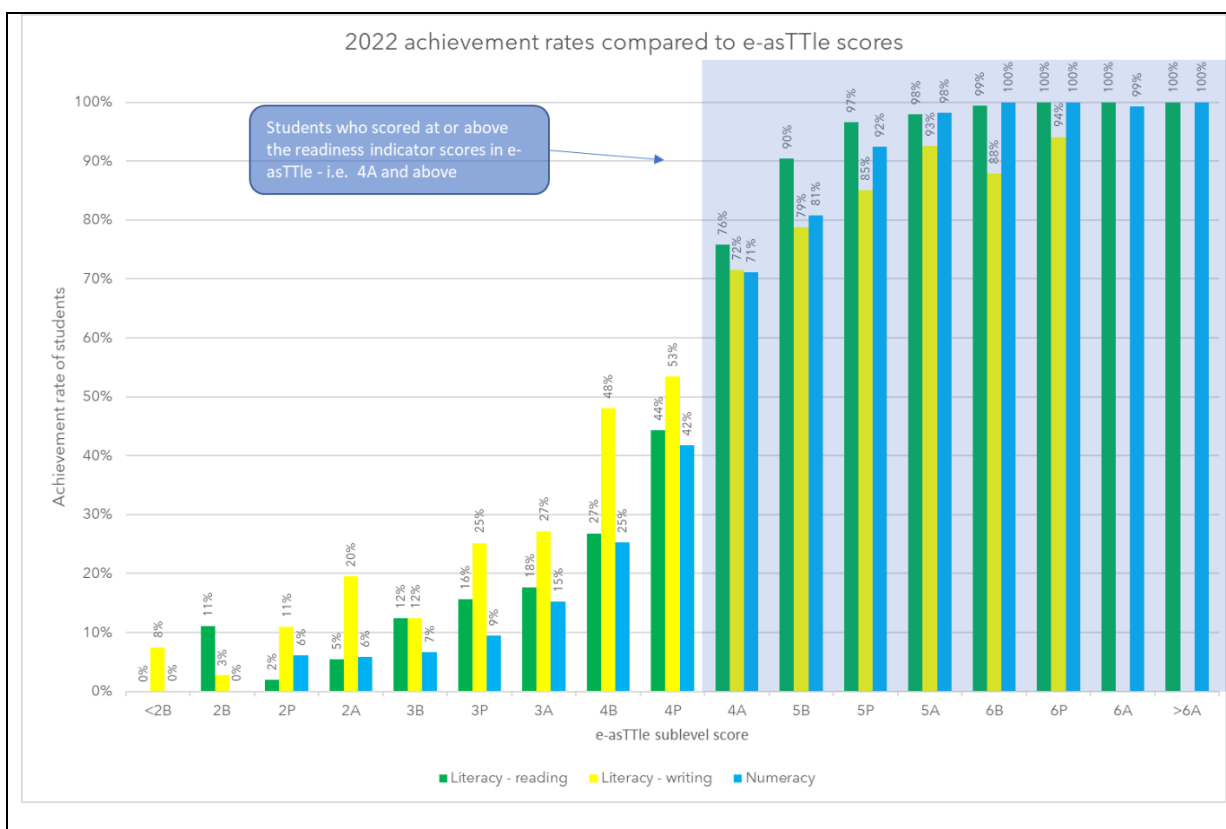
This section provides a comparative analysis of the available and valid e-asTTle scores for participating secondary students with achievement on the assessments. Section 5.2 described the distribution of e-asTTle scores for the cohort of students that participated in each of the Literacy and Numeracy standards, showing that around a quarter of students are below the minimum recommended readiness Level (e-asTTle score of 4a). For example, the overall 2022 data set has 18% of students in Literacy (reading) with scores below 4A, 17% of students in Literacy (writing), and 27% in Numeracy.

Understanding the rates of achievement by e-asTTle score can give an indication of whether the intended levelling of the standards is correct. It can also guide recommendations regarding the appropriate student readiness levels. While these results for all secondary students with e-asTTle scores can give an indication of the levels of achievement that can be expected, it is important to note that there is variation within this picture according to ethnicity and school decile. These differences are discussed further in the sections that follow.

The data presented in Chart 14 below details the secondary student results for all 2022 by e-asTTle scores to provide an understanding of the relationship between readiness, as determined by e-asTTle, and actual performance. Note that any relationship shown

between the e-asTTle scores and CAA achievement should be considered indicative rather than conclusive due to possible limitations⁴⁰ of the e-asTTle data.

Chart 14: Secondary student achievement for Literacy and Numeracy standards compared to e-asTTle scores - overall results 2022



For each e-asTTle sub-level score the bar shows the percentage of students who achieved the Achievement Standard. For students at level 4A in e-asTTle Reading, 76% (4,545) achieved the Literacy (reading) standard. Students at 4A in e-asTTle Writing, 72% (1,071) achieved the Literacy (writing) Standard, and of the students at 4A for e-asTTle Mathematics, 71% (1,699) achieved Numeracy.

For students at 5B these achievement rates increase to 90% (2,089) for Literacy (reading), 79% (779) for Literacy (writing), 81% (1,909) for Numeracy).

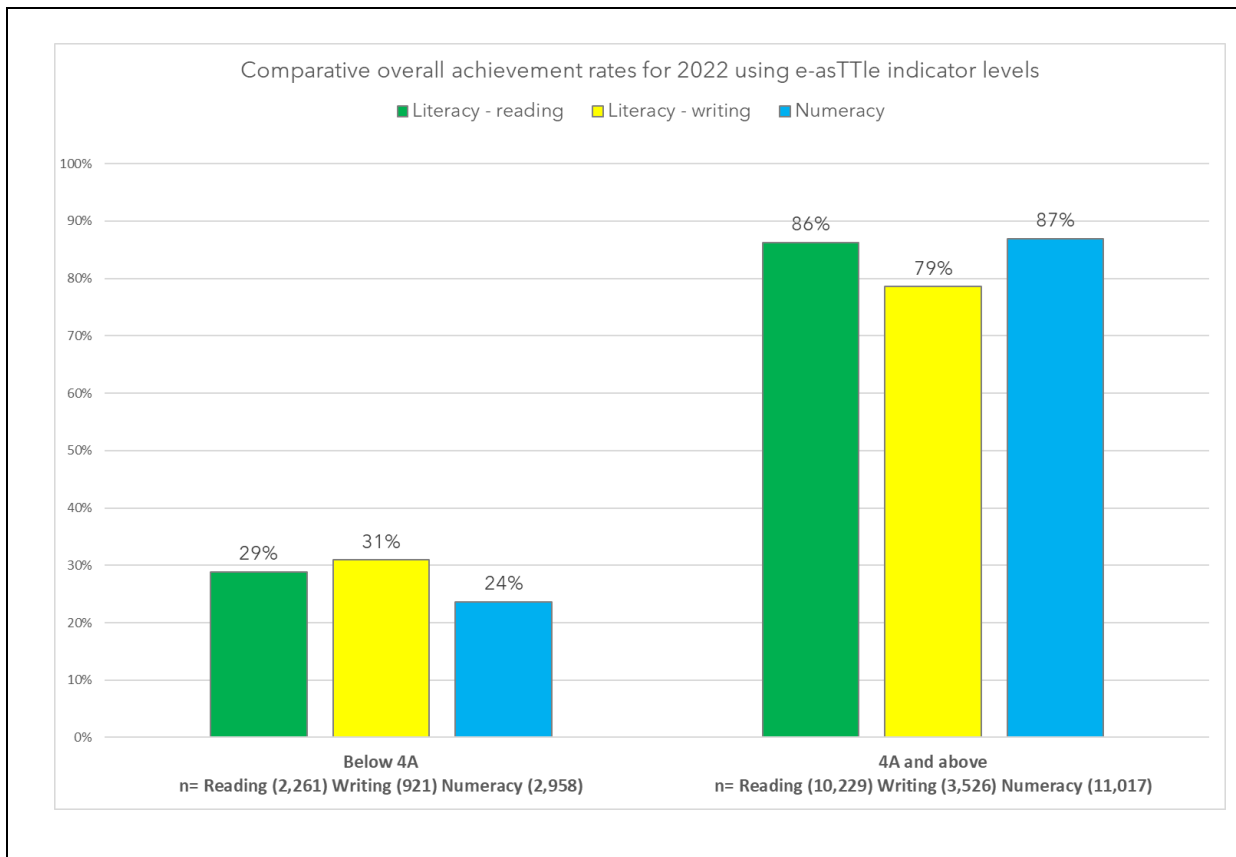
For students below 4A there appear to be higher levels of achievement in Literacy (writing) than Literacy (reading) and Numeracy. For example, 48% (89) achieved in Literacy (writing) but only 27% (137) of 4B students achieved Literacy (reading) and 25% (183) achieved Numeracy.

For students above 4A the trend is reversed, with fewer students achieving the standard in Literacy (writing) than in Literacy (reading) or numeracy. For instance, those students who scored 6B in e-asTTle had an achievement rate of 88% (116) in writing, 99% (624) in reading and 100% (184) in numeracy.

⁴⁰ It cannot be assumed the e-asTTle is a full and accurate measure of the curriculum level due to the range of ways it can be administered by schools, particularly for Writing which is teacher marked. The e-asTTle assessments do not necessarily map to exactly the same areas of the curriculum as the Literacy/Numeracy assessments, particularly for writing.

Using the same data presented above in Chart 14, the next Chart (15) shows the results divided into just two cohorts - students who were 'at or above' the recommended level versus students who were below the level in order to more simply show the differences in achievement.

Chart 15: Achievement for Literacy and Numeracy assessments for secondary students below and above e-asTTle Level 4A



In comparing the rates of achievement for these two cohorts it is evident that students 'at or above' the readiness criteria have significantly higher rates of achievement than students who were working below the recommended criteria. The biggest difference between the two cohorts is for Numeracy where the rate for students below 4A is 63 percentage points lower. This is followed by Literacy (reading) where the difference is 57 percentage points, and in Literacy (writing) the difference is 48 percentage points.

The previous two charts have used the overall 2022 results to compare achievement rates for two cohorts of students: those below the recommended readiness level and those 'at and above' the level.

The next three tables below show the data from the June event, September event and overall 2022 to compare the cohort of students 'at and above' the recommended readiness level with the full secondary student cohort. The far-right column details the percentage point difference in achievement between the two cohorts for each standard. The data illustrates the achievement differences between standards and between assessment events when student readiness is accounted for.

Table 25: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - June

JUNE	All secondary students			Secondary students with e-asTTle 4A and above			Achievement difference between cohorts Difference (pp)
	Participated		Achieved	Participated		Achieved	
	Total (n)	% below 4A	(%)	(n)	(n)	(%)	
Reading	9,386	16.6%	64.0%	5,287	4,433	83.8%	19.8
Writing	8,855	26.5%	34.2%	1,668	1,051	63.0%	28.8
Numeracy	13,441	21.2%	55.9%	6,135	4,885	79.6%	23.7

Table 26: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - September

SEPT	All secondary students			Secondary students with e-asTTle 4A and above			Achievement difference between cohorts Difference (pp)
	Participated		Achieved	Participated		Achieved	
	Total (n)	% below 4A	(%)	(n)	(n)	(%)	
Reading	11,022	21.8%	58.2%	5,441	4,382	80.5%	22.3
Writing	12,299	20.3%	46.2%	2,287	1,699	74.3%	28.1
Numeracy	15,526	26.2%	57.3%	5,739	4,761	82.9%	25.6

Table 27: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - overall 2022

OVERALL 2022	All secondary students			Secondary students with e-asTTle 4A and above			Achievement difference between cohorts Difference (pp)
	Participated		Achieved	Participated		Achieved	
	(n)	% below 4A	(%)	(n)	(n)	(%)	
Reading	18,420	18.1%	67.3%	10,229	8,827	86.3%	19.0
Writing	17,583	20.7%	49.8%	3,526	2,770	78.5%	28.7
Numeracy	25,535	21.0%	64.1%	11,107	9,671	87.1%	23.0

6.1.4 Discussion of secondary student achievement results

Trends regarding the three Standards

There is consistency across both 2022 assessment events for the achievement rates by standard, with Literacy (reading) having the highest rate, followed closely by Numeracy and then Literacy (writing). This same ranking is also seen in the 2021 pilot⁴¹ results⁴². Although a considerable increase in achievement can be seen in the September CAA compared to the June CAA.

⁴¹ The 2021 pilot involved 2,313 ākonga/students from 13 secondary schools, six kura, and two tertiary providers.

⁴² 67% of students achieved Literacy (reading), 65% achieved Numeracy and 35% achieved Literacy (writing).

This lower performance in writing versus reading is consistent with other findings for achievement and progress in literacy for New Zealand students. A Ministry of Education report (Caygill, Zhao, Hunter and Park, 2021) provides an overview of the current research regarding literacy across a range of large-scale data sources and it is noted that wide variations of achievement against the curriculum within year levels are evident, identifying also that the spread of achievement is wider for writing than for reading. The breakdown of Literacy (writing) results by ethnicity and by decile in the next section reflects this particular finding.

Another observation is that the Literacy (writing) standard shows the greatest increase in achievement when student readiness (based on e-asTTle) is accounted for. Although it has been noted previously in the report that conclusions based on comparisons of Writing e-asTTle levels and the Literacy (writing) CAA results may be less reliable than for the other CAA due to the e-asTTle writing assessing different aspects of writing than the CAA. It is also possible that the Literacy (writing) CAA is assessing competencies that have not been a part of all schools' teaching and learning programmes,

A final factor that was looked at for the lower achievement rate in Literacy (writing) may be that the CAAs for the three standards are levelled differently. It is important to note there is no evidence of this in the psychometric testing conducted (NZCER, 2022), however feedback⁴³ from six pilot schools/organisations included views that the Literacy (writing) assessment was harder than the Literacy (reading) assessment.

Asking students to write...documents that are fully developed in terms of ideas and accurate in spelling, grammar, syntax, punctuation and paragraphing as well as the corrections section of the test is beyond the CL 4-5 that was indicated that the test would be pitched. Only our strong level 5 and 6 students could achieve.

The writing was long. It seemed to be inequitable in comparison to the reading for the same amount of credits.

Continuing to monitor results and seek further understanding about the performance of the Literacy (writing) would seem to still be appropriate. However, it is likely that as teachers gain greater clarity about the requirements of the assessment, in relation to the criteria in the standard, that effective teaching and learning will support more students who are at the recommended level to achieve.

Trends regarding the two assessment events

There are two notable differences between the June and September assessment events. First is the decreased achievement for the Literacy (reading) Standard (by 5.8 percentage points), and second is the increased level of achievement for the Literacy (writing) Standard (by 12 percentage points).

The Numeracy result showed minimal change, although a difference noted between the 2021 assessment event and the June 2022 event was a drop in achievement for Numeracy

⁴³ In the end-of-year survey for Literacy (writing) 6 schools/organisations identified this as an equity-related issue for Literacy (writing). In total for this question 61 different issues were reported by 30 schools/organisations.

from 65% to 56% and this lower result was retained in the September event with 57% of students achieving the Standard.

There was a short period of time between the two assessment events and results from the June event were provided to schools in August 2022, so it is unlikely that the differences in achievement rates between the two events will be related to changes in literacy and numeracy teaching and learning.

One explanation for the increase in Literacy (writing) and decrease in Literacy (reading) is that the June and September cohorts had varying levels of capability/readiness. By comparing the e-asTTle scores of participating students, (detailed in Section 5.2) there are differences in the readiness levels of participating students between the two events but there is not a clear pattern.

- In Literacy (reading) the June cohort had a higher achievement rate than the September cohort *and* the June cohort had greater levels of readiness (i.e. less students in June (17%) were below Level 4A than in September (22%).
- In Literacy (writing) the June cohort had a lower achievement rate than the September cohort *and* the June cohort had lower levels of readiness (i.e. more students in June (27%) were below Level 4A than in September (20%).
- In Numeracy the June cohort had a slightly lower achievement rate than the September cohort *but* the June cohort had higher levels of readiness (i.e. less students in June (21.2%) were below 4A than in September (26.2%) of students in September)

The differences in the readiness levels of cohorts for the two assessment events could be seen as a contributing factor to the changes in achievement rates for Literacy (reading) and Literacy (writing). However, the differences in readiness for the Numeracy cohorts does not seem to have had the same effect on the Numeracy results.

Another difference between the June and September cohorts is that the September cohort included students who were re-sitting the assessment and these students had lower rates of achievement than the overall September cohort. However, the standard with the biggest achievement increase in September, Literacy (writing), also had the highest proportion of re-sitting students - 29%, compared with 17% for Literacy (reading) and 22% for Numeracy. By having the largest proportion of re-sitting students, the overall achievement rate for Literacy (writing) will have been affected more than the rates for Literacy (reading) and Numeracy. But despite this the September cohort for Literacy (writing) had higher rates of achievement than the June cohort.

These findings suggest that there may be other factors unrelated to the relative capability of the two cohorts that have influenced the increase in achievement in Literacy (writing) and the decrease in Literacy (reading).

An alternative explanation for this variability in achievement between the two assessment events could be that the June and September assessments varied in difficulty. However, this is not supported by the psychometric analysis on the CAA items which was conducted by the New Zealand Council of Educational Research (NZCER, 2022).

In summary, there is no clear explanation for the variability in achievement rates between assessment events. It appears that understanding the interplay between readiness and achievement is complex and is also likely to be impacted by other variables that have not

been controlled for. This includes: the accuracy of the e-asTTle results for the student cohorts, the Reading, Writing and Mathematics e-asTTle assessments being equally reliable indicators of readiness, the assumption that the schools in the two assessment events were equally ready for implementing the assessments, the impact of the COVID 19 pandemic, and reduced student attendance in many schools. Not being able to control for these factors in this evaluation means that it is difficult to draw accurate conclusions about the differences between the two assessment events.

Trends regarding readiness levels and achievement

Comparing the results of students who are below the minimum recommended readiness level with students who are at/above the minimum recommended readiness level was undertaken to provide an indication of achievement rates with the levelling of the standards at upper Level 4 / lower Level 5 of the NZC.

In the results data from both the June and September assessment events the readiness level of 4A (e-asTTle) appears to show that most students are likely to achieve the CAAs within two⁴⁴ attempts (around 75% for Literacy (reading) and 71% for Literacy (writing) and Numeracy). The rates of achievement in the June assessment event (data for one attempt) for students at 4A are lower, particularly for Literacy (writing) which is 53% and for Numeracy which is (56%). Literacy (reading) showed 71% of students achieving.

A readiness indicator of low Level 5 of the NZC (5B e-asTTle score) increases the chance of achieving the standard within two attempts by between 7 and 23 percentage points (as per overall 2022 data).

The analysis of achievement by e-asTTle sublevel demonstrates a relationship between students' e-asTTle scores and the likelihood of achieving the standards. This is true for all three Standards but particularly true for Literacy (reading) and Numeracy.

⁴⁴ Approximately 60% of the students who did not achieve the assessment in June had a second attempt in September.

Summary of all secondary student results

This section presented the Literacy and Numeracy Standards achievement results from the September assessment event, the June assessment event, and also the overall 2022 results. Key findings for 'all secondary students' were:

- In both assessment events the order of achievement by standard was the same: Literacy (reading) had the highest rate of achievement (67% for overall 2022), this was closely followed by Numeracy (64% for overall 2022) and then Literacy (writing) had the lowest rate (50% for overall 2022).
- The comparison of the September event data with the June event data showed a decrease in achievement for the Literacy (reading) Standard (from 64% to 58%) and an increase in achievement for the Literacy (writing) Standard (from 34% to 46%). Numeracy results were very similar (56% to 57%).
- Changes in achievement rates between the two assessment events are likely to be influenced by the relative abilities/readiness of the cohorts.
- Approximately a quarter of students participating in the September assessments were 're-sitting' the assessment after not achieving in June. These students had significantly lower rates with 36% achieving Literacy (reading), 38% achieving Literacy (writing) and 39% achieving Numeracy.
- Analysis of the achievement rate compared with students' e-asTTle scores suggests a predictive relationship, particularly for Literacy (reading) and Numeracy. The recommended minimum readiness of 4A (e-asTTle) appears to indicate that nearly three-quarters of students are likely to achieve the standards within two attempts (75% for Literacy (reading) and 71% for Numeracy and Literacy (writing)). Using 5B as the readiness indicator increases the chance of achieving the standard by between 7 and 23 percentage points.

Recommendations: Student results

Relevant recommendations from Report One

1. The rates of those achieving the standard in Literacy (writing) is lower compared to Literacy (reading) and Numeracy, even if they have achieved similar levels in e-asTTle. For example, those students who had scored 5A in e-asTTle had a 98% achievement rate in Literacy (reading), 96% achievement rate in Numeracy, and only a 77% achievement rate in Literacy (writing). This warrants further analysis if similar rates of achievement are wanted across all three standards.
2. Further clarity is required regarding expected achievement rates for each of the assessments in order to determine the appropriateness of the readiness indicators used in the pilot.

Additional recommendations for Report Two

3. Ensure the Literacy (writing) assessment requirements, in relation to the criteria in the standard, are clearly communicated to teachers and well understood.

6.2 Secondary student results by gender, year level, ethnicity and school decile

This section explores the differences in achievement rates for the Literacy and Numeracy assessments for secondary students according to gender, followed by Year level, ethnicity, and then school decile. In the ethnicity and school decile sections there is also additional analysis of this data by e-asTTle score.

Exploring and understanding differences between different cohorts of students is an important part of examining the equitability of the standards. The achievement rates are reported as a percentage to best show the differences between groups and differences between standards. However, the group sizes vary considerably and so, where appropriate, the numbers of students are also provided.

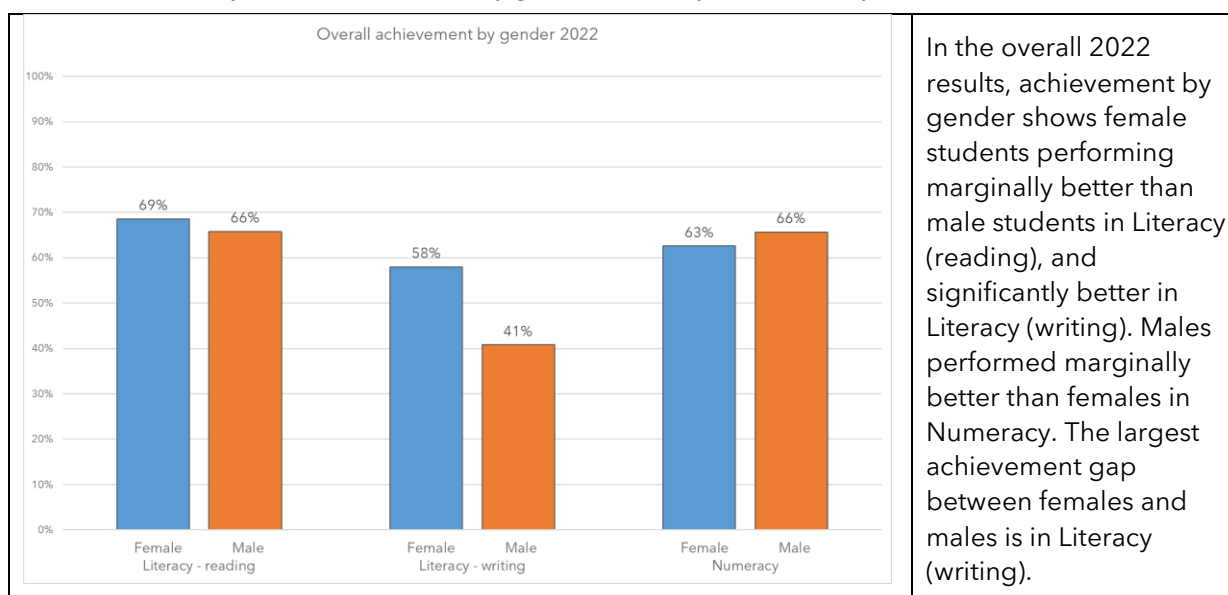
6.2.1 Results by gender

Table 28 below compares achievement by standard and gender in the two assessment events and also the overall 2022 data. Where a student participated in an assessment in both June and September, only the result for their second assessment is counted. The overall 2022 gender results for each standards are then presented in Chart 16.

Table 28: Secondary student achievement by gender in Literacy and Numeracy standards for June, September and overall 2022

Standard	Gender	June achieved students		September achieved students		Overall 2022 achieved students	
		(n)	(%)	(n)	(%)	(n)	(%)
Reading	Female	3,086	67.2%	3,450	59.4%	6,501	68.6%
	Male	2,930	61.1%	2,972	57.0%	5,890	65.8%
Writing	Female	1,820	42.1%	3,505	54.4%	5,315	58.0%
	Male	1,209	26.7%	2,183	37.3%	3,437	40.8%
Numeracy	Female	3,482	53.0%	4,663	56.9%	8,128	62.6%
	Male	4,030	58.6%	4,263	57.8%	8,245	65.7%

Chart 16: Secondary student achievement by gender in Literacy and Numeracy Standards for overall 2022



In conclusion, the key findings from this analysis of results by gender, where female students showed marginally higher levels of achievement than male students in Literacy (reading) and significantly higher levels in Literacy (writing), and males showed marginally higher rates than females in Numeracy, are not unexpected. A New Zealand research report on student achievement and progress in literacy (Caygill, Zhao, Hunter and Park, 2021) highlights the finding that proportionately more girls than boys do well in aspects of literacy and that internationally such gender differences in literacy are also common.

6.2.2 Results by Year level

The table below shows achievement rates for groups of secondary students according to their Year level. As detailed in Section 5 the secondary student cohort are mostly Year 10 students (86%).

Table 29: Secondary student achievement by Year level for June, September and Overall 2022

Standard	Year Level	June		September		Overall 2022	
		achieved students (n)	(%)	achieved students (n)	(%)	achieved students (n)	(%)
Reading	9	294	62.3%	402	45.3%	693	55.0%
	10	5,208	64.3%	5,681	60.0%	10,875	68.6%
	11	469	66.5%	316	53.1%	784	65.5%
	12	13	29.5%	15	35.7%	28	35.4%
	13	10	40.0%	2	11.1%	12	27.3%
Writing	9	128	34.7%	289	33.2%	417	38.4%
	10	2,692	34.9%	5,130	47.8%	7,870	51.5%
	11	197	29.6%	252	39.8%	447	39.4%
	12	4	10.8%	11	30.6%	15	21.7%
	13	3	12.0%	2	15.4%	5	14.3%
Numeracy	9	413	56.0%	473	53.7%	881	59.9%
	10	6,278	56.6%	7,631	58.4%	13,895	65.6%
	11	789	53.0%	741	51.6%	1,530	57.0%
	12	11	18.6%	40	38.8%	52	34.2%
	13	8	27.6%	7	28.0%	15	28.8%

The relatively low performance of Year 12 and 13 students is likely related to the reasons these students were selected to participate in the Literacy and Numeracy Standards. Responses from teachers in the end-of-year survey indicates that many of the Year 12 and 13 students entered had not yet met the Literacy or Numeracy requirements so this was seen as an opportunity for them to achieve these standards.

6.2.3 Results by ethnicity

Achievement by ethnicity is discussed in this section. NCEA data is categorised in large ethnic groupings of Māori, Pacific Peoples, Asian, MELAA⁴⁵, and European. Ethnicity is self-reported using a total response method, where students are counted for each ethnicity they identify with.

The achievement results are firstly reported by ethnicity for all students who participated in the Literacy and Numeracy assessments. The data is then looked at by ethnicity for only those students who were at the recommended curriculum level. This section ends with a brief discussion of the findings regarding these results.

Table 30 shows the rates of achievement by ethnicity for the June and September assessment events and also the results overall for 2022. This overall 2022 data excludes the first result for students who re-sat the assessment in September event after not achieving in the June event. The numbers for each ethnicity who participated in the assessments are reported in Section 5.1.2. The data is inclusive of students from Realm countries.

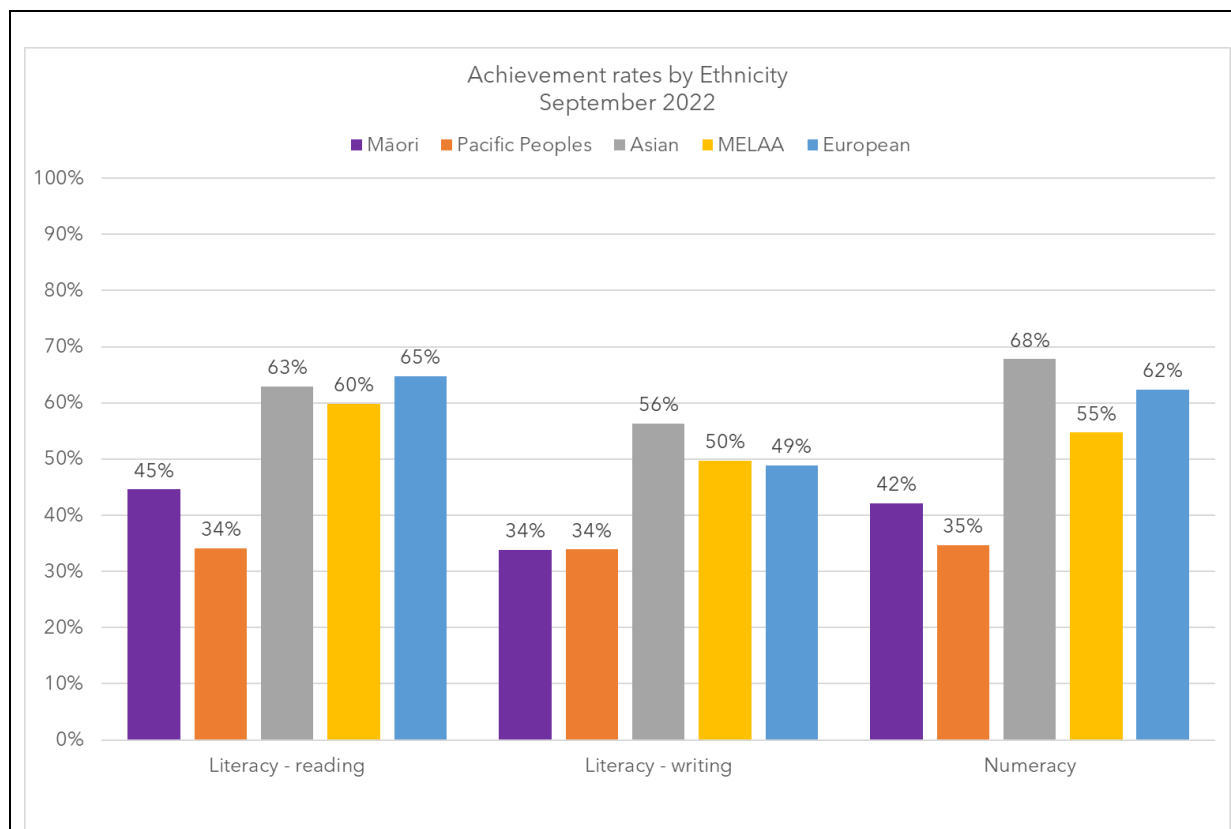
Table 30: Secondary student achievement by ethnicity for Literacy and Numeracy CAA - June, September, and overall 2022

Standard	Ethnicity	June achieved students		September achieved students		Overall 2022 achieved students	
		(n)	(%)	(n)	(%)	(n)	(%)
Reading	Māori	929	50.2%	1,099	44.6%	2,038	53.2%
	Pacific Peoples	459	33.9%	464	34.1%	931	40.0%
	Asian	1,074	72.1%	965	62.9%	2,037	72.6%
	MELAA	152	68.8%	150	59.8%	302	69.6%
	European	4,249	72.3%	4,826	64.8%	9,069	74.2%
Writing	Māori	393	23.6%	879	33.8%	1,281	36.2%
	Pacific Peoples	260	19.7%	470	33.9%	736	32.8%
	Asian	631	44.1%	972	56.3%	1,619	59.5%
	MELAA	60	26.6%	151	49.7%	216	51.3%
	European	2,072	37.3%	4,171	48.9%	6,264	53.4%
Numeracy	Māori	996	38.3%	1,440	42.1%	2,442	46.8%
	Pacific Peoples	428	26.0%	629	34.7%	1,054	36.0%
	Asian	1,429	68.5%	1,486	67.8%	2,924	74.7%
	MELAA	161	56.5%	215	54.7%	377	62.8%
	European	5,555	61.4%	6,670	62.4%	12,227	69.7%

The charts below compare the achievement data by ethnicity for each Literacy and Numeracy achievement standard. The first chart (Chart 17) presents the data from the September assessment event and the second chart (Chart 18) presents the overall 2022 results.

⁴⁵ MELAA = Middle Eastern, Latin American, African students

Chart 17: Secondary student achievement by ethnicity for Literacy and Numeracy CAA – September

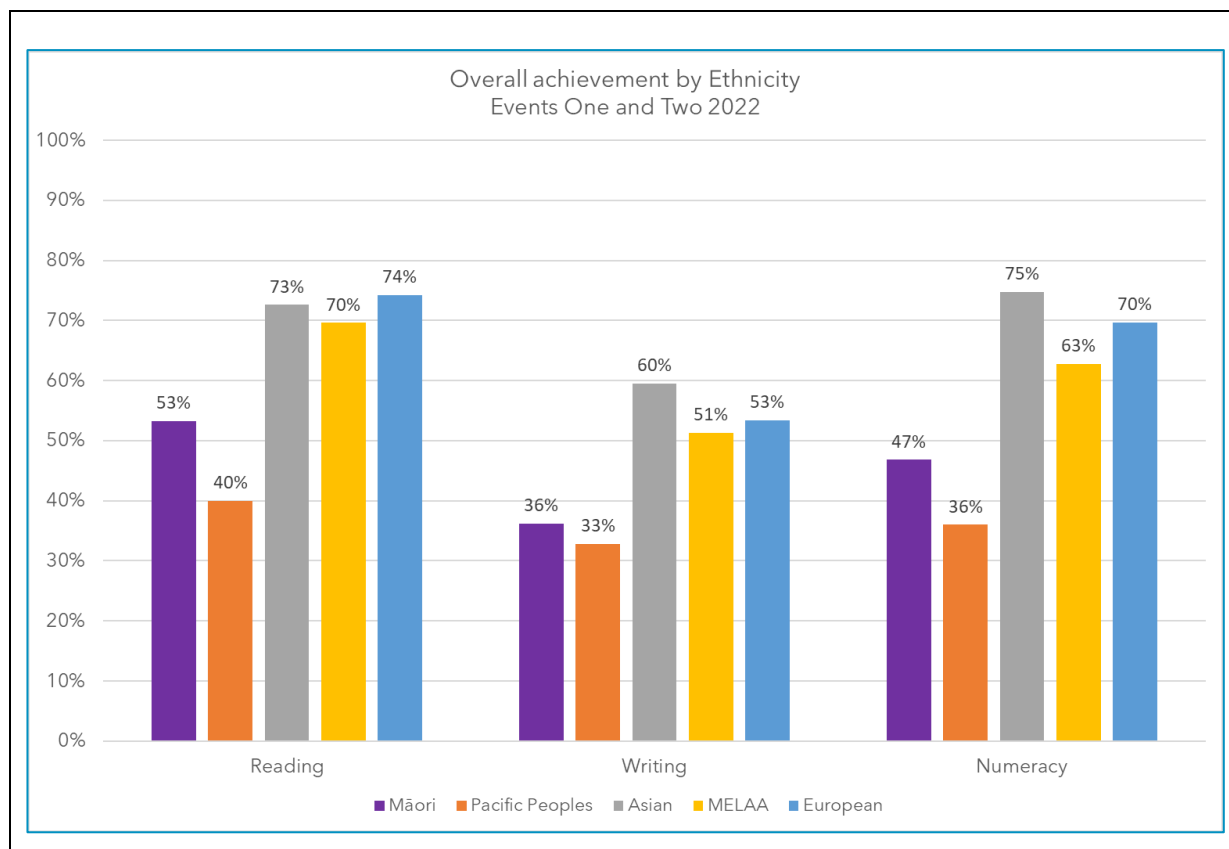


The results by ethnicity for the September assessment event show that for Literacy (reading) the highest achievement rate was for European students, followed by Asian, MELAA, Māori and Pacific students.

In both Literacy (writing) and Numeracy, the highest achievement rate was from students who identified as Asian but in Literacy (writing) the second highest achievement rate was from MELAA students, followed by European, Māori and Pacific students. For Numeracy the second highest rate was from European students, followed by MELAA, Māori and Pacific students.

The order of achievement for Literacy (writing) in September was different to June, due to a 20 percentage point increase from MELAA students and only a 12 percentage point increase from European students.

Chart 18: Secondary student achievement by ethnicity for Literacy and Numeracy-CAA - overall 2022



The overall 2022 results demonstrate very similar patterns of achievement between the ethnicity grouping shown in the September event. The order for each ethnicity group remain the same for Literacy (reading) and Numeracy. In Literacy (writing) and Numeracy, the highest achievement rate was from students who identified as Asian, followed by European, MELAA, Māori and Pacific students.

For Literacy (reading), the order of achievement by ethnicity was slightly different with European students showing the highest rates, very closely followed by Asian and MELAA, and then Māori and Pacific students.

The results by ethnicity for the June and the September assessments demonstrate very similar patterns of achievement. For Literacy (writing) and Numeracy, the highest achievement rate was for students who identified as Asian, followed by European, MELAA, Māori and Pacific students. For Literacy (reading), the order of achievement by ethnicity was slightly adjusted with European students showing the highest rate, very closely followed by Asian and MELAA, and then Māori and Pacific students.

Analysis of achievement by ethnicity and e-asTTle score

The cohort of students participating in the Literacy and Numeracy assessments had varying levels of readiness, as shown by the analysis of e-asTTle data for those participants that had a valid⁴⁶ e-asTTle score in Section 5.2.2. This analysis showed that the

⁴⁶ The criteria for valid e-asTTle scores was the score must be either (1) recent (Jan 2022 or later) or (2) if a score is not recent it must be above the sub-level score 4A.

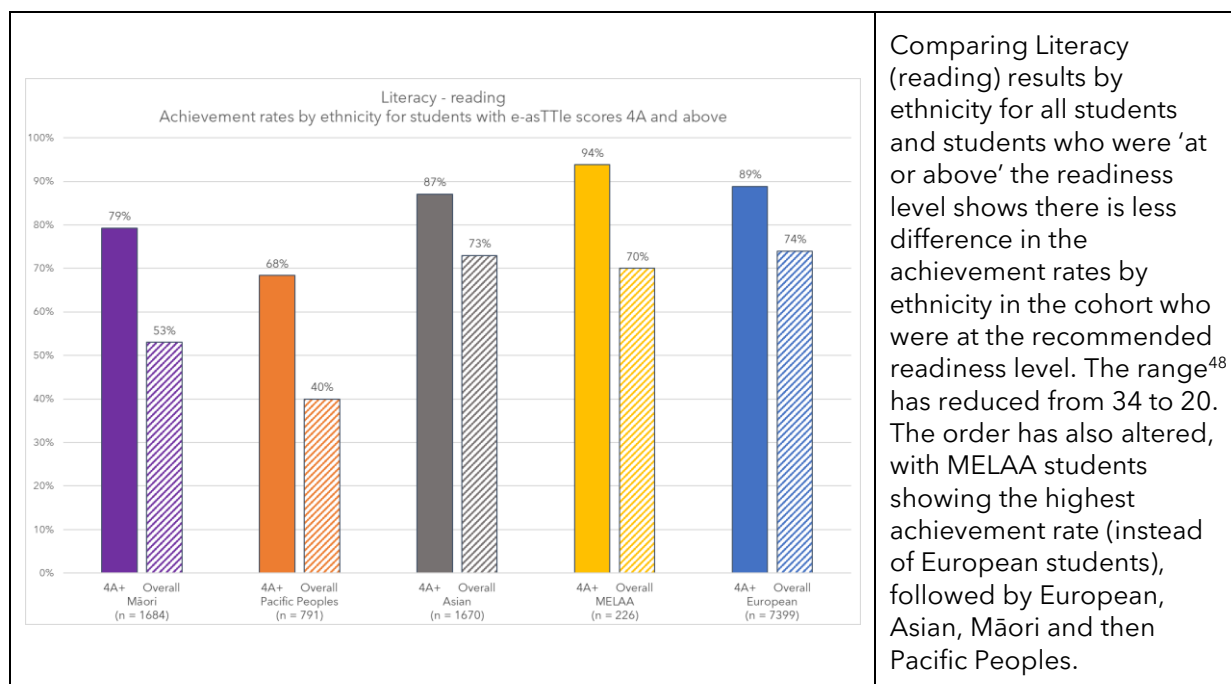
proportions of 'ready' and 'non-ready' students vary between assessment events, Standards, deciles and between ethnicity groupings.

For the five ethnicity groupings, the analysis of 'readiness' revealed that all groups had the lowest levels of readiness for Literacy (writing) and the highest levels of readiness for Literacy (reading). The breakdown of students by e-asTTle sublevel score show that the overall readiness for each ethnicity group varied. When each group is ordered from most ready to least ready the order is Asian, European, closely followed by MELAA, and then Māori and Pacific Peoples. This order is consistent for all three Standards.

To understand the impact that the different levels of readiness may have had on achievement the three charts below present the results by ethnicity and by e-asTTle score. The two bars of data compare the rates of achievement by ethnicity for two cohorts of students - all secondary students from that ethnicity group and those students from that ethnicity group with a valid e-asTTle score who were 'at or above' the recommended readiness level.

Note that the cohort of Pacific Peoples students with e-asTTle scores 4A and above does not include students from Realm countries⁴⁷, where-as the overall Pacific Peoples cohort does. This is likely to impact the comparison due to students from the Realm having lower rates of achievement than the overall Pacific Peoples cohort in Literacy (reading) and Numeracy. The rate for achieving Literacy (writing) was only 2 percentage points lower.

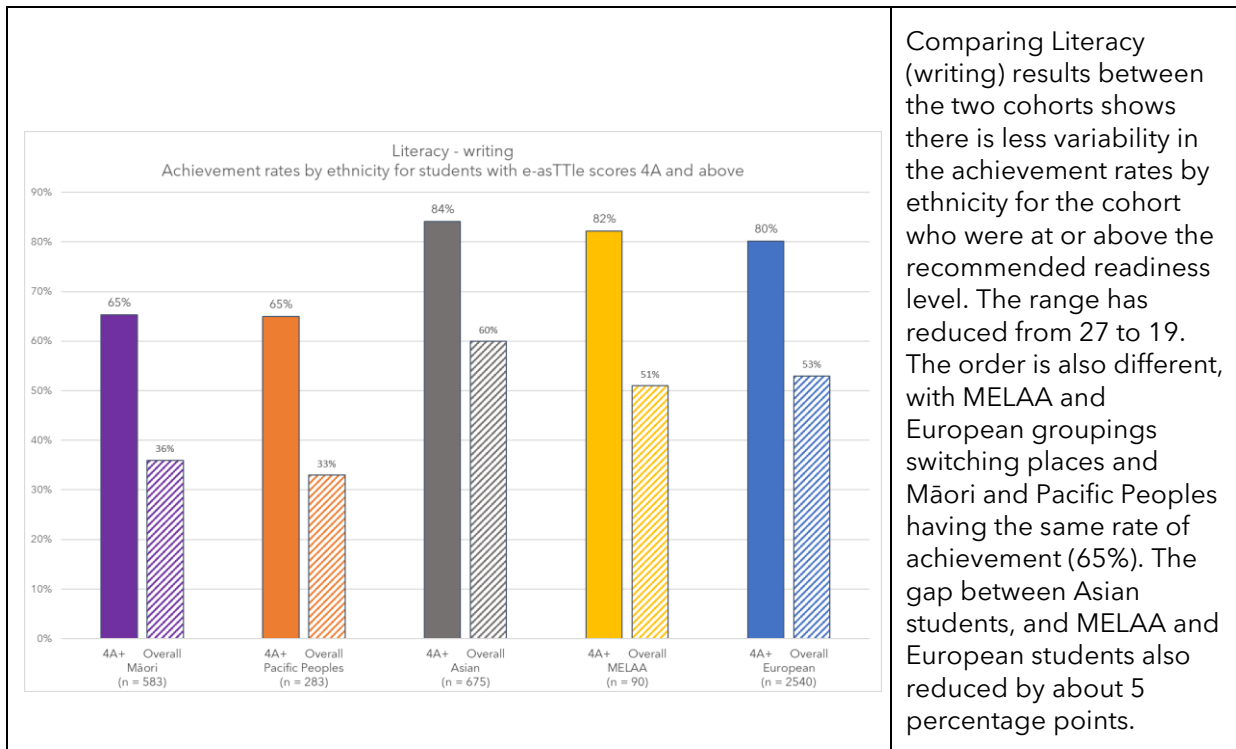
Chart 19: Comparing achievement by ethnicity in Literacy (reading) between all students with students e-asTTle scores 4A and above - overall 2022



⁴⁷ The e-asTTle tool is not currently used consistently by schools in Realm countries.

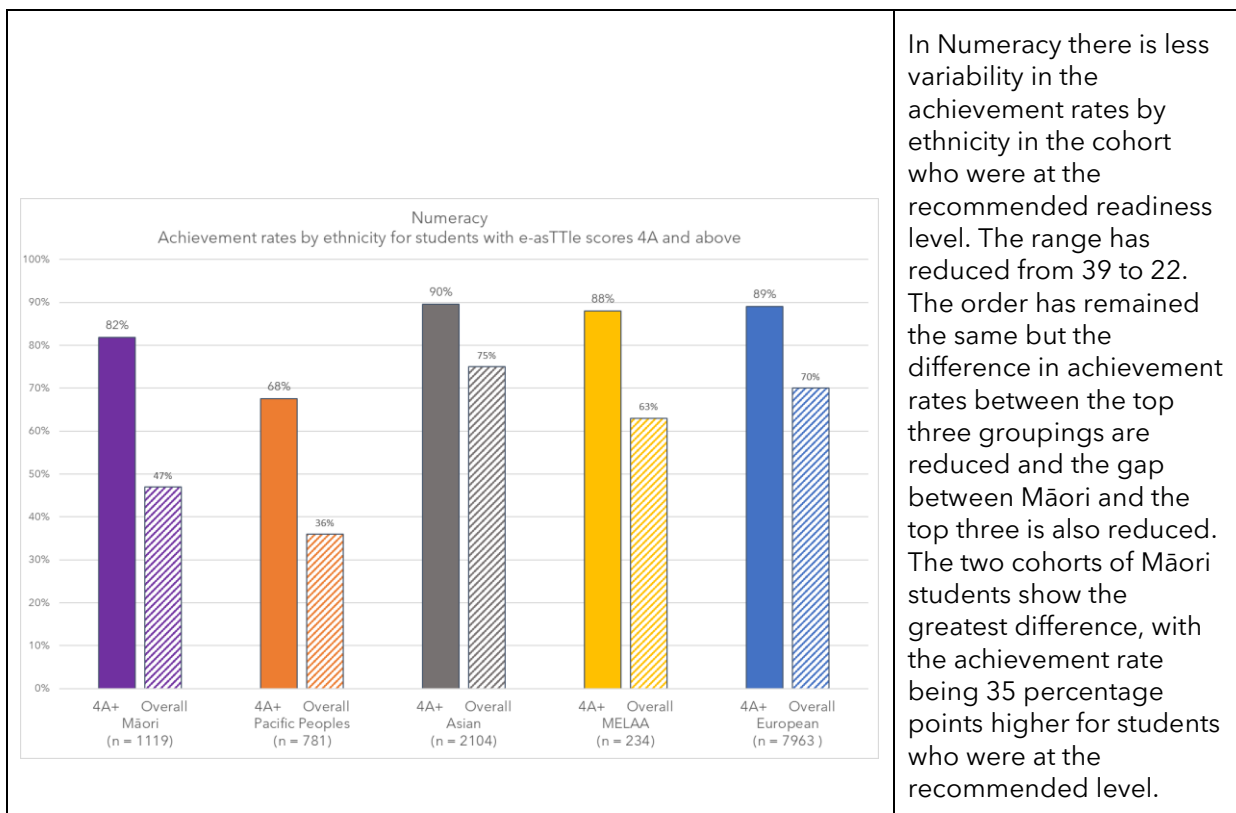
⁴⁸ The range is the difference between the highest achievement rate and the lowest achievement rate.

Chart 20: Comparing achievement by ethnicity in Literacy (writing) between all students with students e-asTTle scores 4A and above - overall 2022



Comparing Literacy (writing) results between the two cohorts shows there is less variability in the achievement rates by ethnicity for the cohort who were at or above the recommended readiness level. The range has reduced from 27 to 19. The order is also different, with MELAA and European groupings switching places and Māori and Pacific Peoples having the same rate of achievement (65%). The gap between Asian students, and MELAA and European students also reduced by about 5 percentage points.

Chart 21: Comparing achievement by ethnicity in Numeracy between all students with students e-asTTle scores 4A and above - overall 2022



In Numeracy there is less variability in the achievement rates by ethnicity in the cohort who were at the recommended readiness level. The range has reduced from 39 to 22. The order has remained the same but the difference in achievement rates between the top three groupings are reduced and the gap between Māori and the top three is also reduced. The two cohorts of Māori students show the greatest difference, with the achievement rate being 35 percentage points higher for students who were at the recommended level.

Discussion of results by ethnicity

The key findings from the analysis regarding ethnicity are:

- The proportions of 'ready' and 'non-ready' students are variable across the five different ethnicity groupings who participated in the pilot.
- The varying levels of readiness in each of the ethnicity groupings has contributed to the varying achievement rates shown by each of the ethnicity groupings, with the groups with lower levels of readiness also having lower rates of achievement.
- When the results for students who were below the recommended level are removed from the data-set, and the cohorts are more similar in their 'starting point', the differences in the achievement rates between the ethnicity groupings are less pronounced. This is shown by a decrease in the spread of achievement rates.
- However, in the group of students 'at and above' the level there are still achievement differences between the ethnicity groupings - suggesting that learners at a similar readiness level, but different ethnicity, perform differently.

It can be concluded that some of the differences between the ethnicity groupings are due to differences in readiness levels, however this does not fully explain the differences.

New Zealand research on student achievement shows that rates of progress appear similar across all ethnicity-based sub-groups on average, with differences in achievement appearing to be related to different start-points. (Caygill, Zhao, Hunter & Park, 2021). Understanding this should be a key consideration for how selection decisions are made about which students should participate in the Literacy and Numeracy assessments. With many schools choosing to enter whole Year levels (e.g. Year 10) into the CAAs, rather than selecting those students that meet the readiness criteria, it is likely that the students who have higher 'start-points', (proportionately more of whom are Asian and European and attend higher decile schools) will have a greater likelihood of achieving the Standard. The negative impact of using a 'Year level' selection approach over a 'readiness' selection approach is that a greater proportion of students from particular ethnicity and decile groupings are less likely to achieve on their first attempt and will require additional opportunities to re-sit.

The other important issue to note from this ethnicity-based analysis is that the differences in the readiness levels of the ethnicity groupings do not fully explain the variability in achievement levels. This finding contributes to the existing evidence that shows the gaps in educational outcomes in New Zealand can be correlated to ethnicity. In turn, ethnicity is often correlated with other factors, such as socio-economic status and geographical factors (urban vs rural). Other researchers have highlighted additional contributing factors such as the inequalities and bias within schools, the wider education system, and communities and society as a whole. All of which are intertwined with socio-economic factors and the impact of colonisation (Eriksen, 2018; Mayeda, France, Pukepuke, Cowie & Chetty, 2022).

Alongside this there may also be issues or barriers that are specific to the assessment context of the Literacy and Numeracy Standards. The views expressed about possible inequities in the design and accessibility of the assessments are discussed in Section 7.1 but it would seem from the views reported in this section, that these issues disproportionately impact students according to ethnicity and decile.

6.2.4 Results by school decile

The table below shows a break down of achievement results⁴⁹ by decile⁵⁰ for each standard for both the June and September assessment events and also the overall 2022 results (excluding the June results for students who sat the assessment twice). This table is followed by two charts presenting firstly the September data and then the overall 2022 data.

Note that this data should be viewed knowing that the distribution of students in the decile groupings varies, with deciles 1, 2 and 3 being under-represented and deciles 6, 7 and 8 being over-represented. The numbers of students in decile 1 and 2 schools are particularly small.

Caution should also be used in analysing results by decile groupings. Thrupp and Alcorn (2011) have argued that decile-based comparisons do not necessarily take into account the various other contributing contextual differences in schools. In light of this, it is difficult to draw meaningful conclusions about the more granular differences in achievement by decile and differences in assessment events by decile, however, the overall trend suggesting an impact from socio-economic circumstances on achievement can be seen as an important finding. The very recent changes in the system, moving from deciles to an Equity Index, aim to better represent the nuances in measuring socio-economic disadvantage so future research may increase understanding of the relationship between achievement and socio-economic factors.

Table 31: Secondary student achievement by decile for Literacy and Numeracy CAA - June, September and overall 2022

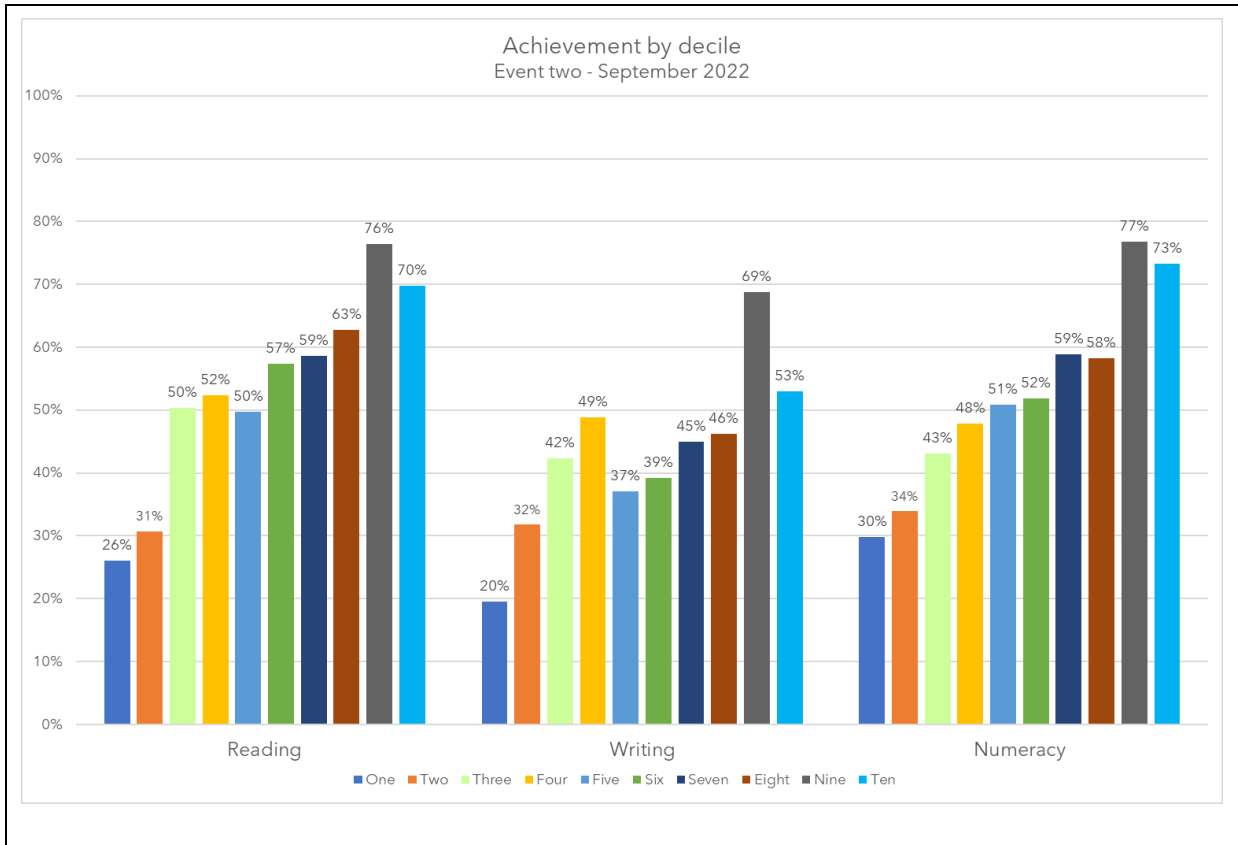
Standard	Decile	June		September		Overall 2022	
		Achieved (n)	Achieved (%)	Achieved (n)	Achieved (%)	Achieved (n)	Achieved (%)
Reading	1	47	24.1%	47	26.1%	94	27.6%
	2	126	29.9%	67	30.7%	191	33.3%
	3	228	53.8%	539	50.3%	766	56.6%
	4	967	61.6%	640	52.3%	1,606	64.7%
	5	336	72.7%	484	49.7%	815	61.0%
	6	973	65.1%	1,142	57.4%	2,112	66.2%
	7	1,147	67.0%	676	58.6%	1,819	71.4%
	8	1,149	69.9%	952	62.7%	2,098	76.2%
	9	440	80.7%	1,022	76.4%	1,462	79.8%
	10	527	84.5%	778	69.8%	1,304	77.7%

⁴⁹ The secondary student by-decile data excludes results from Te Kura.

⁵⁰ The school decile describes the extent to which a school draws its' students from low socio-economic communities. Five factors contribute to the decile: household income, occupation, household crowding, educational qualifications, and the income support levels of houses in the geographical areas a school draws its students from. Schools are ranked and then divided into 10 groups, called deciles. This decile system is changing in 2023 to an Equity Index system.

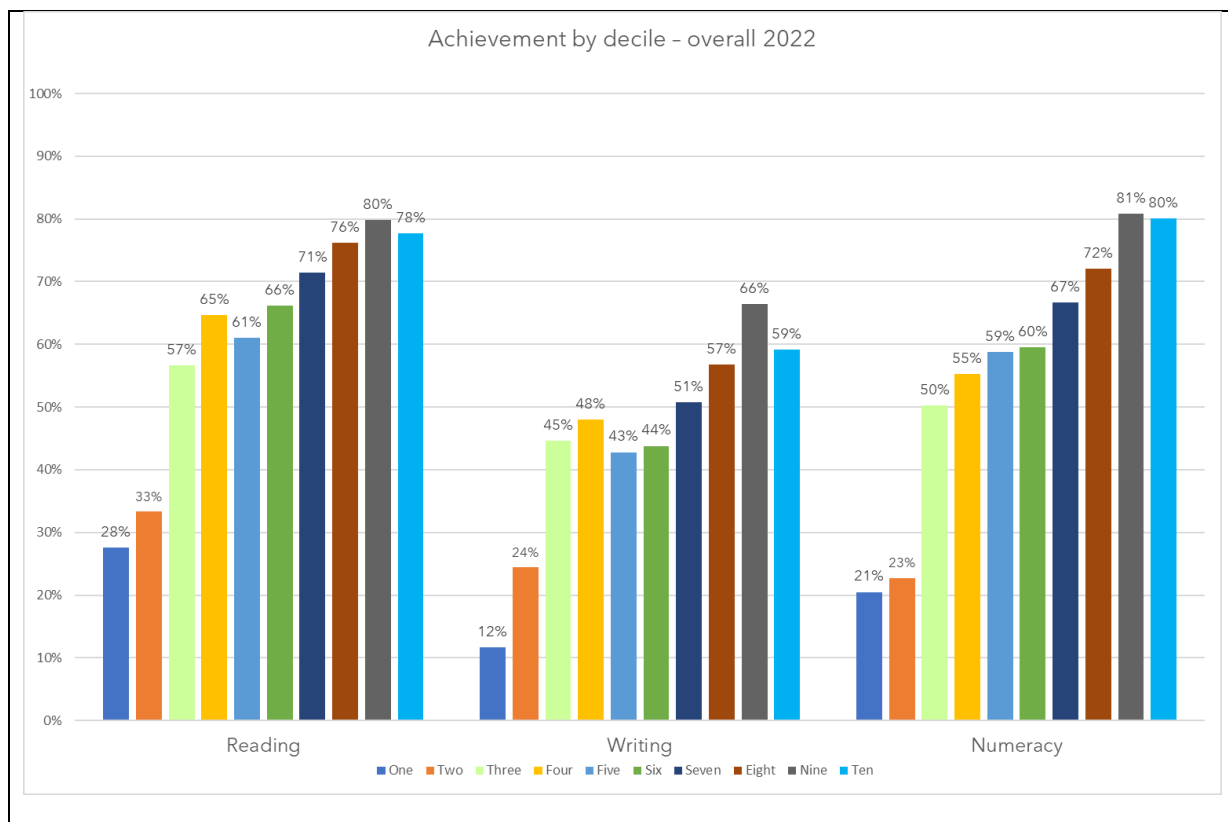
Standard	Decile	June		September		Overall 2022	
		Achieved (n)	Achieved (%)	Achieved (n)	Achieved (%)	Achieved (n)	Achieved (%)
Writing	1	3	2.2%	30	19.5%	33	11.7%
	2	59	14.9%	74	31.8%	133	24.4%
	3	148	26.1%	439	42.3%	586	44.6%
	4	407	28.9%	700	48.8%	1,115	48.0%
	5	127	36.8%	362	37.1%	486	42.8%
	6	408	28.9%	895	39.2%	1,344	43.8%
	7	605	36.5%	665	45.0%	1,269	50.8%
	8	660	42.0%	895	46.2%	1,555	56.8%
	9	237	43.0%	916	68.8%	1,154	66.4%
	10	324	61.7%	640	53.0%	963	59.2%
Numeracy	1	18	10.1%	48	29.8%	66	20.5%
	2	51	13.7%	57	33.9%	107	22.7%
	3	322	47.1%	557	43.1%	877	50.3%
	4	983	52.3%	921	47.8%	1,903	55.3%
	5	731	51.6%	567	50.8%	1,286	58.8%
	6	931	52.2%	1,484	51.9%	2,414	59.5%
	7	1,455	56.0%	1,136	58.9%	2,584	66.7%
	8	1,364	63.5%	1,248	58.3%	2,627	72.1%
	9	772	74.7%	1,713	76.8%	2,485	80.8%
	10	817	77.9%	1,104	73.3%	1,918	80.1%

Chart 22: Secondary student achievement by decile for Literacy and Numeracy CAA - September



The September achievement results show a relationship between decile and achievement rates with higher decile schools generally showing higher achievement rates. There is some variability shown, with decile 9 schools performing better than decile 10 schools in all three CAAs and decile 5 schools not performing as well as decile 3 and 4 schools in the Literacy standards.

Chart 23: Secondary student achievement by decile for Literacy and Numeracy CAA - overall 2022



The overall results for the combined 2022 events show a general trend where higher decile schools experienced higher achievement rates. In particular, decile 1 and 2 schools performed significantly lower than decile 3 to 10 schools.

The by-decile data shows an overall trend of the higher the decile the higher the achievement rate, and this is true for both assessment events and for all three Standards.

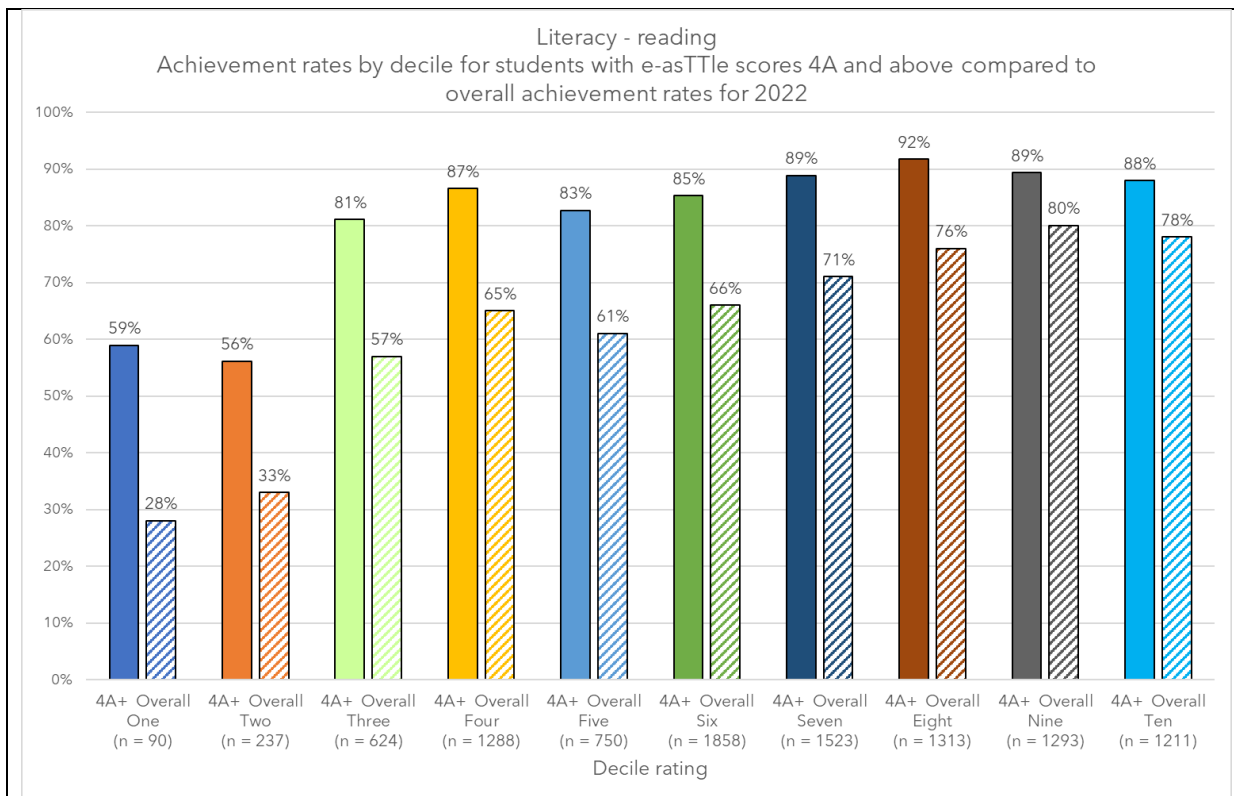
Analysis of achievement by decile and e-asTTle score

Further understanding of the overall trend shown in the achievement results by decile reported above can be found by narrowing the overall 2022 data to compare the rates of achievement across the different decile groupings for those students with e-asTTle scores 'at and above' the recommended level (4A).

The analysis of e-asTTle data in Section 5.2 identified an overall trend that low decile schools had a greater proportion of students participating in the CAA who were below the recommended curriculum level than high decile schools. The analysis of results by decile only for students 'at or above' the level will assist in understanding how much impact the differences in the readiness levels of the decile groupings had on the achievement results.

The three charts below present the achievement data for each standard by decile for those students who were 'at or above' the recommended minimum readiness level.

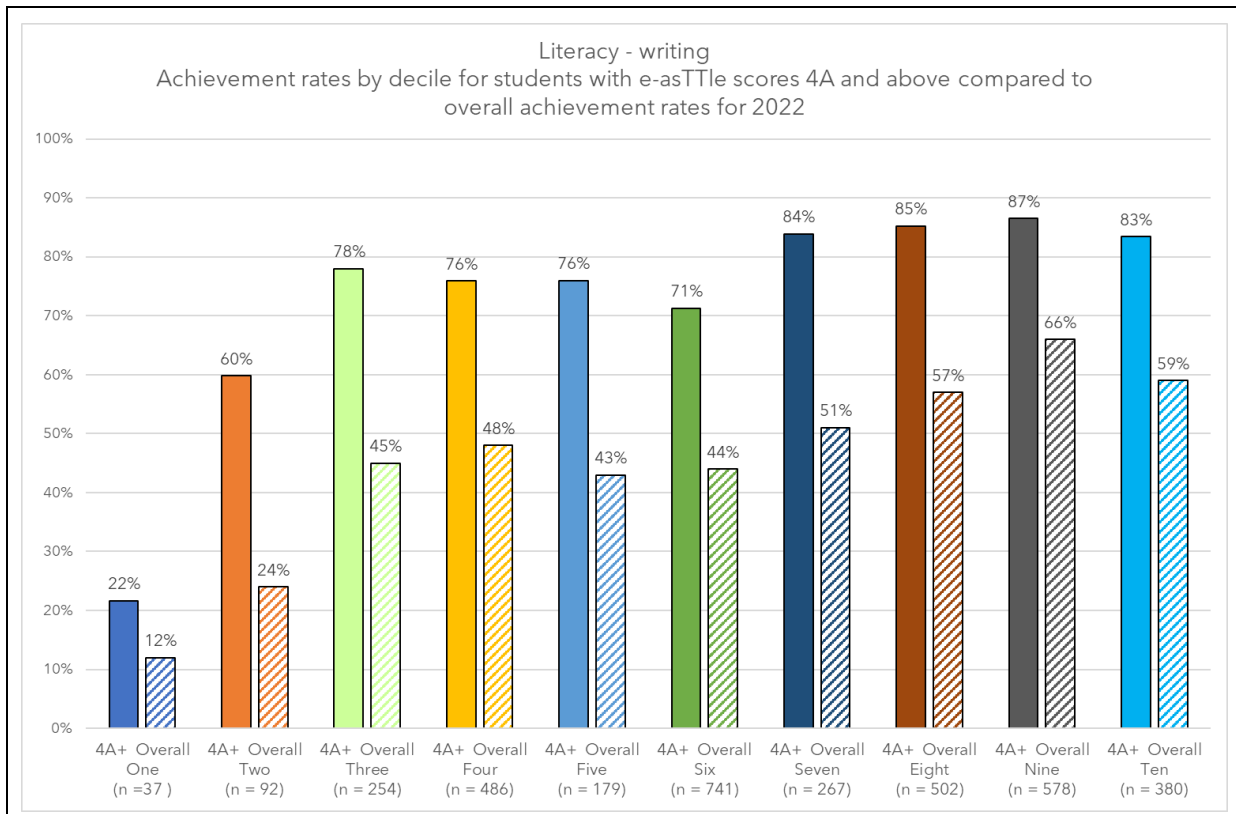
Chart 24: Secondary student achievement in Literacy (reading) by decile for students with e-asTTle scores 4A and above - overall 2022



The results data for students participating in Literacy (reading) with e-asTTle scores 4A and above shows the decile groupings falling into two clusters. The first is decile 3 to decile 10 schools with achievement rates between 81% and 92%. The second cluster is decile 1 and 2 schools with achievement rates of 59% and 56% respectively.

Comparing the results between the two cohorts shows there is less variability in the achievement rates by decile for the cohort who are at or above 4A, with the range reducing from 52 to 36. The overall trend remains the same however.

Chart 25: Secondary student achievement in Literacy (writing) by decile for students with e-asTTle scores 4A and above - overall 2022

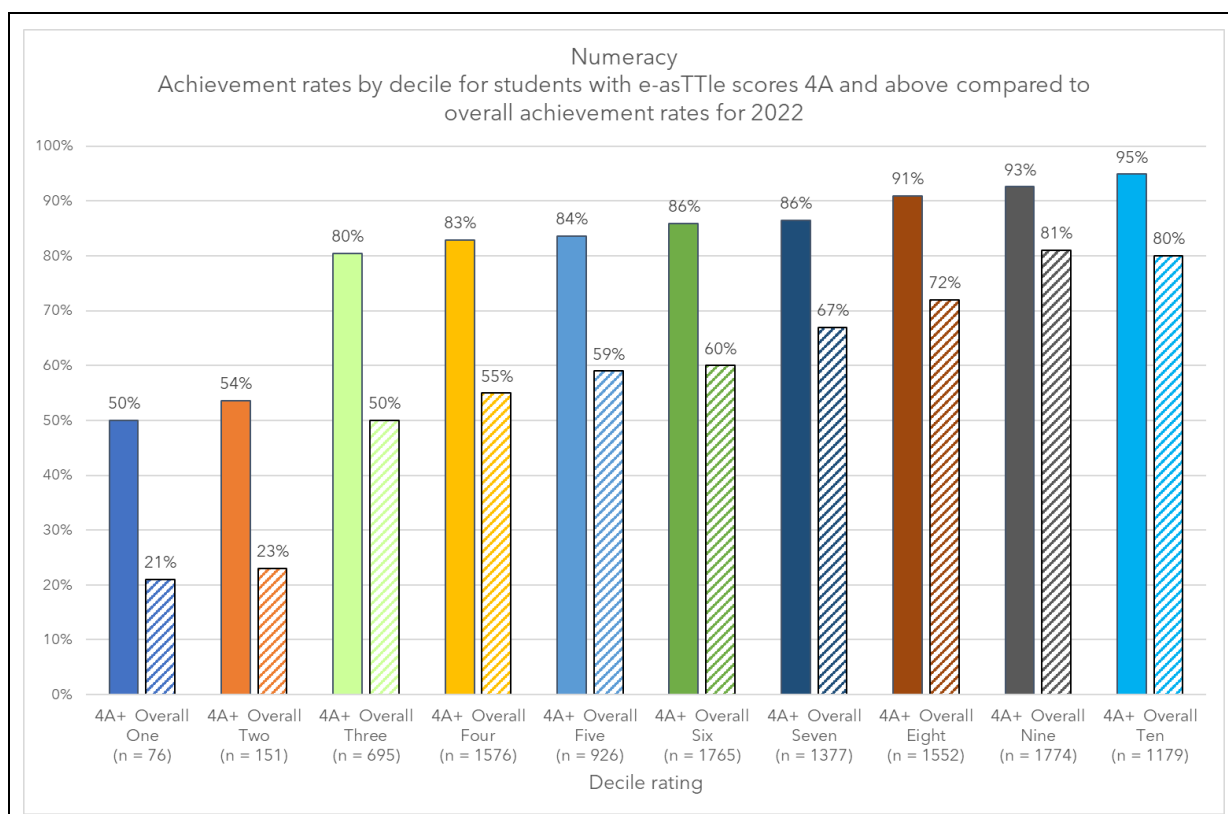


The results data for students participating in the Literacy (writing) CAA with e-asTTle scores 4A and above shows a little more variability than the Literacy (reading) data above. Deciles 7 to 10 have achievement rates in the 80s, deciles 3 to 6 have achievement rates in the 70s, and deciles 2 and 1 show a greater difference with decile 2 at 60% and decile 1 showing 22%.

Comparing the results between the two cohorts shows for the cohort who are at or above 4A, the differences between the deciles are less pronounced for deciles 2 to 10, but more pronounced for the decile 1 cohort.

Due to the results from the decile 1 cohort the range for all deciles actually increases from 54 to 65. Whereas the range for decile 2 to 10 shows a reduction from 42 to 27. Students from decile 2 schools showed the greatest difference in achievement when readiness was accounted for and decile 1 students showed the least difference (although it is important to note the small numbers for the decile 1 cohort). The overall trend shown in the full cohort remains the same for the students at and above 4A.

Chart 26: Secondary student achievement in Numeracy by decile for students with e-asTTle scores 4A and above – overall 2022



The results data for students participating in the Numeracy CAA with e-asTTle scores 4A and above show the achievement rates for decile 1 and 2 schools are significantly lower than the decile 3 to 10 schools. For decile 3 to 10 schools the rates are between 80% and 90%. Decile 2 achieved at 54% and Decile 1 at 50%.

Comparing the results between the two cohorts shows there is less variability in the achievement rates by decile for the cohort who are at or above 4A, with the range reducing from 60 to 45. The overall trend remains the same however.

Discussion of results by decile

This analysis of achievement rates by decile and e-asTTle score investigated the assumption that students at the same curriculum levels would have similar rates of achievement – irrespective of the socio-economic status of the community they live in (with the school decile number being a proxy for this).

The achievement results show the decile groupings with greater proportions of students who were below 4A (lower decile schools) had larger increases in achievement when this was accounted for. In Literacy (reading) and Numeracy when the data only includes those students who met the readiness criteria the differences in achievement rates between the decile groupings are less pronounced. However, for Literacy (writing) the differences between the decile groupings are less pronounced for deciles 2 to 10, but more pronounced for the decile 1 cohort.

However, as shown in Charts 24, 25, and 26 above, when readiness levels are similar there are still significant differences in achievement between decile groupings. Similar to the findings reported in the previous section for ethnicity, some of the achievement gap can be accounted for by the difference in the readiness levels between the decile groupings, but this does not fully explain the differences.

It is likely that other factors relating to socio-economic circumstances are at play. Exploring the wider reasons for these achievement differences is beyond the scope of this evaluation, but it is clearly recognised that students from low socio-economic communities tend to face more barriers to learning than students from high socio-economic communities. A commentary paper from the University of Auckland on disparities in educational outcomes reports that there is extensive evidence on the impact of socio-economic factors on students' educational achievement, with influential factors including income, parental educational attainment, family structure, neighbourhood conditions and school quality (Eriksen, 2018). Other New Zealand research identifies that students enrolled in high decile schools and also larger schools (often large schools are high decile) perform higher on average than other students (Caygill & Sok, 2008; Yuan, Turner & Irving, 2010; Caygill, Zhao, Hunter and Park, 2021).

As noted in the previous section regarding the factors related to ethnicity-related differences in achievement, there may also be barriers that are specific to the assessment context of the Literacy and Numeracy Standards and while this is discussed further in Section 7.1, one issue that is seen by teachers to be related to socio-economic circumstances is access to personal digital devices and the resulting impact on acquiring digital skills. As the current NCEA change programme aspires to improve equity across the education system, consideration should be given to the insights gained from this evaluation and the view that digital inequity is a barrier which is disproportionately affecting students in low socio-economic communities.

Summary: Insights for results by gender, Year level, ethnicity and decile groupings

The examination of achievement results for different cohorts of students provides insights about differences with regard to gender, Year level, ethnicity and socio-economic circumstances. The significant achievement differences reported for the Literacy and Numeracy assessments are findings that are already well documented in New Zealand educational outcomes data. This includes the following:

- Female students showed marginally higher achievement than male students in Literacy (reading) and significantly higher achievement in Literacy (writing). Males showed marginally higher rates than females in Numeracy.
- The secondary cohort is largely (86%) Year 10 students, and this cohort also had the highest achievement rates. The differences in achievement by Year level are likely to be reflective of the different reasons students from the various years were selected to participate.
- There is considerable variability in achievement rates by ethnicity and decile. Students identifying as Māori and Pasifika achieving below the mean achievement rate for each standard in both assessment events. Students identifying as Asian, European, and MELAA achieved above the mean. The same pattern was evident for students from decile 1 and 2 schools compared with students from decile 3-10 schools.
- Analysis of the available e-asTTle levels by ethnicity and by decile indicate variability in the readiness levels for these cohorts. With Māori and Pacific Peoples, and the lower decile cohorts having more students participating who were below the minimum recommended e-asTTle level. This is likely to be a result of many schools using a whole Year level approach to selecting students to participate in the CAA rather than a readiness approach.
- When the results for students who were below the readiness level are excluded the achievement gaps between ethnicity and decile groupings are significantly reduced, however, the gaps are not eliminated. Other New Zealand research would suggest that these differences that are likely to be influenced by existing inequalities within the education system and socio-economic factors.
- Alongside this there may also be issues or barriers that are specific to the assessment context of the Literacy and Numeracy Standards. The views expressed about possible inequities in the design and accessibility of the CAA are discussed in Section 7.1, but it would seem from the results discussed in this section, that these issues disproportionately impact students according to ethnicity and decile.

Recommendations: Student results by gender, Year level, ethnicity and decile

Relevant recommendations from Report One

1. The breakdown of achievement by ethnicity again highlights the wider inequity of the education system and the importance of maintaining, and potentially increasing, the wider capability building and support to remedy this. NZQA will continue to make further improvement to the assessments, however there is a limit to what can be addressed through assessment without wider change occurring.
2. Understanding more about the significant differences in achievement for low decile schools and tertiary/alternative education organisations is important. The second phase of this evaluation will seek the available e-asTTle data for these sub-groups, and further analysis will better determine whether the variation in results is reflective of the already known differences in achievement or if the CAA design is inequitable.

Additional recommendations for Report Two

3. Recognise that selecting students to participate by Year level cohorts will result in greater proportions of students from low decile schools and who identify as Māori or Pasifika, not being at the appropriate level of readiness and therefore being less likely to achieve the standard.
4. Continue to advocate for and address digital equity, recognising that disproportionate access to digital devices may be a contributing factor to inequitable achievement rates in the Literacy and Numeracy assessments for low decile schools and some Māori and Pasifika students.

6.3 Sub-group results for the Literacy and Numeracy Standards

This section looks more closely at the achievement results for four sub-groups of students who participated in the Literacy and Numeracy assessments, with the results data being presented and discussed for English Language Learners (ELL), students who were afforded Special Assessment Conditions (SACs), Tertiary students, and students from Realm country schools. For each of these sub-groups further qualitative data has been gathered via interviews and focus groups that included teachers and administrators working with these students. The insights gained are reported, providing a greater understanding of the results, contributing factors, and any specific challenges that were identified.

6.3.1 English Language Learners - results and insights

Achievement results for English Language Learners (ELL)

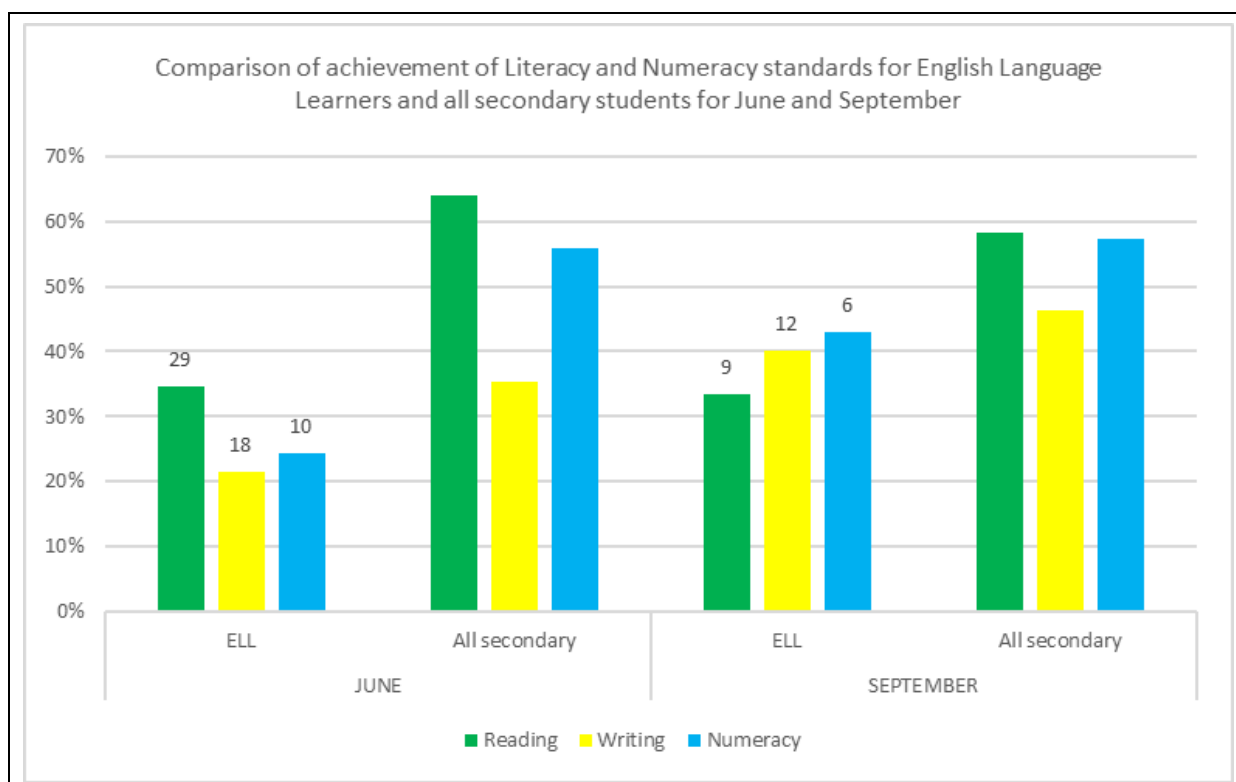
Table 32 below shows the achievement of the sub-group of ELL students for the September assessment events and compares these with the students who participated in the June events.

Table 32: Achievement by standard for ELL students compared with all secondary students - June and September

Standards	JUNE				SEPTEMBER			
	English Lang Learners		All Secondary Achieved (%)	All Secondary Achieved (%)	English Lang Learners		All Secondary Achieved (%)	All Secondary Achieved (%)
Participating (n)	Achieved (n)	Achieved (%)			Participating (n)	Achieved (n)		
Reading	84	29	34.5%	64.0%	27	9	33.3%	58.2%
Writing	84	18	21.4%	35.2%	30	12	40.0%	46.2%
Numeracy	41	10	24.4%	55.9%	14	6	42.9%	57.3%

Chart 27 below shows these comparisons for each Standard and assessment event.

Chart 27: Comparison of Achievement of Literacy and Numeracy CAA for ELL students with all secondary - June and September



Differences in achievement rates between the two events show ELL students were higher for Literacy (writing) and Numeracy in September and Literacy (reading) is very similar.

In both events the achievement rates for ELL are considerably lower than the overall secondary student cohort. In June the greatest difference was in Numeracy with all secondary having a 56% achievement rate vs the ELL rate of 34.5%. In September the greatest difference was in Literacy (reading) with 58.2% for all secondary and 33.3% for ELL. The cohort achievement differences in Literacy (writing) and Numeracy were less in the September event.

The primary observation from this data is that the ELL rate of achievement is lower than the overall secondary student cohort. The differences between the ELL cohort and the secondary cohort are less pronounced in the September event. Given the smaller numbers in the September ELL cohort this could indicate that teachers were paying greater attention to readiness levels than they had in the June assessment.

There is only a very small number of ELL students with available e-asTTle scores who participated in the September event, so this data has not been used. However, the analysis of e-asTTle scores from the larger ELL June cohort⁵¹ revealed the readiness levels of the cohort to be a factor in the different rates of achievement between ELL and the overall secondary cohort. This analysis showed a greater proportion of ELL students, compared to the overall cohort, were not at the recommended readiness level. For example, for 'all secondary students' sitting Numeracy 21% were below Level 4A, but the ELL cohort had 64% below Level 4A.

When the rates are compared for only those students who were 'at or above' the recommended level the achievement gap reduces from ELL having 24.4% achievement and secondary 55.5%, to ELL having a 75% achievement rate⁵² and all secondary having 80%. The data analysis for Literacy (reading) and Literacy (writing) presents a similar picture.

Readiness differences in the ELL cohort appears to have made a contribution to achievement differences, but it is very likely that there are other contributing factors and views about this have been sought from from teachers and MoE staff working in this area and are discussed in the next section.

Insights for English Language Learners

Feedback on the participation of ELL students in the Literacy and Numeracy assessments was gathered by the Migrant, Refugee and International Education Team in the Ministry of Education, as part of a regular meeting they have with schools. The feedback came from five large secondary pilot schools with high numbers of CALD⁵³ students, including high numbers of ESOL⁵⁴ funded students.

The schools described feeling the achievement results for the ELL students were disappointing, and for some students, surprising. The following issues were identified as possible additional challenges that ELL students faced:

Culturally specific contexts

- The task design used contexts that were perceived to be a barrier to many migrants or English Language Learners. Even with a glossary, idiosyncratic New Zealand content was seen to be a barrier. Some teachers felt the contexts were particularly inaccessible for Pacific students. The example of the NZQA English Language Unit Standard and English for Academic Purposes Unit Standard assessments were cited as examples of a less culturally specific approach. Another suggestion was that an alternative literacy test to be used for migrants, former refugees and international students.

⁵¹ ELL participation in June assessment: Literacy (reading) n=84, Literacy (writing) n=84, Numeracy n=41

⁵² Eight ELL students with e-asTTle scores at or above 4A participated in the June Numeracy assessment. Six of these students achieved. There were 14 students below 4A and none of these students achieved.

⁵³ CALD (Culturally and Linguistically Diverse)

⁵⁴ ESOL (English for Speakers of Other Languages)

Too wordy

- The Numeracy assessment was identified as particularly wordy and it was felt it required reading skills beyond foundational literacy. It was recommended that the task design be revised to ensure an appropriate language level and vocabulary⁵⁵.

Digital skills

- The digital aspect of the assessment was seen to be a barrier. This included the digital skills required by students and also technical difficulties that arose.

Readiness Levels

- The recommendation to schools was that Stage 3 on the ELLP⁵⁶ was the appropriate readiness indicator for participating in the Literacy and Numeracy assessments. While this criteria was not consistently applied by schools, those that did consider the ELLP score suggested that Stage 4 is potentially a better indicator of readiness. Other indicators of achievement were seen to be the length of time the student had been living in New Zealand, whether the student had native-English speaking friends, and the connections that the student had outside their language community. One school planned to trial the Cambridge one-hour reading test to determine its appropriateness as a readiness indicator.

Co-requisite

- Teachers expressed concerns about the standards being co-requisites for gaining an NCEA qualification. They said that the co-requisite would negatively impact on the likelihood of many students being able to gain a NCEA qualification. The impact on international students and International Education was predicted to be particularly problematic. Suggestions were made for the NCEA qualification to be 'endorsed' with Literacy and/or Numeracy, but not as a co-requisite.

The issues and feedback received regarding ELL students and the considerations for equity of access are similar to the issues raised for other sub-groups of students that engaged in the Literacy and Numeracy Standards.

6.3.2 Students who were afforded Special Assessment Conditions - results and insights

NZQA gathered data from schools for those students who were afforded Special Assessment Conditions (SAC), for example readers and writers/typists, for the September assessments.

Participation information for students using SAC provisions

Table 33 below shows the numbers of students who participated in the Literacy and Numeracy assessments in September who were afforded SAC provisions. Table 34 also presents information about the subset of students with a reader or a writer entitlement

⁵⁵ Note that there is an implied level of literacy within the Numeracy Unit Standard as it asks students to explain the reasonableness of mathematical and statistical responses to situations.

⁵⁶ ELLP (English Language Learning Progressions) is a support tool which contains matrices.

who had usable e-asTTle scores, reporting numbers who were below, at, or above, the minimum recommended readiness level (4A e-asTTle sub-level).

Table 33: Participation in Literacy and Numeracy CAA for students using SAC provisions - September

Standard	September: participating students using SAC (n)
Reading	168
Writing	155
Numeracy	152

Table 34: e-asTTle levels for students with a reader or a writer entitlement participating in the Literacy and Numeracy CAA - September

Standard	September: participating students with a reader or a writer entitlement						
	Students with an e-asTTle (n)	e-asTTle below 4A		e-asTTle at 4A/5B		e-asTTle above 5B	
	(n)	(n)	(%)	(n)	(%)	(n)	(%)
Reading	87	41	47.1%	38	43.6%	8	9.1%
Writing	28	8	28.5%	17	60.7%	3	10.7%
Numeracy	89	57	64.0%	26	29.2%	6	6.7%

Higher proportions of students with either reader or writer provisions were not at the recommended readiness level when compared to the whole secondary student cohort for each of the CAA.

This is particularly true for Numeracy where 64% of those with reader or writer provisions were below 4A. In contrast, the data reported in Section 6 found that for the whole secondary cohort only 26% of students participating in Numeracy were below 4A. In Literacy (reading) 47.1% of students with SAC were below 4A compared with 21.8% in the overall secondary cohort. In Literacy (writing) the difference was less pronounced, with only 8 percentage points between the two cohorts.

Achievement results for students using SAC provisions

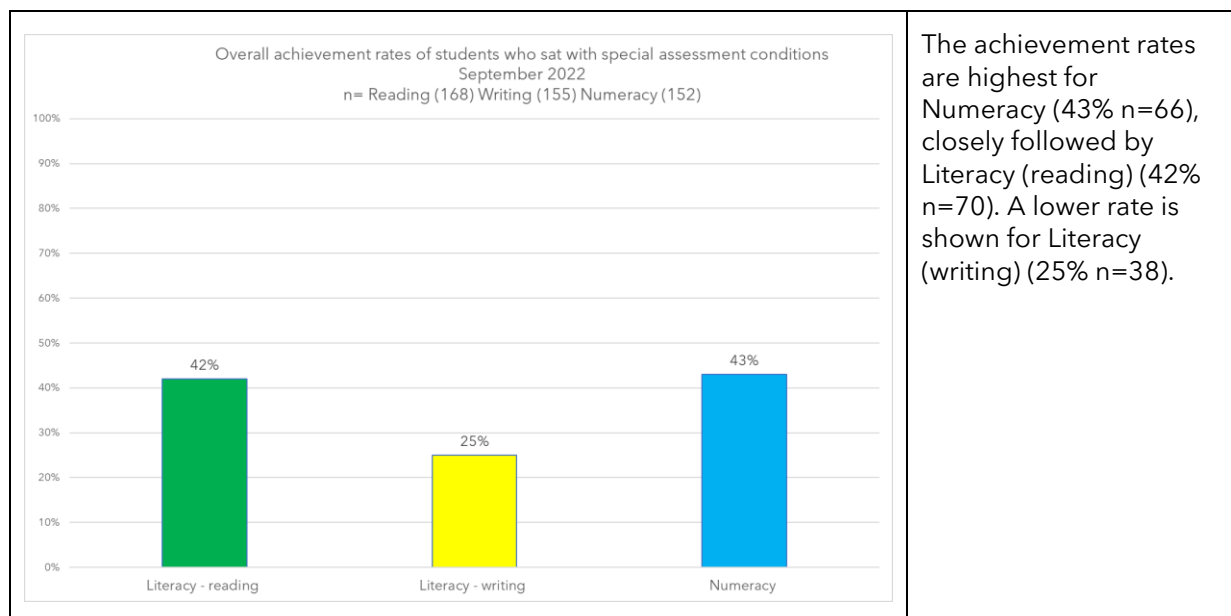
Achievement results for students using SAC provisions are reported in the table below. As another point of reference, the rates of achievement for the full secondary student cohort in the September assessment have also been included.

Table 35: Achievement of Literacy and Numeracy CAA for students using SAC compared with all secondary students - September

Standard	Students using SAC			All secondary students	
	Participated (n)	Achieved (n)	%	Achieved (n)	(%)
Reading	168	70	41.7%	11,006	58.3%
Writing	155	38	24.5%	12,281	46.3%
Numeracy	152	66	43.4%	15,509	57.3%

The achievement rates for students using SAC are presented graphically below in Chart 28.

Chart 28: Achievement rates for Literacy and Numeracy for students using SAC provisions - September



When looking at the achievement rates for students using SAC and comparing them with the overall secondary student cohort there are similar patterns of achievement between the three standards for both cohorts. However, for each standard the achievement rate for the students using SAC is lower, with the largest difference (21.8 percentage points) for Literacy (writing).

Achievement rates for students using SAC by e-asTTle score

It is possible that a contributing factor in the lower rates of achievement for students with SAC is the lower rates of readiness within the cohort. Eliminating the results for students who were not at the recommended curriculum level can give some insight into this, as shown in the table below. However it is important to note that limited conclusions can be drawn from this analysis due to the very small numbers being used.

Table 36 below compares the achievement rates between all students using SAC and the students with e-asTTle scores of 4A and above who used SAC. It also shows the rates for the overall secondary cohort with e-asTTle scores 4A and above.

Table 36: Achievement of Literacy and Numeracy for students using SAC who were 'at or above' e-asTTle level 4A compared with all secondary students 'at or above' e-asTTle level 4A - September

Standard	September: All students using SAC			September: students e-asTTle 4A and above			Secondary students Achieved (%)
	Participated (n)	Achieved (n)	%	Students using SAC Participated (n)	Achieved (n)	%	
Reading	168	70	41.7%	44	33	75.0%	80.5%
Writing	155	38	24.5%	20	12	60.0%	74.3%
Numeracy	152	66	43.4%	32	22	68.7%	82.9%

Table 37: Achievement of Literacy and Numeracy for all secondary students compared with all secondary students at or above e-asTTle level 4A

Standard	Overall 2022: all secondary students			Overall 2022: secondary students (e-asTTle 4A and above)		
	Participated (n)	Achieved (n)	Achieved (%)	Participated (n)	Achieved (n)	Achieved (%)
Reading	18,420	12,388	67.3%	10,229	8,827	86.3%
Writing	17,583	8,752	49.8%	3,526	2,770	78.5%
Numeracy	25,535	16,371	64.1%	11,107	9,671	87.1%

As expected, students at or above the recommended curriculum level had higher rates of achievement than those who were below the level. This was true for all standards and the differences between the two groups of students were similar for Literacy (reading) and Literacy (writing) but slightly less for Numeracy.

Looking only at students at 4A and above and for all secondary 4A and above, the gap between the two cohorts did not really decrease for Literacy (reading) and Numeracy. However, the gap did decrease for Literacy (writing); for students with all e-asTTle scores the difference between students using SAC and all secondary students is 21.8 percentage points. When looking only at students 4A and above the difference between cohorts is reduced to 14.2 percentage points.

While this finding seems to suggest that Literacy (writing) was the standard most affected by the differences in readiness between the students with SAC and the overall secondary group, consideration should be given to the very low numbers involved in the analysis.

The key findings from the analysis of participation and achievement data for the sub-group of students with SAC are:

- There were a greater proportion of students who did not meet the minimum recommended readiness level than the full cohort of secondary students from the September event. This was particularly true for Numeracy and Literacy (reading).
- There was a similar pattern of achievement between the three CAA as the September secondary cohort, with the achievement rates for Literacy (reading) and Numeracy being within one percentage point of each other and the rate for Literacy (writing) having the lowest rate.
- They had lower rates of achievement than the overall cohort in all three assessments.

6.3.3 Teacher insights about Special Assessment Conditions

In the September survey schools and organisations were asked to comment on how they found the process for determining which students entering the September Literacy and/or Numeracy Assessment activities would have Special Assessment Conditions (SAC). As context, the process for schools accessing Special Assessment Conditions for students participating in the Literacy and Numeracy assessments was that any learner could access SAC if identified by the school as necessary.

There were 168 schools and organisations who responded and provided 197 separate responses to this survey question. These survey responses were coded in three main ways: those who used organised systems and processes within the school; those who found those processes difficult; and other.

One hundred and four (53%) of participants had organised systems and processes for identifying and supporting their special needs students. This figure could be higher as some responses did not describe their school organisation of SAC in any detail. Forty-seven responses described their school or organisation-based staff responsible for special assessment conditions as either from a SENCO - Special Assessment Co-Ordinator or from a Learning Support co-ordinator or similar. Twenty-three pilot participants referred to having a SENCO list or register of students with special needs, which they used to help in their decision to enter students who needed learning support. In addition, twenty teachers were described as taking part in the process of supporting the identification of students with learning support needs through data and other evidence. This included classroom teachers and heads of department. One lead teacher said confidently *"our person in charge of this sorts this for us - so we did not need to worry too much."*

Most schools and organisations described using their existing school processes although at times it was difficult to tell because of a lack of detail or explanation. As one participant succinctly said: *"we based it on the data we already identified for those students who we thought needed and/or qualified for SAC."* A lead teacher explained that *"for reading, this was pretty straightforward. Students had already been identified from previous years and had the necessary testing to get the required support."* Another school also followed a similar process and gave those students SAC *"if they have already been through a process including medical and diagnostic information."* These pilot schools used existing processes for special needs students that they used for level NCEA 1-3 and *"followed the process we use to identify students for SAC in year 11 and above. It was no easier or harder."* It was clear that these schools and organisations had clear school processes about SAC and followed them.

Forty-eight pilot participants did not find the process as straightforward and were critical of several aspects of the SAC process. One issue that caused some schools and organisations concern was that they would have liked to enter more students with special assessment conditions as a formal application was not required. Twelve pilot participants commented on the time it took to complete the evaluation of these special assessment conditions for new students, which was described by one respondent as *"a massive task and very complicated."*

Note that schools were not actually required to complete SACs application for Literacy/Numeracy CAAs and most schools had systems in place involving a SENCO so there were no issues. However, from various comments in the survey there were schools who had different understandings /misunderstandings of the process or what different students were entitled to. Some schools submitted an application because they already had a completed SAC application in Year 9/10 as part of their school processes and some schools did not understand what they had to do. Schools reported the information from NZQA came late and that NZQA/MoE gave contradictory information in some cases.

Two schools admitted that they hadn't investigated SAC "enough; *"It was easy to identify students that needed SAC, but unclear until very close to the assessment about what assistance they could receive."* For a small number of schools there were logistical issues raised as contributing to why some students were not entered for the CAAs with special assessment conditions. One participant explained they had not used special conditions for writing, as they couldn't staff this on the assessment day and that *"that about 20 students who will most likely use a writer for NCEA did not have the opportunity. We will have to do this next time in order to make it as equitable as possible."* Another respondent explained that it was difficult to find enough workspaces given the large number of students with learning support needs who sat the assessments.

Sixteen responses described finding clear information from NZQA problematic. Six other participants agreed there was a lack of clarity about SAC for the Literacy and Numeracy CAAs but provided no detail. In some of the responses from these participants the major issue identified was understanding the requirements for readers and writers, which appeared to be different from the processes used to identify student eligibility for SAC. One participant found it:

Incredibly frustrating and difficult. While this is still in the pilot stage, it would be better to have more specific guidance on what kind of support students are allowed...When we asked for further guidance or support, we were sent different generalised pieces of information that told us we could choose.

Understanding the rules for readers and writers specifically for Literacy and Numeracy caused some confusion for twenty-two participants. Information was sometimes described as inconsistent or unclear. For one school *"our SENCO contacted NZQA and got different messages from different people."*

Another participant agreed that the advice from MoE/NZQA lacked clarity. This teacher said:

We were and are still very much in the dark which test allows for Reader and/or Writer. The first round we wanted everyone to give it a go without support, including SAC students. This was also done this way because logistically it was impossible to offer separate accommodation and other SAC facilities at such short notice and for the entire Year 10 cohort. Clear explanations on what kind of SAC assistance is allowed for which tests are needed. For example: Numeracy: Only Reading. ...

Another participant warned that a consequence of different interpretations of the use of special conditions is the scope for inconsistency and unfairness if schools are left to apply it themselves, while another participant seemed unsure but *"hoped that across the board, it was a level playing field in terms of students who would be entitled to SAC."*

The issues for one school who wrote a lengthy section about special needs conditions appears to differ from the interpretations of some schools' understandings of SAC. The survey participant found that some of their students sitting the Literacy CAAs had some of their special assessment conditions denied and there appeared to be no definitive answer whether a student was entitled to a reader/writer or *"would be allowed a reading for the reading standard, or a writer for a writing standard."* The teacher was told by the SAC team

that all conditions should be made available but that the ultimate decision rested with schools." The school's Principal's Nominee took the view that a reader could not be used in the Literacy reading activity and a writer could only be used in the Literacy writing activity if they had every word spelt out for them.

The category 'other' includes forty-four responses to the survey question. Nineteen schools and organisations did not enter any students with special assessment conditions. Six pilot participants wrote that the question was not applicable without offering any explanation, while six schools said that they did not have SAC students to enter. One school did not use SAC as *"we are struggling with fitting this in, the process and online access issues etc - we will get to this in time."* Another respondent admitted that they did not have enough *"information to make this decision. Part of running the trial was to find out what are the best tools to make that decision,"* while another participant said that they didn't know there was a process for determining SAC students for numeracy only, and *"we decided it was in the 'too 'hard basket' for this year of the pilot."* School exams and finding people to help are two reasons why one school did not offer SAC.

While most schools and organisations appeared to have understood and applied special assessment conditions for those students with learning needs, some participants did not have clarity around processes or understood special assessment conditions as they applied to Literacy and or Numeracy assessments. While some schools say they did not have time to follow processes it is apparent that these schools also found the rules confusing and inconsistent.

Summary: Special Assessment Conditions

Achievement results for students who were afforded Special Assessment Conditions (SAC) provisions were only available for the September CAAs. The results show that this group had significantly lower rates of achievement than the overall secondary cohort, with the largest difference being for Literacy (writing) with a gap of 21.8 percentage points.

It was also identified that this group had greater proportions of students who were below the recommended readiness level, particularly for Literacy (reading) and Numeracy. The rates showed considerable improvement when readiness was accounted for but were still below the overall achievement rate.

Key findings from schools about the SACs process from the end-of-year survey were:

- Most schools and organisations have clear school-wide processes for the identification of students with learning needs. Most participants understood their processes and applied special assessment conditions to those students with learning needs. SENCOs or Learning Needs Co-ordinators play a central role in supporting the teachers and students with what can be a complex and time-consuming process.
- Some participants did not have good clarity around processes or an understanding of SACs in the context of the Literacy and Numeracy assessments. While some schools reported not having time to follow processes it is apparent that some also found the rules confusing and inconsistent. A small number of schools reported conflicting advice from NZQA, particularly around the rules for appointing readers and writers.
- A small number of schools reported not entering students with learning needs at all, or if they did it was without teacher aide support because of difficulties finding enough teacher aides or workspaces. A few schools and organisations admitted they would be looking at the issue of SAC before the next assessment event.

Recommendations: Special Assessment Conditions

1. Clear written information that summarises the SAC processes needs to be available for all schools and organisation early in the school year. An 'understand/know/do' document would assist in developing staff understanding of SACs and provide enough time for teachers to assess whether the students are able to meet the Literacy and Numeracy Standards with support.

6.3.4 Tertiary/Alternative Education/Te Kura - results and insights

This section firstly describes the achievement results for participating students enrolled with the tertiary providers involved in the pilot. This is followed by a discussion about the views and insights shared by the providers via the end-of-year survey and one-to-one interviews. The section ends with a description of the challenges that are unique to Te Kura's distance education setting.

Tertiary participation

Seven schools/organisations who participated in the 2022 pilot were categorised as tertiary or alternative education providers. In the September assessment event six tertiary providers and three Alternative Education⁵⁷ providers entered students into the CAAs. The numbers of participating students enrolled with tertiary providers is detailed in Table 38.

There are also some secondary schools within the pilot that work with similar learners. This includes two schools that have a teen parent unit, Te Aho o Te Kura Pounamu (Te Kura)⁵⁸, and a school that provides education for young people in the care of Oranga Tamariki (those in youth justice/care and protection residential facilities and community campuses)⁵⁹.

Results data for students in teen parent units, Alternative Education, and Te Kura is not identifiable due to being included in the overall secondary cohort. However, the perspectives of staff working in these setting have been sought alongside those of Tertiary Providers.

There was either no or limited e-asTTle data for students in Tertiary education. This means it has not been possible to determine or compare levels of readiness for this cohort.

Tertiary Results

The two tables below present the achievement results for both the secondary students and tertiary students that participated in the pilot. Table 38 shows results for the June and the September event, while Table 39 details the overall results for both events (excluding the June result for students resitting in September⁶⁰).

⁵⁷ Current stats were not available but in 2011 it was reported that approximately 3500 secondary aged students participate in Alternative Education each year (ERO, 2011).

⁵⁸ Nearly 6000 secondary aged students are enrolled at Te Kura (Education Counts website <https://www.educationcounts.govt.nz/find-school/school/population/age?district=®ion=&school=498>) Te Kura plays a significant role in the education of at-risk and disengaged learners. Education agencies increasingly use Te Kura as a place of enrolment for non-enrolled and high needs learners.

⁵⁹ This school did not enter any students in the Literacy/Numeracy CAA due to no students being 'ready'.

⁶⁰ In September a greater proportion of secondary students were re-sitting assessments (Literacy (reading) 17%, Literacy (writing) 29%, Numeracy 22%) than tertiary students, where only 1 student re-sat a numeracy assessment.

Table 38: Comparison of tertiary and secondary student achievement for Literacy and Numeracy CAA - June and September

Provider type	Standard	June Results			September Results		
		Participating students	Achieved (n)	Achieved (%)	Participating students	Achieved (n)	Achieved (%)
Secondary	Reading	9,386	6,016	64.0%	11,022	6,418	58.2%
	Writing	8,855	3,029	34.2%	12,299	5,688	46.2%
	Numeracy	13,441	7,512	55.9%	15,526	8,899	57.3%
Tertiary	Reading	40	19	47.5%	17	6	35.4%
	Writing	33	4	12.1%	13	4	30.8%
	Numeracy	39	13	33.3%	21	6	28.6%

Table 39: Comparison of tertiary and secondary student achievement for Literacy and Numeracy CAA - overall 2022

Provider type	Standard	Overall 2022	Overall 2022 Results	
		Participating students (n)	Achieved (n)	Achieved (%)
Secondary	Reading	18,420	12,388	67.3%
	Writing	17,583	8,752	49.8%
	Numeracy	25,535	16,371	64.1%
Tertiary	Reading	57	25	43.9%
	Writing	46	8	17.4%
	Numeracy	59	21	35.6%

Approximately half the number of tertiary students participated in the September assessment event compared to the June event. Achievement rates were higher in September for Literacy (writing) and lower for Literacy (reading) and Numeracy.

The comparison of achievement data for the June and September assessment events shows for the September event both secondary and tertiary students had lower rates of achievement in the Literacy (reading) assessment but higher rates in Literacy (writing). Secondary students performed better in Numeracy in the September event, while tertiary students performed worse. However, the small numbers of participating tertiary students and the lack of readiness data (e-asTTle) makes it difficult to understand any patterns in the data and reliable conclusions cannot be drawn about these differences.

The achievement rates for Tertiary students in both events are lower than the rates for the secondary student cohort. While confidence in the data is relatively low due to sample size, the discussion in the next section provides some insight into various difficulties faced by students in the tertiary/alternative sector participating in these assessments.

Insights

In the first evaluation report for the 2022 pilot of the Literacy and Numeracy Standards it was reported that learners attending Tertiary courses and Alternative Education programmes were likely to be negatively impacted by the introduction of these assessments. Mid-year survey feedback from the staff working in these settings included concerns about the assessment approach, the timing of the assessments and wider equity issues within the sector that affect staff being able to adequately prepare

learners for these assessments. The implications of the co-requisite aspect of these standards were also seen to compound the already concerning educational, social, and vocational outcomes for many of these students.

This second phase of the evaluation seeks to gain a deeper understanding of the issues and implications for this sector through conducting interviews with Tertiary providers (n=2) and Alternative Education providers (n=2). A focus group was also conducted with staff from Te Kura (n=5).

Challenges for students in tertiary and alternative education

The Tertiary and Alternative Education providers shared common views of the new Literacy and Numeracy Standards and the potential impact they will have on levels of achievement and engagement for their learners. While there was recognition of the intent behind the introduction of the new standards, a strong view was expressed that the approach being used created barriers and inequities for their students.

I can see that there is a need for consistency across the board but some more forethought in terms of the implications in that tertiary space, you know especially with the shorter durations of time that we have these young people, the needs that they come to us with, you know the reasons they've disengaged from mainstream education. It's understanding how this one-size-fits-all approach may impact on these already disenfranchised young people.

The following challenges related to equitable access were seen to be particularly relevant to their learning context:

The limited frequency of the assessment events

While it is proposed that the number of assessment events will be increased from two to three in a year, it was still felt that the limited opportunities to sit the assessment will be a significant barrier for students in tertiary settings. For example, a Youth Guarantee course runs for 20 weeks.

They could miss every single assessment task because of their enrolment dates...or they may be able to sit an assessment right when they start their qualification...but we're not in a position to know whether they're fully ready. They've only been with us for a week.

Basically, students in tertiary are extremely unlikely to be able to complete their NCEA because those assessments are being slotted in only at certain times of the year.

The lack of flexibility around when students could participate in the assessments was also seen to be problematic in the Alternative Education setting, where students can begin attending at any time over the year and have irregular attendance and transience. In teen-parent units other issues related to childcare were also seen to impact on students having good opportunities to participate in the assessment.

Our students specifically do internal assessments because of this. Even our high achievers don't sit externals because of the lack of flexibility. Particularly if you are breastfeeding or pregnant.

Not having the same opportunities to re-sit the assessment

The limited number of assessment events in a year was seen to also mean that tertiary students completing short-term courses would not have the same opportunities to re-sit the assessment.

If they're lucky enough to sit the assessment, if they fail that assessment task...they've finished their twenty-week qualification and they exit out into the workplace...and they don't get that opportunity [to re-sit] like a traditional mainstream school learner might have.

Let's not forget our learners are not going to get another chance. You don't pass this time around, that's it, you're not getting your NCEA.

What opportunity do we have as opposed to a school? They've really got the whole five years of high school really to become ready.

The 'exam style' assessment approach

The assessment approach, which was perceived to be like an exam, was criticised for being seen as unfamiliar to many learners, unnecessarily long, and not a good fit for learners in a Youth Guarantee or Alternative Education setting. A preference was expressed for more relevant and authentic methods of assessment.

We have building and construction, retail, hospitality, and we're able to embed numeracy and contextualise it towards a qualification that they're working towards naturally. There is so much numeracy that's coming out of that, and we're able to capture evidence through them doing natural tasks.

The new standards were also described as an 'all or nothing' approach, which was potentially intimidating. Previously learners may have been able to make a start and grow in confidence to take on more from there.

There were definitely many learners who only achieved some of the literacy or numeracy unit standards, but a positive for this was it still recognised students for the skills and the learning that they did have.

One tertiary provider reflected that one of the reasons a portfolio of evidence approach was originally brought in was to meet the needs of diverse learners.

They're proposing a one-size-fits-all approach and we know full well that that doesn't work for a number of the young people that we're working with. They're in an environment like ours because their traditional mainstream schooling hasn't worked, that exam-based kind of method hasn't worked. We were quite excited when naturally occurring evidence came around because it enabled us to contextualise it.

They have a one-time opportunity to sit the exam, whereas you know if they have an off day, if something was to trigger them in the morning. But if they're working towards [unit standards] that wouldn't necessarily be a barrier to them continuing the following day, or the following week, picking up where they left off.

The exam approach was also seen to create increased anxiety and stress for students who are 'second-chance' learners and who often come with a range of challenges, which often include mental health issues.

I was just thinking one of my girls that did the pilot, you know she's very bright. Very onto it, works very fast, and she didn't complete the assessments because her anxiety was just too overwhelming, and she couldn't handle it.

They're all second-chance learners for a reason. In those reasons, anxiety is huge so going to students with anxiety 'sit an exam online'?...they are not happy when it comes to doing formal type assessments like that.

The lack of funding provision to support the provision of special assessment conditions (SAC).

Along with resourcing for SAC, other resourcing related issues were raised as contributors to inequity. This includes differences in professional development for teachers and tutors working in these settings and no, or limited, access to advisors, learning support and other resources.

Challenges for students at Te Kura

There are approximately 6000 secondary aged students enrolled at Te Kura and many of these students are priority learners. A total of 167 students participated in the 2022 pilot and a small number of those participating were prison-based learners.

Similar to the Tertiary and Alternative Education providers, concerns were raised by Te Kura about the exam-style of assessment being a barrier for many of their students,

We have an awful lot of students on our role at a senior level. Very few of them do externals you know and there's a reason for that.

Because of the nature of our ākonga there are such a large number, in comparison to other cohorts, who just physically would not be able to go along to an assessment, which of course is an aspect that we are very concerned about.

They also discussed the limitations created by the number of assessment events being held in a year.

I think it's going to have a huge impact on our young adults that are with us often just wanting to finish off level one so that they can go to a tertiary course or wanting to get into Trades Academy...so if they fail in the September CAA there won't be another opportunity...they just want to get literacy and numeracy.

As distance education providers, there were other challenges reported that are unique to the Te Kura setting and these are summarised below:

Logistics

The new Literacy and Numeracy Standards have required the establishment of new systems and logistics and this was seen to be much more complicated than for other external NCEA assessments. For the Literacy and Numeracy CAA venues and supervisors

needed to be arranged for students. For some particularly remote students NZQA approved home-based supervision.

The following logistical issues were raised:

- Access to suitable venues (seismically approved)
- Some students did not have access to laptops that they could take to the venue (they usually completed work on a desktop computer)
- In some areas there were Wi-Fi difficulties
- Finding and organising the necessary supervisors

One impact of these logistical issues is that students had to sit all three of the CAA in one day as arranging supervisors and venues for three different days was not feasible. The financial implications were also highlighted, with the additional costs of venues, supervisors, or staff having to travel to students' homes.

There are issues that are currently being looked at and these include using portable Wi-Fi devices to improve access, and how Te Kura students living overseas will be able to access the assessment. The need for Te Kura to employ someone fulltime to organise and manage the implementation of the CAAs was also suggested as something that may be necessary.

Putting the logistical and organisational challenges aside, there was still an overall view that the approach for the Literacy and Numeracy assessments needs to have greater flexibility to cater for the diversity of students and learning environments.

I would like there to potentially be a back-up for ākonga for whom this form of assessment isn't ideal...I just think there needs to be an amount of flexibility to deal with the kinds of ākonga we have in Aotearoa, which are diverse...so some sort of plurality of assessment would be a strengthening of the process and we can still maintain the rigor that we're requiring.

Suggestions for change

Various suggestions were made for changes that could be made to address some of the inequities and access issues to better meet the needs of students in Tertiary, Alternative Education and distance learning settings.

- Provide the option for a portfolio of work to be submitted.
- Increase the frequency of the assessment events.
- Make the assessments available in the same way as the adult Literacy and Numeracy online assessment tool which can be accessed at any time for any student.
- Provide paper-based versions of the assessment, or paper-based copies of the questions, to make it more accessible for some students.
- Reduce the length of the assessment.

6.3.5 Realm - results and insights

Two realm countries, Niue and Cook Islands, had schools participating in the pilot of the Literacy and Numeracy Standards. In the first report the results for students from Realm countries were significantly lower than the overall cohort. In the second phase of the evaluation further insights have been gathered to gain an understanding of the barriers faced by schools and students in Realm countries to enable equitable access to the Literacy and Numeracy Standards.

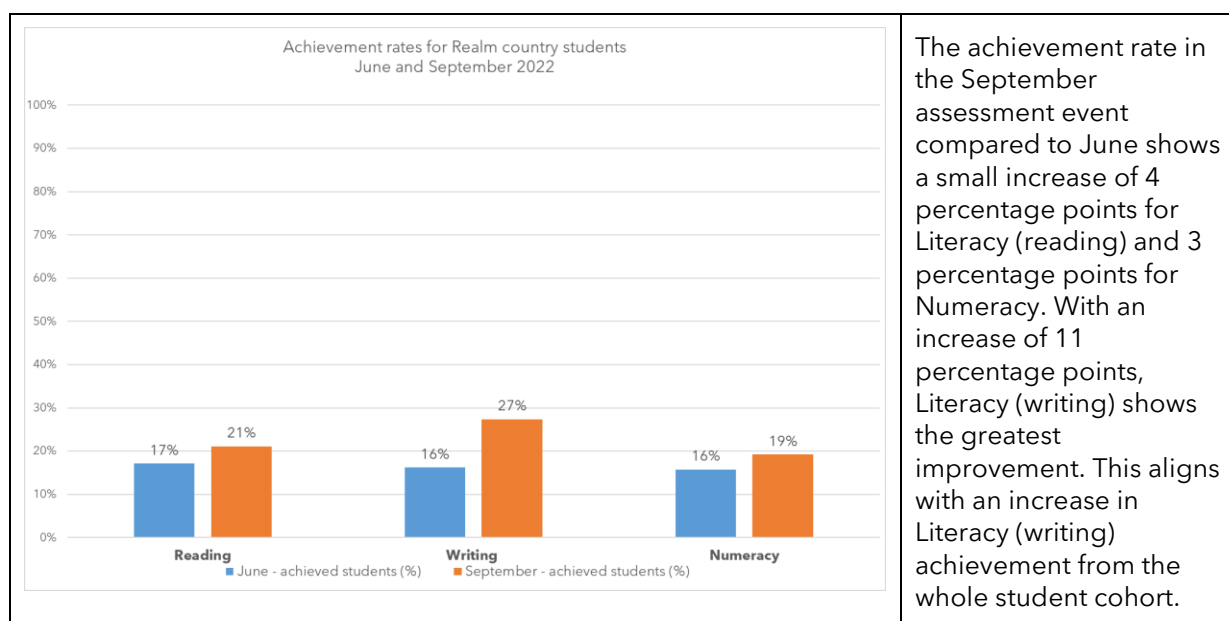
Achievement results for students from the Realm Countries

Table 40 shows achievement for the sub-group of students from Realm countries for both the June and September assessment events. This data is then presented in Chart 29.

Table 40: Achievement of Literacy and Numeracy CAA for students from Realm countries for June and September

Standard	June: Realm countries			September: Realm countries		
	Participated (n)	Achieved (n)	%	Participated (n)	Achieved (n)	(%)
Reading	234	40	17.1%	180	38	21.4%
Writing	235	38	16.2%	179	49	27.4%
Numeracy	240	41	17.1%	120	23	19.2%

Chart 29: Achievement of Literacy and Numeracy CAA for students from Realm countries for June and September



The September cohort includes students participating for the first time and students re-sitting the assessment due to non-achievement in the June assessment. From the June cohort a relatively large number of students sat again in September (60% for both Literacy assessments and 41% for Numeracy). This means that the September cohort is mostly made up of 're-sitting' students (78% for both Literacy assessments and 83% for Numeracy).

Table 41 below shows the achievement results for September repeating students. For both Literacy standards the rates of achievement are slightly lower than the rates for the full September cohort. The Numeracy result is one percentage point higher.

Table 41: Achievement of Literacy and Numeracy CAA for repeating students from Realm countries - September

Standard	Realm country repeating students - Sept		
	Participated (n)	Achieved (n)	%
Reading	142	25	17.6%
Writing	142	32	22.5%
Numeracy	99	20	20.2%

While the achievement results have shown some improvements between the September event and the June event, the results are still significantly lower than the cohort of all secondary students. Table 42 presents the comparison of the overall 2022 achievement rates for all secondary students with the overall 2022 rates for students from Realm countries.

Table 42: Comparison of Realm country and secondary student achievement of Literacy and Numeracy CAA - overall 2022

Standard	Participated (n)	Overall 2022		All secondary students Achieved (%)
		Realm countries (n)	Achieved %	
Reading	275	80	29.1%	67.3%
Writing	274	86	31.4%	49.8%
Numeracy	319	83	26.0%	64.1%

A range of issues are seen to contribute to the lower achievement rates for students in Realm countries and these are discussed in the following section. One factor which has been looked at for other sub-groups in the pilot is whether the sub-group students have similar levels of readiness to the overall cohort. For students from Realm countries this analysis is not able to be carried out due to e-asTTle data not being available⁶¹. Nearly 10% (99 out of 868 entries) of the Realm country students for overall 2022 were in Year 9, which is slightly higher than 6.6% Year 9s for all participating secondary students (including Realm).

Insights for students from Realm countries

Insights about the participation of students from Realm countries (Cook Islands and Niue) were gathered through face-to-face hui and interviews facilitated by a Ministry of Education staff member (Secondary and Tertiary Curriculum Team) who works closely with Realm schools. An interview with the Ministry staff member was conducted by Evaluation Associates | He Huinga Kākākura for the purposes of this evaluation.

⁶¹ The e-asTTle tool is not currently used consistently by schools in Realm countries.

There was firstly recognition that the overall changes⁶² for NCEA were being viewed positively by the Realm schools, but that the challenges had been significant.

It's been a real positive attitude from those communities, school leaders and the Ministry of Education, and teachers. They see the opportunity and what's trying to be done and they've really put a big investment of their time and their effort into the new approach. But the pilots have really taken their toll...on the wellbeing of staff and students...there have been aspects of the pilot that haven't been good enough.

These challenges are discussed below and highlight a range of barriers that contribute to a lack of equitability for students in Realm countries.

Digital challenges

The 'digital first' approach was seen to be particularly problematic, and the issues included wi-fi connectivity, access to devices and also the digital skills of students. Wi-fi connectivity was an issue for both Niue and Rarotonga but was particularly problematic in the outer Cook Islands.

Paper-based assessments were available as an option, but schools wanted to trial the digital assessment space.

You shouldn't need to be cautioned that hey, this might not work. And if it doesn't work, then you're not going to be able to flip back to the paper option and that there's a real chance that we'll actually lose a whole lot of student's work...these are some of the realities that shouldn't be a barrier.

The connectivity issue was seen to be so problematic that it was suggested that paper options be retained until that is addressed.

The limited access to devices was another challenge and this also impacted on the digital skills that students had.

It throws up a whole lot of challenges that unfairly impact and impinge on student's ... it's not normal to be working digitally so they don't have...from typing skills to the familiarity of interaction with the things like video and audio.

Assessment design

Another issue raised was regarding the design of the assessments, particularly whether the contexts used were too unfamiliar for Realm students. It was suggested that "there needs to be an explicit undertaking of review by people who understand our Pacific Realm context to really put a lens over the assessments...for a context check."

The Numeracy assessment was seen to require unnecessarily high Literacy levels from students and suggestions were also made for the numeracy assessment to be provided in the student's first language.

⁶² Schools in Realm countries are also involved in some of the pilots for the revised NCEA Level 1 Achievement Standards.

The levelling of the assessments was discussed more generally, with concerns about whether the standards for readability and comprehension were in fact too high for late Level 4 and early level 5 of the NZC.

In a more general sense, differences in world views were also raised.

Potentially there are also differences in Realm nations' world views of what literacy and numeracy is and understanding and incorporating these differences was seen to be important.

Determining student readiness

Identifying whether students were at the recommended curriculum level to participate in the assessment was seen to be another barrier for some schools, and suggestions were made for improving access to e-asTTle and other readiness tools.

Implications of co-requisite

The Literacy and Numeracy Standards being a co-requisite for NCEA was seen as particularly concerning. In Realm countries most students are learners of English as a second language, and some, particularly in the outer islands do not begin learning until Year 4 or some as late as Year 6. With an English literacy starting point that is significantly different to most New Zealand students it was seen that Realm students are disadvantaged, and the implications of a co-requisite approach would therefore be greater *"Our students in the Realm will be the ones that are most adversely impacted on."*

A potential tension for Realm schools was identified, with wanting to increase the focus on numeracy and English literacy but the risk of this coming at the expense of other priorities around their own language and culture.

Impact on well-being

The impact on wellbeing for both staff and students were also highlighted. The difficulties and frustrations regarding delivery were reported to have negatively impacted staff, with their enthusiasm for the pilot waning over the year – particularly when the student results were received. The disappointment in the achievement results were mentioned as a particular issue.

It's battering. We had kids that were disillusioned. We've had examples of mental well-being really being impacted...It's high stakes for them... It's been massive and heart breaking.

Supports for the Pilot

While there were some positive aspects of the way the MoE had supported the pilot, having support options limited to on-line opportunities was negatively impacted by the connectivity issues. Accessing and navigating NZQA's Te Aka SharePoint platform was particularly difficult. There were requests for further opportunities to be able to *"discuss, to ask and answer questions across those schools and teachers that are involved in the pilots to build clarity and build some capability, but you're limited."*

With the additional challenges being faced by the Realm countries the level of support was not adequate *"a support system that's been undercooked for their context'.*

The issues and challenges expressed by the Realm schools who had participated in the pilot were accompanied by suggestions that an improved support model be provided

both in the short-term and the long-term. Strategies and plans to support the transition, that are appropriate for this setting, were seen to include:

- Ensuring a strong and reciprocal collaborative relationship between the New Zealand Ministry of Education and NZQA and those ministries in the Realm countries.
- Retaining a paper-based assessment option
- For schools that choose to use the digital assessment, a bespoke approach to wrapping supports around them (e.g. training).
- Provide an alternative to the CAA for attaining the Literacy and Numeracy Standards. This could include a portfolio option or using the existing unit standards.
- Appropriate professional learning to increase understanding for the technical aspects of the process (e.g. Assessment Master, supervision).
- Appropriate professional learning on the teaching, learning and assessment pedagogy that supports effective programme development.
- Appropriate professional learning for identifying student readiness to undertake the assessments.

Summary: Achievement results for pilot sub-groups

This section has discussed the results for four different sub-groups of students; English Language Learners, students using Special Assessment Conditions, students attending Tertiary/Alternative Education, and students from Realm countries. The examination of achievement results for different cohorts of students provides insights into the equitability of the wider system, and potentially the standards themselves. The key findings are:

- The rates of achievement for all four sub-groups are significantly lower than the overall group of secondary students (although the very small numbers in some groups mean it is not possible to draw meaningful conclusions).
- Data on e-asTTle levels was very minimal so it is not possible to understand whether the sub-groups had the same levels of readiness as the overall secondary cohort.
- *English Language Learners*: specific barriers and challenges identified included the literacy levels required to understand the questions (particularly in the Numeracy CAA), culturally specific contexts, and digital access and skills. Concerns were also expressed about the implications for ELL students with the standards being co-requisites.
- *Students afforded SAC provisions*: there was e-asTTle data for some students in this group which showed a greater proportion of students were below the recommended readiness level, particularly for Literacy (reading) and Numeracy. Achievement rates showed considerable improvement when readiness was accounted for, but they were still below all secondary achievement rate. Survey feedback suggests many schools had effective systems for identifying students for SAC. A small number of schools experienced confusion about the processes. A number of logistical difficulties associated with SACs exist.
- *Students enrolled in Tertiary, Alternative Education and Te Kura*: feedback highlighted the significant barriers that students in these settings face to gain an NCEA qualification, and that the proposed approach for the Literacy and Numeracy Standards will create additional challenge. Concerns were also raised about the implications for tertiary and Alternative Education students with the standards being co-requisites.
- *Students in Realm countries*: A range of issues were identified for schools in Realm countries working to implement these standards and these included major digital challenges, the literacy levels required to understand the questions (particularly in the Numeracy CAA), and the contexts. Concerns were also raised about the implications of the standards being co-requisites.

Through interviews and focus groups some common themes surfaced that were related to accessibility and assessment design for the Literacy and Numeracy assessments. These were:

- Barriers created by the digital/on-line approach. This included connectivity issues, equity of access to devices, and students' lower levels of experience with devices and digital skills. This was seen to be strongly related to socio-economic circumstances.
- Issues with the design of questions mainly focused on the level of literacy required to access/understand the question (particularly in the Numeracy Standard) and

the relevance/reliability of some contexts.

- The limited frequency of the assessment events was seen to particularly impact access for students who are not within a secondary school setting.
- The 'exam style' assessment approach was experienced by many students as stressful.
- The implications of the standards being co-requisites were seen to be significant - there was a clear view that this will result in fewer 'priority' learners achieving an NCEA qualification.

The sub-groups that have been the focus in this section represent students who are already identified as not experiencing the same likelihood of educational success and/or wellbeing as other groups within the New Zealand education system. The addition of the Literacy and Numeracy Unit Standards was seen by those working with these students to be 'high stakes' and a change that will disproportionately and negatively impact them.

Recommendations: Sub-group results and insights

Relevant recommendations from Report One

1. Understanding more about the significant differences in achievement for low decile schools and tertiary/alternative education organisations is important. The second phase of this evaluation will seek the available e-asTTle data for these sub-groups, and further analysis will better determine whether the variation in results is reflective of the already known differences in achievement or if the CAA design is inequitable.

Additional recommendations for Report Two

2. Recognise and resolve the balance of creating question contexts that are culturally inclusive of New Zealand and also Māori and Pasifika students versus culturally 'neutral' content that does not create barriers for migrants, English Language Learners and students from Realm countries.
3. Ensure the literacy requirements to access the assessment tasks are at the appropriate level.
4. Review the recommendation regarding Stage 3 on the ELLP being an appropriate readiness indicator for participating in the Literacy and Numeracy assessments, in light of the suggestion that Stage 4 is potentially a better indicator. If appropriate this could be included in the advice and guidance to schools and organisations for determining readiness.
5. Seek further understanding of the implications for the Literacy and Numeracy Standards being co-requisites and identify the aspects of implementing the assessments that are impacting on attainment.
6. The proposed administration of the CAA three times yearly appears to limit opportunities for some students due to the short duration of many tertiary courses and students who enrol with Te Kura specifically to gain the Literacy and Numeracy Unit Standards. Creating additional options for such students to access the assessments (opportunities to both sit and re-sit) should be considered. This could also avoid Te Kura students needing to sit three assessments in one day.
7. Communication and guidance to schools/organisations should emphasise the flexibility in the CAA administration and how the needs of individual students can be catered for. The assessments appear to have been viewed as 'exams', however the conditions for the CAA suggest greater flexibility and support could be incorporated by schools which may assist in reducing student anxiety.
8. Building on the Ministry's current investigation into portfolios, further explore the suggestions for a portfolio of evidence option to be available for the achievement of the Literacy and Numeracy Standards.
9. Support the development of resources and professional learning opportunities focused on increasing the quality of literacy and numeracy teaching and learning that will be accessible and appropriate for Tertiary and AE providers.
10. Continue to work with the key parties regarding the digital and connectivity issues impacting on the participation of schools in the Realm countries and consider whether paper-based options for sitting the assessments should be retained until these difficulties are improved. Identify schools in which there is a need for appropriate training for staff using the Assessment Master platform.

11. Explore alternative and further opportunities to more intensively support schools in Realm countries to implement the Literacy and Numeracy Standards, both in the long term and short term.
12. Support the provision of professional development for schools in Realm countries to access and utilise appropriate assessment tools that can be used as readiness indicators for participation in the CAAs.

Section 7: Views on the Literacy and Numeracy Standards and their impact

Section 7 presents the perspectives of teachers and also students who participated in the pilot by drawing on the information shared in the teacher end-of-year surveys and also the student survey (see Appendix 2 for further information about these tools).

Following on from the previous section where the achievement results and insights regarding the four pilot sub-groups were described, the first part of this section further discusses views regarding the equitability of the Literacy and Numeracy Standards and what aspects of the assessments are seen to be barriers for particular students. This is followed by a summary of the student survey feedback about the assessments. The final part of the section describes teachers' responses to the survey questions about the changes that were occurring in their schools and organisations to support students' literacy and numeracy achievement.

7.1 Perspectives on the equitability of the Literacy and Numeracy Standards

Throughout this evaluation an aspect that has been of particular interest is the equitability of the assessments, looking at to what extent all students have equal opportunity to access and achieve using these assessments. Quality assessment design should ensure that assessment tasks are culturally inclusive and enable all user groups to equally access the assessment. The previous section examined and compared the results data for different user groups with the overall secondary cohort, reporting the differences and discussing possible reasons why there may be different rates of achievement.

The various achievement gaps that were reported were noted to be familiar findings in the New Zealand context. On one hand this suggests that the assessments are performing in an expected way and the noted gaps are due to an inequitable education system and society. However, feedback about the equitability of the assessments from a range of sources (teacher mid-year survey, teacher end-of-year survey, and focus groups/interviews with the pilot sub-groups) highlights similar key issues. These issues suggest there may also be factors related to the assessment design and approach that are contributing to inequities.

This section begins with a brief summary of the issues reported from the mid-year and end-of year surveys, building on the feedback from the four sub-groups (ELL, students with SAC, Tertiary/AE and Te Kura students, and Realm students) already shared in the previous section. This is followed by a more in-depth discussion around the three key aspects of the assessments that were consistently identified as potential barriers.

Views on equitability from the mid-year and end-of-year survey

In the mid-year survey for each of the Literacy and Numeracy standards teachers were asked to rate the extent they agreed that 'the CAA is equitable for all learners'. For all three standards more respondents disagreed/strongly disagreed with the statement than agreed/strongly agreed. The Numeracy standard was rated as the least equitable (with 55% disagreeing/strongly disagreeing).

As a follow-up to the findings in the mid-year survey, in the end-of year survey teachers were asked: 'If you believe there are some equity issues, which students do you think might be facing barriers and why?' The 192 teachers gave feedback on a range of equity-related concerns and also some suggestions for possible change. Many teachers raised multiple issues within their response. For Literacy (reading) 75 teachers answered the question with 91 issues raised, 30 teachers answered for Literacy (writing) with 61 issues raised, and 87 teachers for Numeracy⁶³ with 136 different issues.

For each Achievement Standard the 'top three' concerns raised regarding the equity of the assessments were:

Literacy (reading) (n=75)

- #1 Equitable access to digital devices and digital-related skills (21 comments)
- #2 Difficulties for students with neurodiversity and specific learning needs (11 comments)
- #3 Issues regarding Special Assessment Conditions and also the speech to text function (11 comments).

Literacy (writing) (n=30)

- #1 Assessment design (questions, contexts, length of assessment) (15 comments)
- #2 Equitable access to digital devices and digital-related skills (12 comments).
- #3 Issues regarding Special Assessment Conditions (6 comments)

Numeracy (n=87)

- #1 The amount and level of Literacy required (33 comments)
- #2 Equitable access to digital devices and digital-related skills (23 comments)
- #3 Issues with the digital layout of the assessment (17 comments)

Discussion of three key barriers to equitability

The main themes across all three standards are discussed below, beginning with the feedback regarding computer access and digital skills, then student neurodiversity and other learning needs, and finally the concerns raised about the questions, their contexts, and method of assessment used.

Equity issues regarding computer access and digital skills

(56 comments)

For all three standards teachers reported concerns about adequate access to devices. Device access was seen to be related to socio-economic circumstances and therefore also ethnicity.

⁶³ In both Literacy (writing) and Numeracy an additional two teachers said to refer back to the comments they had made in the Literacy (reading) survey.

Access to devices is, as always, a massive equity issue. We struggled to have enough devices for students to sit the assessment at the same time due to our demographic.

I think the biggest equity issue is access to lap-tops. over 70 students had to borrow devices from the school to sit this 1-hour exam.

Difficulties with student device access contributes to logistical issues for the schools trying to administer the CAA, it was also identified that students who do not have their own device will very likely have lower levels of digital skills.

The system is set up for students who are digitally fluent and when they don't own a lap-top they are immediately disadvantaged.

Digital skills enable increased capability to engage in the assessment. Familiarity with logging on and operating a laptop or chrome-book, remembering and using passwords, and navigating the site will all contribute to effective problem-solving when there is a computer-related difficulty in the exam process, and ultimately to overall levels of confidence.

Additional to the issues created by 'digital disparity' were also a range of specific suggestions made about the digital format and platform being used for the CAAs (Assessment Master). The Numeracy assessment appears to be the most problematic with 17 teachers reporting that students were continually scrolling backwards and forwards to read the questions, read graphs, and to enter their answers. This was seen to be difficult and frustrating for students. The scrolling issue was also raised for the Literacy (writing) assessment.

Having run the second event we have had the same observation from the first event. That the students are severely hindered by the online format with respect to looking at the information provided and then seeing the questions. The students are constantly scrolling up and down... I cannot overstate the significance of this issue, especially considering the nature of these questions.

We had large screens but having to scroll up and down to do the task caused issues for some students with tracking problems - a paper resource booklet/sheet would be useful to see when answering the questions to avoid this.

Four teachers felt the addition of a paper-based question booklet would be helpful. This was mostly due to the scrolling issue, which was particularly tricky on small screens and also, that the nature of mathematics meant that the whole assessment process should be paper based.

I feel for numeracy doing this on paper would be a LOT easier for many students.

The final digital-related issue was about difficulties with Wi-Fi. As discussed previously in Section 6.3.5, this was particularly problematic for schools in Realm countries. It was also a challenge for other settings such as Te Kura and other rural-based schools.

Older laptops had an issue. They continually fell off and in some cases it took an hour to get some students on. We tried to alleviate this by assuring them they had as long as they needed.

Suggestions for addressing these issues included making paper-based options available.

Equity issues regarding neurodiversity and other learning needs

(28 comments and also 17 comments regarding Special Assessment Conditions)

Students with neurodiversity-related diagnoses and specific learning needs were frequently identified as a group that teachers believed would face barriers to accessing and experiencing success in the Literacy and Numeracy assessments. The following issues were raised:

- The length and style of the assessment being problematic for students with ADHD.

Students with ADHD need opportunities to get in and out of their seats and this may be a distraction to other learners.

Students with eyesight and attention deficit issues struggled a great deal, as did students generally - reports of headaches, neck strain and exhaustion resulted, and some deliberately rushed to conclusion, presenting low-quality work, just to get some relief.

- Students with dyslexia and other specific learning needs were not well catered for. It was suggested by three teachers that other digital assessments operated better in this regard.

Better accommodations for students with learning difficulties need to be made. Students should have the option to change background colours, fonts etc for better readability.

Neuro diverse students, dyslexic, dyspraxic students across NZ will struggle to achieve all 3 tests. This will create major anxiety and also lock students from achieving NCEA and therefore tertiary education. This testing is a huge step backwards for equity in NZ's education system.

The idea of paper copies of the questions for reader/writers to have access to, rather than trying to read off the same laptop screen as the student, was also raised.

Another frequently raised issue was around the difficulties in understanding and applying Special Assessment Conditions for students who needed them (17 comments over the three standards as well as nine comments about the speech to text function). This feedback has already been covered in Section 6.3.2 which specifically focused on students who used SAC.

Equity issues regarding questions, contexts and method of assessment

(62 comments)

The design of the questions in the assessments was another aspect that teachers commented on. In both the Literacy (writing) and Numeracy assessments teachers felt that

some of the questions lacked clarity. This was particularly noted as a potential challenge for English Language Learners.

There is a lack of clarity in the wording of several questions. Several of our department were not at all sure what certain things meant.

The number one issue raised for Numeracy (33 comments) was about the high levels of literacy that the assessment required and the 'wordiness' of the questions. The evaluation report (Evaluation Associates, 2022) from the June event also noted this as a particular issue raised by teachers, however one teacher reported that "for the second assessment [September] this issue was even worse".

The literacy content was too high for numeracy. You are assessing literacy in another exam. Those who were poor at literacy but good at numeracy should not be disadvantaged.

The amount of reading and writing required in the Numeracy assessment was seen to particularly disadvantage English language learners, with two teachers suggesting that these could be addressed via a translation app or making the test available in other languages in order to be assessing numeracy alone.

Eleven teachers made comments about the length of the assessment creating barriers for some students.

Requiring students to work continuously for at least an hour on a laptop - even for those who don't have specific physical issues - goes against medical advice (where 20 min 'chunks' with animated breaks is advised for extended screen work - not practical under exam conditions, for a large group of students). [Numeracy]

Some of the contexts used in the assessments were seen to be potential barriers for English language learners in particular, but also for students in the Realm countries, rural schools, and younger students.

There were some who also suggested that the Numeracy assessment have a built-in calculator on the platform, to ensure equitable access. In a similar way there were suggestions that the writing platform should include access to a spellchecker.

Beyond the specifics of questions and contexts there were concerns raised about the assessment approach. For all three standards teachers identified groups of students who they believed would be negatively impacted by what was perceived to be an 'exam-style' of assessment (16 comments). Students with attention difficulties and with anxiety were most frequently mentioned.

Students who struggle in test situations will not succeed, even though they can prove they are literate and numerate by producing portfolios.

In addition, students for whom a single-sitting, one-off, extended exam-conditions, high-stakes assessment with difficult physical or psychological issues found the nature of this assessment extremely stressful.

The implications of the assessment approach for tertiary students and the impact on their opportunity to access the assessment are discussed in Section 6.3.4. Some of the responses in the survey reiterated these concerns.

Our learners have left school as it wasn't right for them, mainly sitting in a classroom environment and having structured external assessments at a set time. This is a barrier in itself. Our learners are primarily neuro-diverse and having a 'test' brings on anxiety etc. They also have many external factors that impact on their wellbeing and having a test environment on a set day just doesn't put them at the centre.

Other teachers expressed more general concerns about the validity of a one-off exam-style.

A good proportion of pupils find it incredibly difficult to remember everything in a one-off test (not seen since School C and Bursary - very old fashioned and educationally a real step backwards), but these pupils will be quite successful when they leave school and get a trade.

The added pressure of the assessments being co-requisites for NCEA was also raised as an issue (five comments), with this being particularly pertinent for students who are on tertiary courses with short timeframes.

Any student who finds an exam setting stressful e.g. ASD, ADHD or the 20% of students with various levels of anxiety will struggle to complete this assessment successfully. I know my own child, who is completing their masters would not have passed numeracy so would have no qualifications at all.

MoE/NZQA often advocate offering a flexible approach to assessment (e.g. evidence gathering over time) - but this flies in the face of that approach. This is a high stakes assessment - and without this co-requisite some future pathways will be closed off to our young people - so why make the testing a sit-down computer-based task with no alternative? This will disadvantage students who traditionally perform poorly in exams.

There were various suggestions made that implied the overall approach for the Literacy and Numeracy Standards needed to have greater flexibility, either through the use of paper-based question and/or answer booklets, through portfolios, or retaining the current Literacy and Numeracy Standards.

Schools still need the ability to use the Literacy and Numeracy Standards. These are being used in Māori Immersion There are a significant group of students who will never pass these online tests. Various reasons: Anxiety, Neurodiversity: ADHD, Dyspraxia, Dyslexia.

Summary: Views on the equitability of the Literacy and Numeracy Standards

Pilot schools and organisations have provided feedback through surveys and interviews/focus groups about the equitability of the standards and what the barriers might be for students. A range of views were expressed and while there were some issues that were unique to particular standards, three main themes came through consistently. These were:

- *Difficulties regarding access to devices and the variability of students' digital skills.* Device access was seen to reflect socio-economic disparities and the impact this has on the development of digital skills was also recognised.
- *Additional challenges for students with neurodiversity and other learning needs.* Specific barriers identified included the length of the assessment for students with attention difficulties and the lack of provision in the digital platform for dyslexic students.
- *Assessment questions, contexts, and the method of assessment used.* There was particular criticism of the Numeracy assessment regarding the level of literacy skills required. Some question contexts were seen to be barriers, particularly for English Language Learners. There were also frustrations expressed about the digital layout of the Numeracy assessment. More generally, the validity of a one-off, high-stakes, exam style assessment was questioned. It was suggested that having the CAAs as co-requisites would particularly affect the accessibility of the NCEA qualification for students on tertiary courses.

Recommendations on the equitability of the Literacy and Numeracy Standards

Relevant recommendations from Report One

1. Teachers play a vital role in supporting student success, and it is important to reinforce this. This role includes students being engaged in effective teaching and learning and being well prepared for the CAAs.
2. Encourage schools to consider what specific actions are needed to support student learning and to prepare them in ways that gives them a good chance to achieve the standards.

Additional recommendations for Report Two

3. Continue to improve the functionality of the digital platform, including addressing scrolling issues, specific features for students with dyslexia, the addition of a calculator for numeracy, and a spell-check for Literacy (writing).
4. While the 'digital-first' approach is guiding the implementation of the Literacy and Numeracy Standards there were many suggestions for increased flexibility around this. Consider providing access to paper-based question booklets and also some suggestions for the option of completing the assessment completely on paper if this better caters to a student's needs.
5. Continue to advocate for and address digital equity, recognising that disproportionate access to digital devices may be a contributing factor to inequitable achievement rates in the Literacy and Numeracy assessments

for low decile schools and some Māori and Pasifika students.

6. Teachers identified that this type of assessment can create additional challenges for neuro-diverse students. The development of resources that provide tips, strategies and guidance may assist teachers to ameliorate the barriers so neuro-diverse students are appropriately supported to participate in the assessments.
7. Concerted effort to upskill all teachers to understand and implement the range of provisions that can be made for neuro-diverse students participating in the Literacy and Numeracy assessments.
8. Ensure the literacy requirements to access the assessment tasks are at the appropriate level.
9. Communication and guidance to schools/organisations should emphasise the flexibility in the CAA administration and the how the needs of individual students can be catered for. The assessments appear to have been viewed as 'exams', however the conditions for the CAA suggest greater flexibility and support could be incorporated by schools which may assist in reducing student anxiety.

7.2 Student views on the Literacy and Numeracy Unit Standards

At the end of each assessment students were given an optional survey. The survey involved students rating their level of agreement for the following six statements in relation to the assessment, using a five-point scale from 'strongly agree' to 'strongly disagree'.

1. I felt ready for today's assessment.
2. I had everything I needed to complete the assessment today. For example, Log on, quiet classroom.
3. The skills I used today will be meaningful in the rest of my life.
4. The questions in today's assessment reflect students like me.
5. Did you use text-to-speech to listen to today's assessment text being read aloud? (yes/no question for Literacy (writing) and Numeracy).
6. I found the text-to-speech functionality was useful (Literacy (writing) and Numeracy).

An open comment question also provided the opportunity for students to give any additional feedback.

The survey from the September assessment event yielded an increased response rate from the June survey. Table 43 below details the numbers for each assessment.

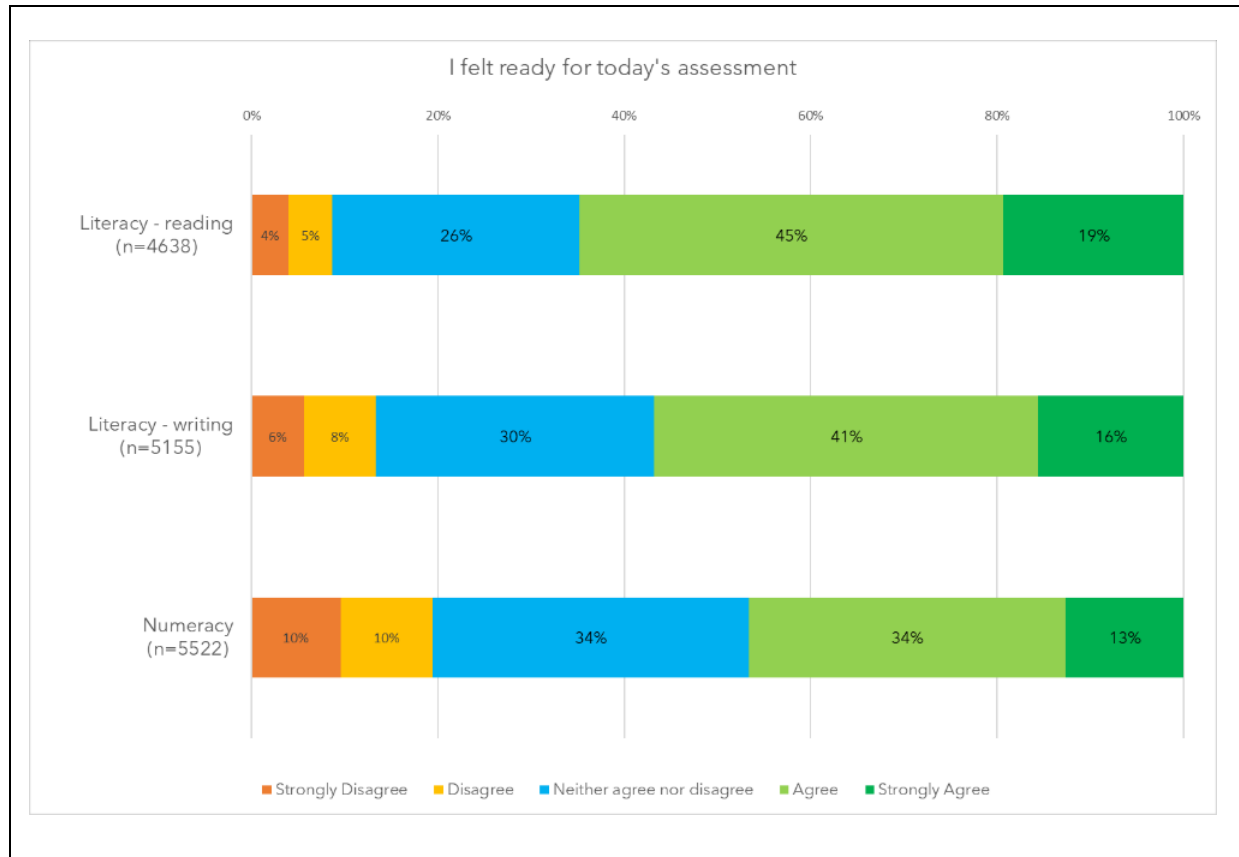
Table 43: Response Rate for Learner Survey

Standard	June survey	September survey
Reading	32%	42%
Writing	31%	42%
Numeracy	23%	36%

Student survey responses

For each of the six statements the agreement ratings students gave are discussed. Following this the additional feedback provided by students is summarised.

Chart 30: Student agreement ratings for 'I felt ready for today's assessment'

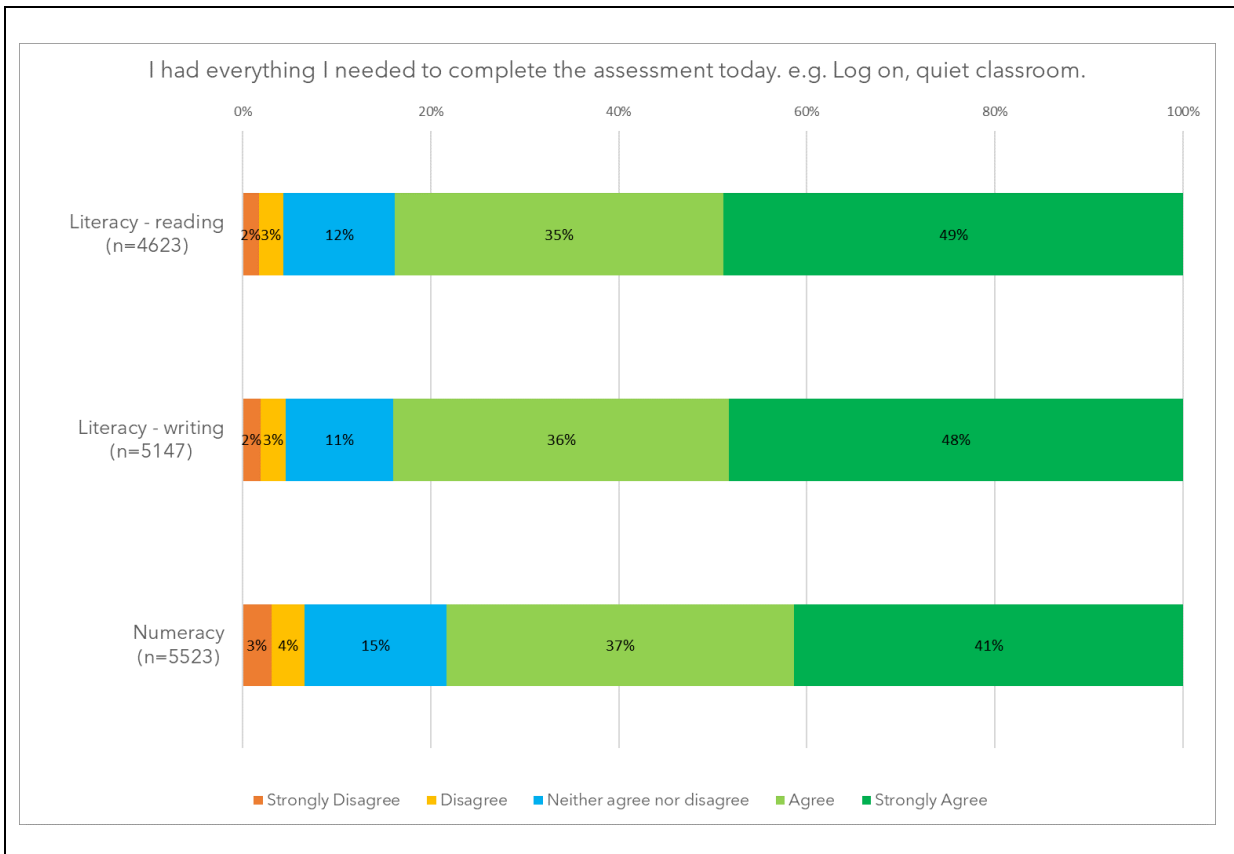


For Literacy (reading) 45% of students agreed and 19% strongly agreed that they felt ready to sit the assessment. This contrasted with a small number, (9%) who disagreed/strongly disagreed that they were ready for the reading assessment. 26% of students were unsure whether they were ready or not for the assessment.

The student perception data for Literacy (writing) was similar, with 41% of students agreeing and 16% strongly agreeing that they felt ready to sit the assessment. Only a small number of students disagreed (14%) with the statement. A slightly larger number of students (29%) were unsure whether felt they were ready or not.

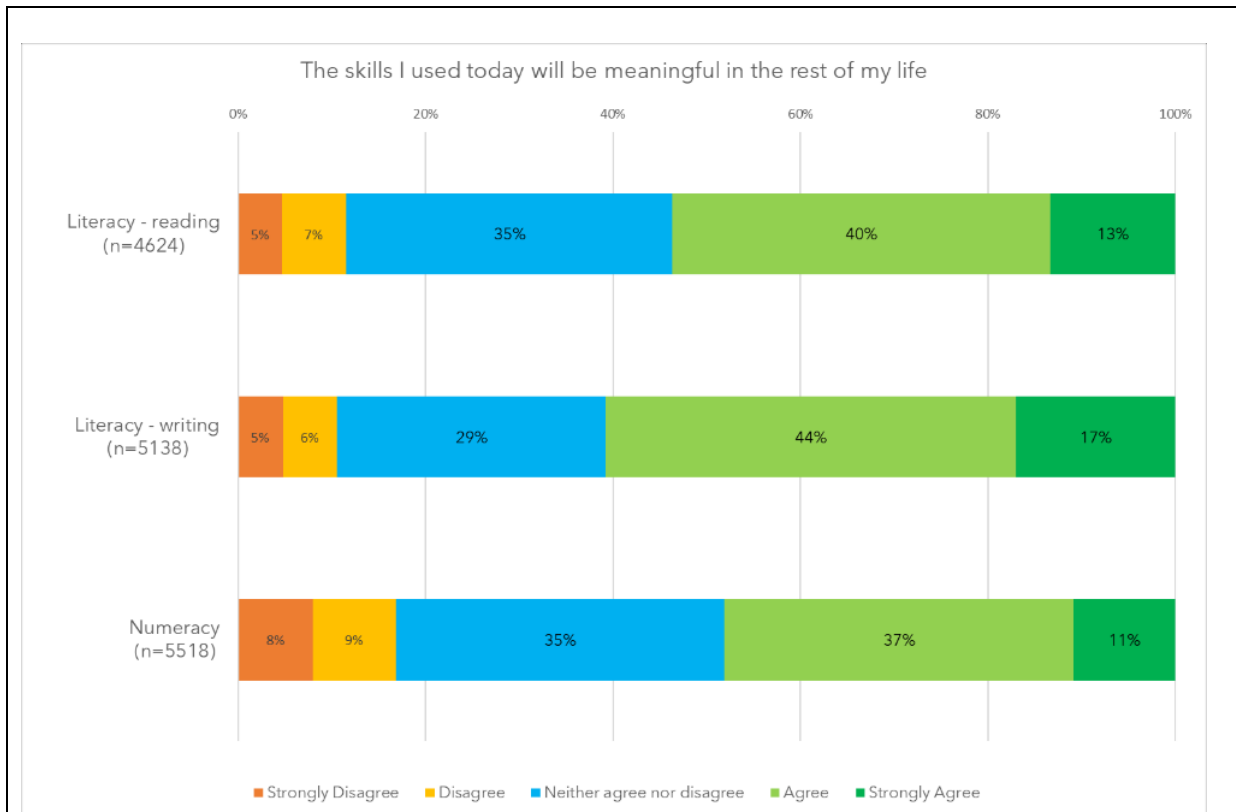
The largest group of students sat the numeracy assessment and their perception of how ready they felt varied slightly to the results for Literacy (reading) and Literacy (writing). Fewer students felt ready for their assessment; 34% agreed and 13% strongly agreed that they were ready for the assessment, which contrasted with 20% who disagreed/strongly disagreed and 34% were unsure whether they were ready for the assessment.

Chart 31: Student agreement ratings for 'I had everything I needed to complete the assessment today' e.g. Log on, quiet classroom.



Students were asked to rate to what extent they agreed that they had everything they needed to complete the assessment and there was strong consistency in the responses across the three standards. The majority of students either agreed or strongly agreed - with the two Literacy Standards having an equally high level (84%). The agreement for Numeracy was only slightly lower with 78% of students agreeing or strongly agreeing they had everything they needed. Students who participated in the Numeracy assessment had a slightly higher proportion of students who were unsure and disagreed/strongly disagreed.

Chart 32: Student agreement ratings for 'the skills I used today will be meaningful in the rest of my life'



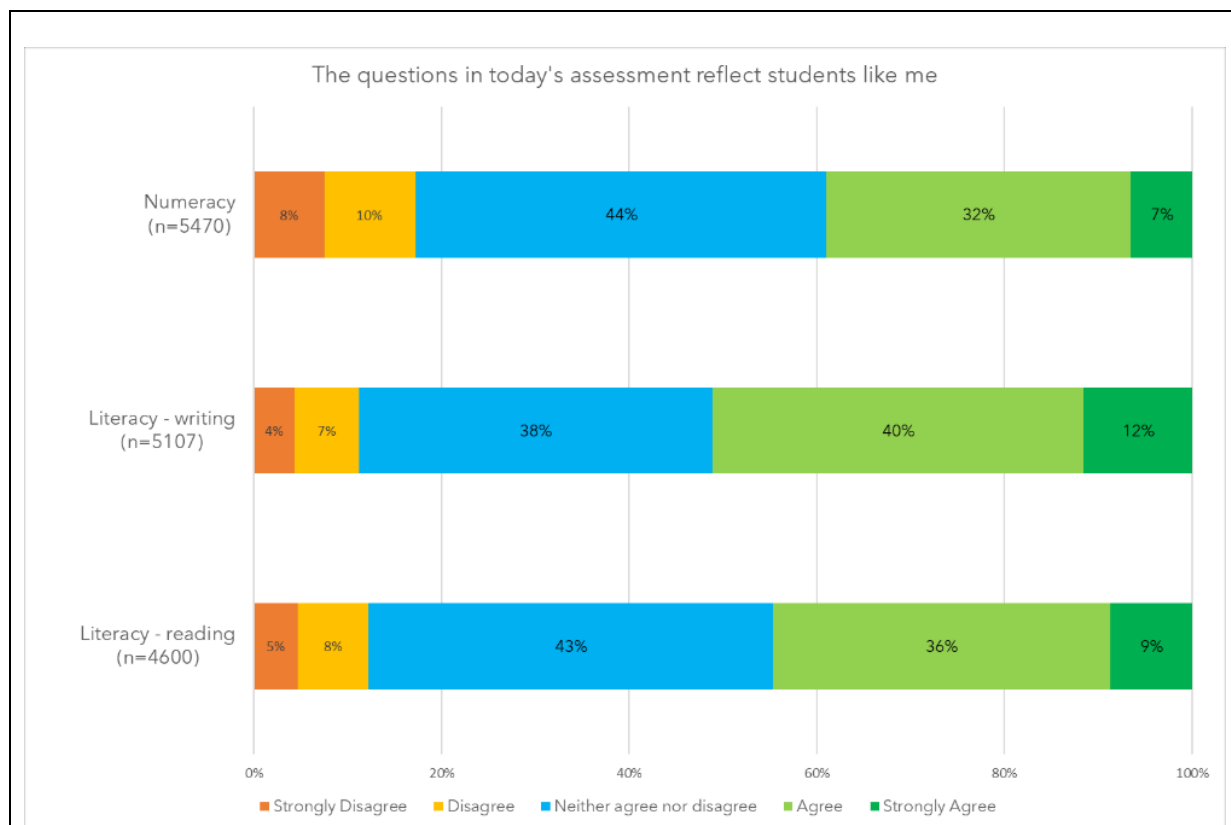
Students were asked whether the skills they used today in their specific Literacy or Numeracy assessment will be meaningful in the rest of their lives.

For students sitting the Literacy (reading) assessment 40% of students agreed and 13% of students strongly agreed with this statement. This contrasted with 9% who disagreed and 5% who strongly disagreed, while 35% of students were unsure whether these reading skills would be meaningful or not.

Literacy (writing) had even more students agreeing with the statement; 44% of students agreed and 17% strongly agreed that the skills in their writing assessment would be meaningful in the rest of their lives. A relatively small number of students disagreed (6%) or strongly disagreed (5%) with the statement and fewer students (29%) reported being unsure about the statement than in the Literacy (reading) or Numeracy assessment.

For students sitting Numeracy, 37% agreed that they were ready and 11% strongly agreed with the statement, which was the lowest proportion of agreeing students across the three standards. Slightly more students disagreed, (9% disagreed and 8% strongly disagreed). The proportion of 'unsure' students was 35%, the same percentage as for Literacy (reading).

Chart 33: Student agreement ratings for 'the questions in today's assessment reflect students like me'



Students were asked whether the questions in their assessment reflected students like them. Overall students had the lowest levels of agreement for this statement compared with the other statements they rated.

Students sitting the Numeracy assessment had the highest level of disagreement or uncertainty about this statement; students disagreed (10%) or strongly disagreed (8%) and 44% were unsure. Only 32% agreed and 7% strongly agreed with the statement.

In the Literacy (writing) assessment 52% of students agreed or strongly agreed that the writing assessment reflected students like them. Like the reading data a relatively small number of students disagreed (7%) or strongly disagreed (4%) with the statement and 38% of students were unsure.

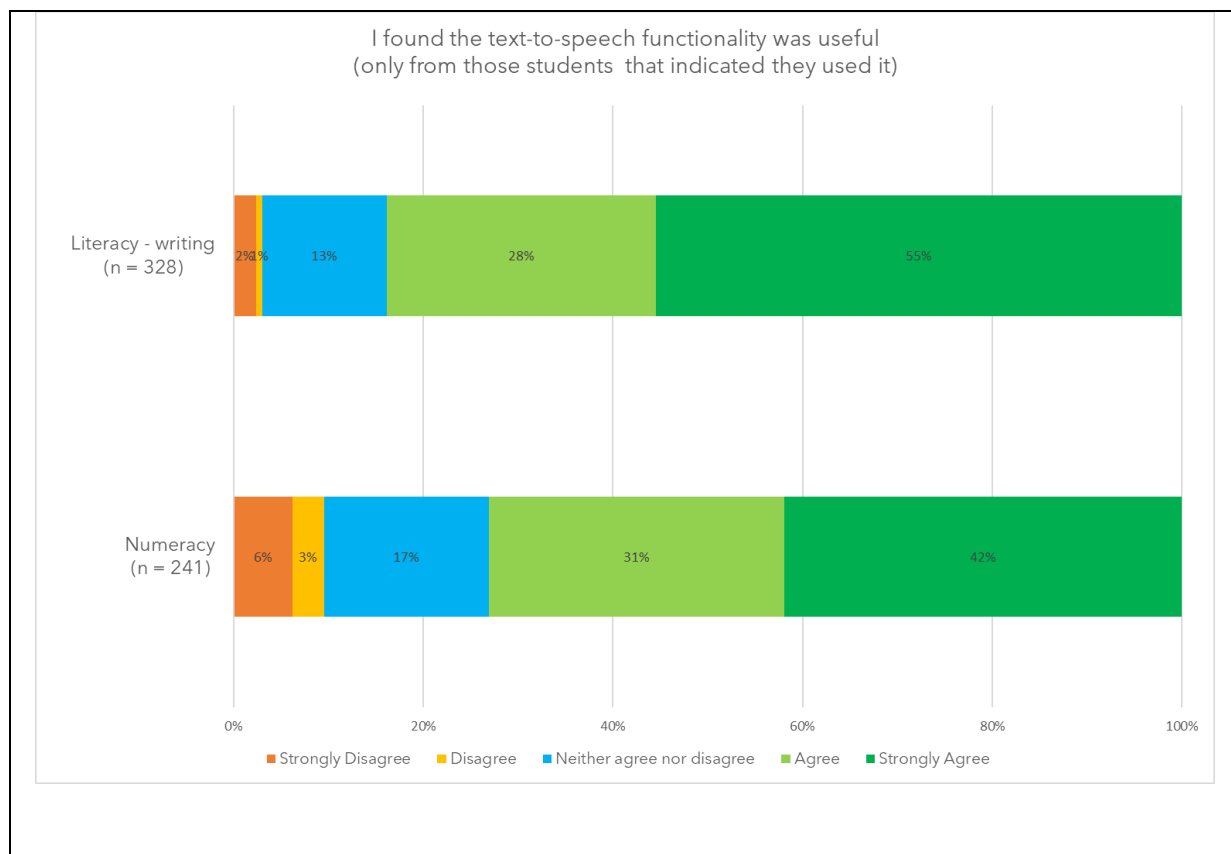
Students sitting the Literacy (reading) assessment had 45% of students who agreed or strongly agreed. This contrasted with 8% who disagreed and 5% who strongly disagreed that the reading assessment reflected students like them. 43% of students were unsure about the statement.

Text-to-speech functionality

All students who sat Literacy (writing) and Numeracy were asked whether they had used the text-to-speech function to listen to today's assessment task being read aloud. Only 8% (n=400) of Literacy (writing) students and 6% (n=321) of Numeracy students used this function.

The students who had used the text-to speech function were then asked to rate how useful they found this function to be, illustrated in the following chart. An opportunity was also provided for students to provide written comments.

Chart 34: Students who used text-to-speech function agreement ratings for how useful they found it to be



Most of the Literacy (writing) students (n=328) who used the text-to-speech function strongly agreed (55%) or agreed (28%) that it was useful which contrasted with 2% of students who disagreed with the statement and 1% who strongly disagreed. 13% of Literacy (writing) students were unsure whether the text-to-speech functionality was useful.

While most Numeracy candidates (n=241) thought that the text-to-speech function was useful, this was fewer than Literacy (writing) candidates, with 42% strongly agreeing and 31% agreeing with the statement. Nine percent disagreed or strongly disagreed with the statement and 17% were undecided whether the text-to-speech function was useful or not.

Comments about the text-to-speech function

Students had the opportunity to provide a comment for feedback about the text-to-speech function used for Literacy (writing) and Numeracy. There were a total of 47 comments submitted and the common themes were:

- Headphones were not allowed in the test and there needed to be silence during the test. (20 comments)

Couldn't use text to speech because have to be quiet and the teachers didn't tell us about it. I saw it but couldn't do anything because we aren't allowed to use headphones. I'm very mad, because I could've used it to check spelling mistakes. very very mad.

- Text to speech was annoying and the text got in the way on the screen, meaning students could not see what they were typing. (6 comments)

The text to speech kept popping up when I was trying to type or delete, it was very annoying to keep having to close it.

Students did not know to bring headphones for the assessment (4 comments)

Next time tell us to bring headphones to listen to the text to speech.

- There were some positive comments about text to speech where students found it a useful tool. (3 comments)

The text-to-speech was very helpful!

Summary: Student views of the Literacy and Numeracy assessments

Students were asked to rate several statements in relation to each of the assessments that they sat.

- Overall, between half and two thirds of students felt ready for the assessments.
- There was strong agreement by students that they had everything they needed to complete the to complete the assessment e.g. Log in, quiet space.
- Students were less sure about whether the skills they used in their assessment or that the questions in the assessments reflect students like them.
- Of the students in Literacy (writing) and Numeracy who used the text-to-speech function, 83% agreed or strongly agreed it was useful.

7.3 Teacher views on reported changes from the Literacy/Numeracy Standards

Examining the achievement results and also the various experiences of piloting the Literacy and Numeracy CAAs has been the focus in the first part of this evaluation report for the Literacy and Numeracy Standards. However it is important to recognise that the assessments are the final step for the schools and organisations implementing these standards. The intent is for the new standards to be well supported by effective teaching and learning across all areas of the New Zealand Curriculum. Teaching and learning that will intentionally develop students' capabilities in foundational literacy and numeracy. Every teacher is expected to be a teacher of literacy and numeracy in their subject and provide rich learning opportunities that support students to ultimately achieve the Literacy and Numeracy CAAs.

It is anticipated that schools/organisations and teachers will be planning and making a wide range of changes which may include system level changes, the use of assessment and progress monitoring tools, changes to subject planning and curriculum delivery, and changes to learning support programmes and interventions. This section aims to understand to what extent such changes are starting to occur in schools.

7.3.1 Systems and interventions introduced by schools and organisations.

Schools and organisations were asked in the end-of-year survey whether since being a part of this pilot their school/organisation has introduced any new systems or interventions that aimed to support the increased literacy and numeracy achievement of their students. This was a yes/no question. Ninety-six percent (184 out of 192) of the total survey participants answered this question. Nearly two thirds (62%) responded yes and 38% responded no⁶⁴

Schools and organisations were then asked if they had responded 'yes' to introducing new systems or interventions to describe these changes, along with any impact they perceived they have had. One hundred and twenty-eight schools/kura/organisations gave multiple responses, a total of two hundred and three responses in all. An analysis of the responses found that sixty-nine (54%) of the total schools and organisations described various system changes and/or small-scale changes and interventions that they have introduced.

The other fifty-nine schools (46%) had not yet made change but described possible changes they were planning to introduce in the future. These responses are summarised at the end of this section as they give some insight into their thinking about the Literacy and Numeracy pilot.

System changes

The term system change is taken to mean those changes affecting the whole school or organisation's approach to improving the reading, writing and/or numeracy of their students. System wide changes were identified by 34 (17%) survey participants which is similar to the 25 (19%) of system wide changes reported by schools and organisations after assessment event one⁶⁵. One school noted its updated cross curricula Literacy approach.

Our school is a cross-curricular school; however, literacy and numeracy have been allowed to stand alone as well as within the cross-curricular framework. We have also been allocated equal time with all other subjects. It is too soon to tell if there has been a noticeable impact. However, we do know that our students have had more exposure to reading this year than in previous years, particularly of extended texts.

Changes in thinking about cross-curricula approaches to Literacy show the level of review and change that is occurring in some schools:

A cross-curricular literacy support team of effective teachers of literacy, that lead PD and share information with staff around the literacy changes, and up-skilling as a teacher of literacy We have actually back-tracked on the expectation that all subject teachers would be teachers of literacy and required the English dept (along with Learning Support

⁶⁴ It is not possible to directly compare these responses with those from the June assessment survey as similar quantitative data was not collected in June.

⁶⁵ It is uncertain whether these are the same changes reported by the same schools following survey one, however, a repetition of information is likely because of the small-time span between the two assessments and subsequent reports.

help for low-literacy juniors) to take full responsibility, for the next two years, while all other subject teachers up-skill. The concept of all teachers adding equal value as teachers of literacy was ahead of the actual capacity.

Another school targeted all teachers and aimed at increasing their Literacy understanding and practice. This school explained that they were focusing on “*school-wide cross-curricular work on sentence structure- each staff member is learning the rules of grammar and sentence construction. Back to basics.*”

Several schools have created “*in-school leader roles for numeracy and a literacy co-ordinator. Their role is to run PD sessions for staff in how to teach literacy and numeracy skills across faculties and departments.*” They, like most schools introducing cross curricula change were not ready to comment on the impact of changes so far.

Small-scale changes and interventions

The largest group of interventions identified are small scale and include smaller year level programmes, programmes within individual departments, targeted student interventions, the introduction of classroom Literacy and/or Numeracy teaching strategies and resources, and changes to school structures. Ninety-six (47%) responses received were small-scale changes or interventions introduced by schools and organisations, which is less than the proportion of the small-scale changes and/or interventions (66%) that schools reported in the July survey.

Departments, teachers, and students are the focus of smaller programme changes. Two English departments have introduced structured Literacy programmes. Another school describes the changes made as “*adjusting our Y10 programme to give teachers/pupils time to work on what might have been in the assessment.*” although the school also reflected that this had unfortunately resulted in “*standard creep, which has not been conducive to good teaching and learning.*”

From other comments, both teachers and classes were reported to have benefitted from a range of teaching strategies and activities. This was described by one school as.

Weekly tips and tricks on Literacy & Numeracy for staff to consider implementing in their classes. Having these connected to the Big Ideas has supported with familiarising staff with the Matrices. We are also considering 'best-fit' readiness tools for our kura. We have had a hui with MoE about the PACT tool and are trialling Digital PATs. We have given access to [name of commercial resource] for all students to work through at own pace.

The impact of the changes introduced is seen as growing confidence with Literacy and Numeracy understanding, knowledge and skills by teachers and students, although it was acknowledged by some that the impact of these interventions is still to be identified fully or measured effectively.

One school included a link to a blog written by the HOD Mathematics about the process of introducing the Numeracy Standards and assessments (Dalrymple, 2022). The article provides excellent background for schools introducing a specific intervention in their junior curriculum. The school introduced “*short starter tasks*” and have worked to refine

and add to this strategy. No impact on students was recorded in the article but the survey was finished before numeracy CAA results were received by the school.

Targeted approaches aimed at specific students were introduced by 14 different schools and organisations whose interventions are mostly targeted at students they felt would have difficulty achieving the Literacy and Numeracy Standards. These include the creation of a *"Student Hub where students can get extra one-on-one support with Literacy and Numeracy,"* and the decision by six schools and organisations to buy a commercial resource after a trial of the *"usefulness of activities in the workbooks to practice a range of reading tasks."* Other groups of students have been given extra support by a teacher aide or learning support staff within the school. While there were no reports of the impact of these interventions, two schools have described the growing confidence of their students.

Eleven teachers have described specific changes to timetabling and time allocation for Literacy and Numeracy, with one school allocating *"one extra hour a week for all learners for literacy, which involved a reading programme."* Another school allocated *"90 minutes a week for literacy and 90 minutes a week for numeracy as a sole focus time. We also expect that literacy and numeracy is interwoven into all teaching and learning in the junior school."* Another school described the substantial changes they had made to the junior programme:

Equal time for Literacy and Numeracy through primarily English and Maths. As we are a cross-curricular school this is BIG. Previously we had specifically just 45 minutes twice a week (plus cross-curricular time). In English, it has allowed us to expose our students to much more literature and specific teaching of skills. The impact is yet to be seen.

Most schools and organisations did not report any impact from these small-scale changes on their schools and said that it was too soon to see any impact. Other schools pointed out that they did not have their results for the second assessment event when they answered this survey question.

Changes yet to be made

Sixty-four (35%) of the responses from schools/organisations described what they intended or needed to do in the future, rather than what they had done or were in the process of implementing.

One school said: *"We are hoping to implement an ALiM⁶⁶ type programme next year if we can get some staffing hours - this is under discussion"*, while another participant wanted *"to develop tasks which other departments (not just English) do - writing and reading tasks."* Others intended to introduce targeted Literacy and or Numeracy programmes or specific teaching strategies in the future. This description of intended outcomes was like many schools and organisations in the mid-year survey who wanted to understand the process themselves before deciding what changes they would make.

Eight other schools/organisations described the increase in knowledge and understanding they had developed because of participating in the pilot but gave no examples of system change or interventions they intend to introduce, while another eight respondents gave such general feedback it was unclear what they were doing in their

⁶⁶ ALiM - Accelerated Learning in Mathematics

school/organisation. This response was summed up by one school who said: “We were already working on this and have continued.” Eight participants said that they would do nothing until the end of year assessment data was returned and they had the opportunity to analyse and discuss the results and decide what changes needed to occur.

Nothing until we get the data back about this cohort's performance at these nominally Curriculum Level 4-5 tests, at that point we will look to analyse the data and establish what changes we may need to make.

Three schools/organisations commented they had done what they had always done and were not introducing anything different although all three appeared to already use a range of systems changes /interventions, which was expressed by one school who said:

At present, our school Level One NCEA Literacy and Numeracy data sits in the range of 95-96% in both measures at the end of Year 11 (nominally Curriculum Level 6). We have continued to teach numeracy and literacy skills as we always have, utilising tools such as e-asTTle, Reading Plus, PATs, etc to establish baseline data, intervene with students at risk via Learning Support, teacher aides, and to assess what impact our teaching and interventions have had.

Four schools and organisations commented on the negative impact of increased time spent on Literacy and Numeracy which meant a decrease in time spent on the Maths and English curriculum and preparation for level one NCEA assessments. One school commented that “while students did grow in confidence and learnt how to unpack the literacy in the questions - it meant we have not covered anything like the amount of algebra we normally would hope to by this stage. Another school explained that their intervention was to split their classes into those students who achieved, and students who had not achieved who then received additional support. This teacher described the intervention as “extremely disruptive and unsustainable,” although gave no explanation of why they were so critical.

This section has reported the 69 teacher responses to a question in the end-of-year survey about any systems or interventions that have been introduced in their school, kura or organisation as well as the 59 teachers responses that indicated what changes they might introduce in the future. Several themes emerged from this analysis of the responses, with many teachers describing small-scale changes and interventions that included changes to programmes, the introduction of teaching strategies, and changes to logistics and resources. A smaller proportion of teachers described larger system focused changes. Some of the teachers made it clear in their responses that they were describing systems and interventions that had been introduced prior to the June assessments and were already described in the previous report, although it was unclear when other respondents’ changes had been introduced.

Teacher views about possible changes from implementing the Literacy and Numeracy Standards

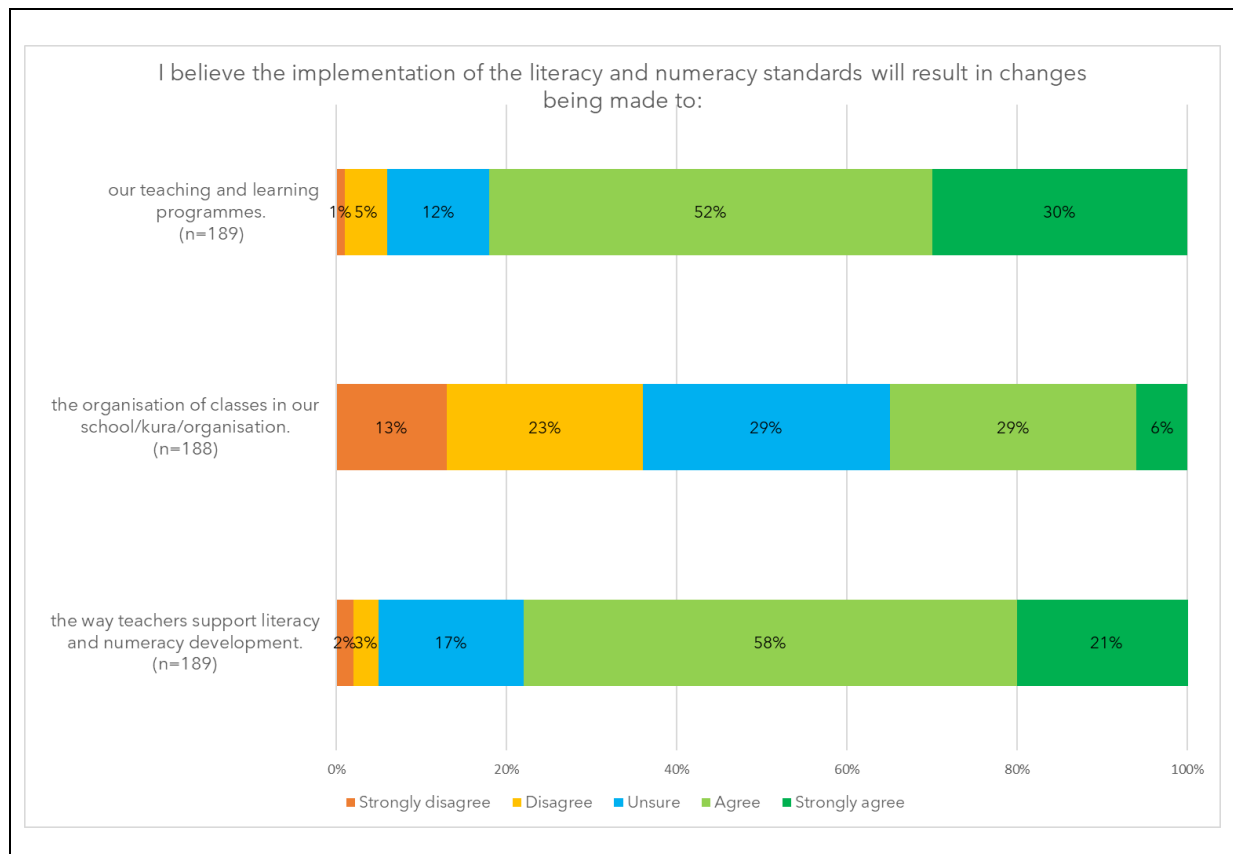
Schools and organisations were asked about their views on potential changes that may occur. They were asked to rate the extent to which they believed the implementation of the Literacy and Numeracy Standards will result in:

- changes being made to our teaching and learning programmes.

- changes being made to the organisation of classes in our school/ kura/ organisation.
- changes being made to the way teachers support Literacy and Numeracy development.

The rating used a five-point scale, from strongly disagree, disagree, unsure, agree, to strongly agree, and the results are illustrated below in Chart 35.

Chart 35: Teacher agreement ratings about the changes that will result from the Literacy and Numeracy Standards



The two areas of change most teachers agreed or strongly agreed were likely to occur were 'teaching and learning programmes' (82%) and 'the way teachers support Literacy and Numeracy development' (79%). Those who said they were 'unsure' made up 12% of the responses for changes to 'teaching and learning programmes' and 17% changes occurring in 'the way teachers support Literacy and Numeracy development'. A very small proportion of respondents disagreed or strongly disagreed with both statements.

There were lower levels of agreement that the organisation of classes would change, with only 35% of teachers agreeing or strongly agreeing and 36% of respondents disagreeing or strongly disagreeing. There were also more respondents (29%) who were unsure about this statement.

Teacher perceptions about the literacy and numeracy changes

After teachers completed the rating for the three statements about likely changes from the implementation of the Literacy and Numeracy Standard (reported in Chart 35 above) they were given the opportunity to explain any of their ratings. There were seventy-two responses in this open-ended question from schools and organisations. Participants identified ninety-seven separate responses which have been categorised using the three

statement headings plus the category 'other,' which covers a wide variety of different responses. Many of the responses are positive but there are number of negative comments about the possible impact of the introduction of the Literacy and Numeracy Standards on existing school programmes and departments.

Explanations for the ratings about 'changes to teaching and learning programmes'

Thirty (31%) of responses related to teaching programmes. Most of these responses (14) described the changes survey participants had made. One school explained:

We are ensuring that we integrate more strategies in our teaching and have redesigned our junior programme as it now needs to cover pretty much all areas if students are to be successful.

Another school/organisation described both a change to learning programmes and how these programmes are organised. The lead teacher said:

Our programmes in the Junior School have been moving to a semester/contextual model (e.g. Cafe maths, Travel Maths), we will have to change to ensure we cover all the Numeracy requirements.

In some cases schools/organisations discussed impacts from the changes with one school describing a negative impact on their existing courses:

Teaching of literacy and numeracy appears to fall upon the shoulders of the English and Mathematics departments despite the push by NZQA to push this teaching into other subject areas. These core subject areas are being impoverished by having to focus on these basic skills despite the extension of other areas that they are required to develop and learn before leaving secondary school.

Explanations for the ratings about 'changes to the organisation of classes'

Thirteen survey participants thought that the introduction of the Literacy and Numeracy Standards would impact on the organisation of classes. Six of these respondents thought that the impact would be in terms of timetabling and general organisation such as a school who explained that "more time has already been given in regard to showing the value of literacy and numeracy to our kura." and another school who said, "in order for students to succeed in Numeracy (Mathematics) we have needed more teaching time with junior students."

Seven schools and organisation highlighted the possibility of streaming returning to their school and were critical of this occurring in their school. A participant was anxious about streaming occurring "because the teacher needs to be in two places at once, so this may result in a type of streaming, those with and those without their numeracy credits." Some respondents feared that this would be a consequence of the way that the Numeracy and Literacy assessment were administered. One Literacy teacher explained their reactions.

We have deliberately removed streaming, incrementally, over the past three years: the need to support students who have not yet/have/do meet the Lit standards, all in the same cohort but fitting in these profiles at different times in the year threatens to bring back streaming - to manage the practicalities of students being on different assessment paths. We see this as very negative but are struggling to consider how to manage this kind of complexity, when we are (now) aware that

courses will have to be designed with the assessment in mind (again, a negative thing as we try hard not to let assessment lead our teaching and learning but celebrate it/acknowledge it).

Explanations about the ratings for 'changes to the way teachers support Literacy and Numeracy development'

Fourteen schools and organisations described cross curricula approaches they had introduced or intended to introduce because of the Literacy and or Numeracy Standards. Most of the participants were positive about the changes but five were negative, fearing teachers would become more assessment driven because of high stakes assessment impacting on student qualifications and school results. These fears were summed up by one teacher who thought that *"it may change things within the classroom, but not necessarily in a positive way. There may be more 'teaching to assessment' as a result, rather than fun and exploration."* This fear of reverting to more assessment driven teaching and learning was also reiterated by other schools who explained the possibility of assessment driven learning occurring because of the move to high stakes assessment.

It will become a pivotal part of our programme. It is not tenable that any more than a handful of students fail the assessment so we will do everything to make sure that does not happen and thus the assessment will drive what we do.

Nine participants identified the need for change to occur in primary and intermediate schools and respondents identified that in one case they had *"started to work with our feeder schools to ensure that our literacy and numeracy programmes align."* Another lead teacher explained that they were *"endeavouring to get to our main contributing schools as there may well be a disconnect in the curriculum levels they are being judged at and where the students are actually at when a test is required."*

Other responses

Teacher perceptions about the Literacy and Numeracy changes within their schools and organisations are wide ranging. Many of the responses (25%) that have been categorised as 'other' are not relevant to the question or participants answered it was irrelevant to them with no explanations, or in seven cases they do not mention change at all. Other examples described problems and issues such as one respondent who described the problem of 'resistant staff' compared to 'enthusiastic' students who are positive about the new Literacy and Numeracy Standards.

Summary: Teacher views on the standards and reported changes occurring in schools

Teachers were asked to rate three aspects of change:

- The areas of change that teachers believed were most likely to occur because of their involvement in the pilot was to 'teaching and learning' programmes and changes to the way 'teachers support literacy and numeracy learning programmes.' More teachers were unsure or disagreed that there would be changes to the organisation of classes.

It is anticipated that the implementation of the new standards will facilitate changes in schools. The following changes were described by 128 teachers:

- Some schools and organisations (17%) are focusing on broader system change, mostly in the form of cross-curricula activities. Other schools reported creating in-school leader roles for literacy and numeracy. These school wide systems go together with a growing awareness of each teacher and department's responsibility for the literacy and numeracy levels of their students.
- A lot of the change reported (47%) can be seen as small-scale changes to teaching and learning programmes such as literacy or numeracy starters, units of work which incorporate specific literacy and numeracy skills and practice questions and tasks which mirror the expected questions and problems found in the assessment activities. Teachers also reported targeted strategies aimed at specific students or the use of commercial resources⁶⁷. Some schools/organisations reported more time allocated to numeracy and literacy classes.
- Most schools and organisations did not report any impact of these small-scale changes on their schools suggesting it was too soon to see impacts.
- A number of schools (35%) described changes that were intended or planned but not yet actioned due to waiting for assessment results to inform final decisions.
- There was also recognition by some teachers that for the desired increase in literacy and numeracy skills to be achieved, intervention at earlier points in students' educational journey (i.e. primary and ECE) is critical.
- Teachers highlighted negative impacts they felt may be unintended outcomes of an increased focus on literacy and numeracy in Year 9 and 10 programmes:
 - Assessment increasingly driving learning because of its high stakes.
 - Increased amount of stress of junior students observed by teachers.
 - Fear of a return to streamed classes from mixed ability classes based on those who have achieved the CAA and those who have not met the standard yet.
 - Because of more Numeracy and Literacy taught in junior classes this may result in less time and coverage of the English and Maths curriculum.

⁶⁷ Note that the NZAMT bank of questions available (free) at this link - <https://drive.google.com/drive/folders/1ZAf189iEzc1AH5CRL1-aVzmGJaGsi9Xg> Can be accessed via nzamt.org.nz/resources

Recommendations: Teacher views on the standards and changes occurring in schools

Relevant recommendations from Report One:

1. A range of case studies showcasing effective literacy and numeracy practice for students and tips for managing the CAA processes effectively would provide the opportunities for schools and other organisations to see and understand how the Literacy and Numeracy Standards and CAAs are best applied in a variety of settings. These could be in the form of webinars, written examples, and materials.
2. The development and sharing of different literacy and numeracy approaches should be encouraged. The setting up of spaces in which to collaborate and discuss resources and approaches, plus brainstorm solutions, may increase confidence levels and feelings of support. The use of online hubs and professional learning groups are good ways to encourage this and might improve students' levels of preparedness for the assessments. Likewise, the use of online hubs and professional learning groups are good ways to create effective professional practice.
3. Illustrating different ways of incorporating activities into units of work would prevent "teaching to the test." A cross-curricula approach to incorporating literacy and numeracy skills will promote rich curriculum experiences and also possibly preventing the use of ability groupings and the narrowing of the curriculum.
4. Teachers play a vital role in supporting student success, and it is important to reinforce this. This role includes students being engaged in effective teaching and learning and being well prepared for the CAAs.
5. Positive experiences should be highlighted within resources such as case studies. Despite this being early in the process for most, some teachers have commented on increased confidence and student engagement. Engaging students only when they have a good chance of achieving the standard should be a key message.
6. Encourage schools to consider what specific actions are needed to support student learning and to prepare them in ways that gives them a good chance to achieve the standards.
7. Webinars and case studies could provide a useful framework for schools/organisations implementing the standards in 2023 and 2024; these should highlight the need for schools to prepare students for the assessment events.

Additional recommendations for Report Two

8. Provide/Include a range of cases studies, pedagogical programmes, webinars, school timetabling approaches, ways to integrate literacy and numeracy approaches within existing learning programmes which will support schools and teachers to develop rigorous teaching and learning programmes.
9. Facilitated professional learning within schools or groups of schools for teachers to support skills, understanding and confidence to develop effective programmes.

10. Consider how reading and writing programmes for junior secondary students can be best supported to increase student achievement.
11. Ensure that primary and intermediate schools understand the expectations of the Literacy and Numeracy progression frameworks and Curriculum Levels so there is a greater alignment between primary/intermediate and secondary schools. This will ensure greater numbers of students will enter Year 9 with the literacy and numeracy skills to be successful at secondary school.
12. As more schools offer Literacy and Numeracy Standards and the assessments to their students, schools may need to share ways that they will support students who have not passed the assessment activities.
13. Maintain awareness of the potential for the implementation of the Literacy and Numeracy Standards to result in streaming and 'teaching to the assessment' by some schools. Consider how this can be addressed.

Section 8: Experiences and views of the pilot

8.1 Views on the supporting resources for the Literacy and Numeracy Unit Standards

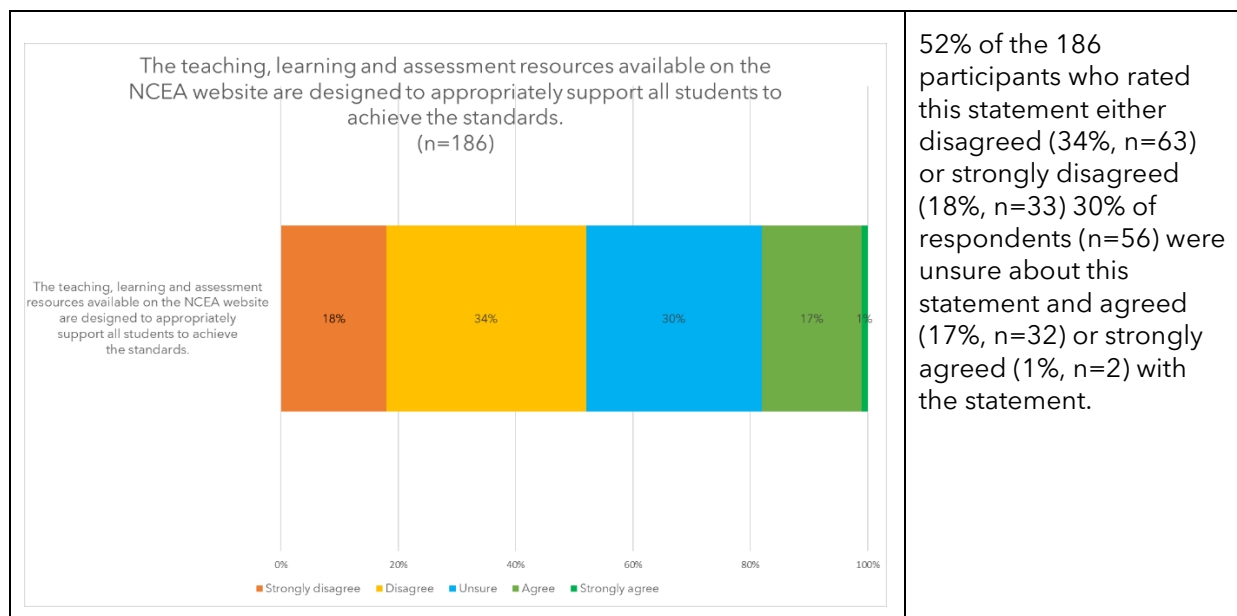
Views on the usefulness of support materials and resources from the NCEA website

This section focuses on the literacy and numeracy support material and resources most used by schools and organisations to support their students participating in the CAAs. This support material is essential for teachers to thoroughly understand the requirements of the new Literacy and Numeracy Standards and assessment activities.

In the end of year survey teachers were asked to rate how much they agreed/disagreed with the statement 'the teaching, learning and assessment resources available on the NCEA website are designed to appropriately support all students to achieve the standards' and their responses are shown in Chart 36 below.

This is followed by Table 44 that lists the specific NCEA website materials and the numbers of teachers that regarded them as 'useful'.

Chart 36: Teacher agreement ratings for 'the teaching, learning and assessment resources available on the NCEA website are designed to appropriately support all students to achieve the standards'



With regard to the rating given by teachers in Chart 37 above, teachers answered a similar question in the mid-year survey and both groups of respondents did not rate these resources highly. This may be explained by participants who interpreted the resources as those that were appropriate to be used with students rather than support materials.

Teachers were also given the list of support materials and resources detailed below in Table 45 and asked to select those which they have found useful. As this survey question was open-ended many of the 175 respondents identified multiple responses, 635 different responses in all.

Table 44: Teacher responses to 'which support materials/resources have been useful to support your students sitting the CAA?'

Support Materials and Resources	Number of teachers
What is Literacy about?	30
What is Numeracy about?	31
NCEA Literacy/Numeracy in Your Classroom	37
Literacy/Numeracy pedagogy guides	52
Effective practices that support Literacy/Numeracy	48
Learning matrices	54
Unpacking Literacy/Numeracy	91
Assessment specifications	96
Sample common assessment activity	147
Readiness tool information	24
Other	25

From the list of support materials and resources 'sample common assessment activities' were identified by schools and organisations as the most useful resource to support their students to better understand the requirements of the Literacy and Numeracy standards and assessment activities. Eighty-five percent (147) of respondents rated this as a useful resource, this was also reflected in the mid-year survey comments. Assessment specifications, how to unpack Literacy and Numeracy, learning matrices, pedagogical guides and effective practices that support literacy/numeracy are all support materials that appear on the NCEA website⁶⁸ and were identified as useful by survey respondents. These materials form the basis of understanding the requirements of the Literacy and Numeracy Standards by teachers. While these materials are teacher-centred, they can be accessed by parents, students and other individuals and groups if required.

Other useful tools, resources and support materials

Schools and organisations were asked to describe other tools, resources and support materials they would find useful. One hundred and forty-eight survey participants gave multiple responses, 210 responses in all. Most of these schools and organisations repeated their request for sample assessment materials rather than identify new or different resources, which also closely reflected their responses following the June assessment event. However, their written commentary is useful in giving more precise detail about the sample assessment tasks they identified as the most useful for teachers involved in preparing their students for the CAAs. General resources and 'Other' were the two other categories that emerged from an analysis of the responses of teachers in this section.

Sample assessment resources

One hundred and thirty-two (63%) schools and organisations identified resources about, or pertinent to common sample assessments materials. This also reflects similar responses to those given in the first assessment event. While 46 of these respondents asked only for sample assessments the other participants identified more details of the sample assessment tasks, they would like provided. These included practice questions and

⁶⁸ www.nceaeducation.govt

problems, marking schedules for the CAAs, exemplars (annotated), and sample rubrics. Many schools asked for all aspects to be included which is evidenced in their comments.

One school asked to be provided with *"an online sample assessment that is marked and feedback is provided"*, while other schools would like the assessment activity to include *"a rubric to see how the assessment is marked: some exemplars for good and insufficient answers, and more examples than only questions on the past digital exams page."*

Practice questions and problem-based activities that mirror the assessments were specifically identified by 34 schools and organisations. One school asked for *"workbooks focused on contextual problems similar to the assessment, as well as banks of contextual problems similar to those in the assessments, that can be used as lesson starters or for revision."* Other schools asked for:

More practice questions so teachers can be confident that the questions are at the right level, targeting the right areas and clear with what markers are looking for. A focus on the areas that the majority of students struggle with. These should be set up to prepare students for the assessment well and accessed by students.

Many of these survey respondents asked for the sample assessments to include clear marking schedules and exemplars. Some schools and organisations explained in more detail what would be the most useful exemplars and why:

Some exemplars that showed which children passed and which didn't and clearer guidelines on WHY NOT. The feedback given only allows us to speculate in a very general way - it doesn't allow us to look at individuals and see the patterns in our cohort. If we could see their exam scripts, we could at least refine the areas of need. These might simply confirm what we already know or think we know, but the reality is that unless we can see for ourselves, we are just guessing. This adds hugely to teacher stress.

The requests for more detailed sample assessment tasks and questions reflect continued uncertainty by schools and organisations about the expectations of the markers of the Literacy and Numeracy assessments. While many respondents were succinct in the details they identified as important in the provision of sample assessment, several other schools and organisations gave some detailed reasonings for their requests. One numeracy teacher explained:

There needs to be a clearer guide on what content is being assessed across the strands. There needs to be revision material with answers, so students and teachers know what is required (in terms of how much detail) when answering the 'short answer and explain questions.' For example, when answering an explain question about 'which is the better deal,' is it good enough to just write the numerical answers they used to determine their answer or is the working to get this numerical answer needed as well? There needs to be some past papers or practice papers with answers so students get a feel for what it will be like.

Nine schools and organisations linked their need for sample assessments or annotated exemplars to the importance of having student assessment scripts returned to them as an important resource to improve teacher understanding of the standards and their own practice. A small number (14) specifically asked for sample assessment to be online using the same platform as the CAA. One school reflected that *"students' need to be able to practice these types of questions using the actual platform."*

Four schools suggested that the MoE/NZQA consider developing *"Tools that self-mark and give instant feedback. Our school has designed one, could MoE design one too?"* Feedback to students about their answers was seen as important for them as well as their teachers and reflects uncertainty expressed by some teachers *"as getting it right"*.

As well as requesting detailed sample assessments and practice activities to support teacher and student preparation for the assessments, five schools and organisations also wanted the increased detail from sample assessments and returned student assessments papers so they could clearly understand how achieved/not achieved is applied to the Literacy and Numeracy assessments. One teacher explained that *"Teachers had no idea what was required to pass (apart from answering questions correctly from all three types of questions and across the strands). Three other schools requested more detailed information about "cut scores and how the markers interpret the marking schedule."*

General Resources

Thirty-five (17%) of responses requested different types of resources. Some of these resources were specific, such as clear instructional videos (7) to support different aspects of the Literacy and Numeracy Standards. Other schools and organisations asked for resources they had heard about such as *"mathematical resources provided by the workshop held in Rarotonga"*, or *"the starter questions devised at Cashmere High School."* Two schools wanted a commercial resource to be provided, and others wanted reading and writing material which would be useful for revision, as well as subject specific resources.

Quality professional development was also identified by eight respondents in this group. One school identified a need for PLD from the list of diagnostic tools identified in question 12 of the survey but PD provided *"in a meaningful way i.e., TIME not just a quick once over."* Another organisation wanted this PD to be for school leaders as well as teachers and to focus on *"clearer links to the curriculum."*

One tertiary institution asked for *"access to all secondary resources, Professional Development and assessment tools,"* which is a request repeated from the first assessment survey.

Other

The remaining responses has been categorised as 'other' and these disparate responses make up 20% of the comments of those who responded. Money and time were mentioned by seven schools and organisations with one Principal's Nominee describing in some detail the time it took to administer each assessment. One school asked that *"resources and money to cover administration costs be provided."* Five survey respondents described the need for clearer communications so that *"all the stuff such as MoE and NZQA instructions are clear, consistent and easily accessible on one page."* Five schools and organisations suggested that the NZQA platform (Te Aka) is made more accessible so resources can be *"more easily accessed, and are on one space."*

Another school suggested “an *Understand/Know/Do* type document would be extremely helpful in developing staff understanding of student readiness.” while two schools requested that a calculator is built into Assessment Master. Four schools and organisations took the opportunity to identify the need for primary and intermediate schools “to understand the requirements of students as they transition to high schools,” while another school was taking the opportunity to do that themselves within their own Kāhui Ako.

Teachers highly value the sample assessment tasks with marking schedules, practice questions, annotated exemplars and other practice material. Part of their requests stems from their desire to get ‘things right’ for their students and their need to be confident and clear about the processes and requirement of a new high stakes assessment model. It also stems from their usual practice of seeing external exam papers that have been returned to their students. Teachers find these returned papers essential in developing an understanding of what skills and knowledge to focus on in their teaching practice. Importantly these papers contribute to their understanding of aspects of achieved and not achieved in the Literacy and Numeracy assessments.

It is worth noting that NZQA not returning individual assessment papers to students was to avoid narrowing teaching and learning so that it focuses on assessment items, instead of the range of skills that make up literacy and numeracy. There is also a risk of students being misled by focusing on previous assessment questions to prepare for future assessments. The use of Curriculum Progress and Assessment Tools was promoted to teachers to support their understanding of where students are at in terms of their literacy and numeracy skills. However, in response to teachers’ feedback in the evaluation report following the June assessment event, NZQA is currently exploring ways that individualised feedback can be provided to students to show what areas students should focus on going forward.

8.2 Pilot teacher views on the delivery of the Literacy and Numeracy Standards

When the variability in the Literacy and Numeracy CAA achievement results was discussed earlier in the report, the extent to which schools were ‘ready’ to implement the assessments was raised as a possible contributing factor. While further investigation of this issue is not within the scope of this evaluation, gaining an understanding of the experiences that schools and organisations had in trying to pilot the standards and administering the assessment event in September will provide a valuable perspective on how ready the sector is for the new assessments and what might help them to be successful in the future.

Ensuring that schools have the capability and capacity to deliver the standards and administer the assessments is critical for ensuring there is equitability of access for all students.

Schools and organisations were asked to rate their level of agreement or disagreement to two statements about the delivery of the Literacy and Numeracy Standards.

- Our school/kura/organisation received the necessary support to pilot the Literacy and Numeracy Standards (i.e. guidance materials, administration guidance etc)
- The process for administering the CAA (Common Assessment Activity) was straightforward.

The responses for each of the statements are found below in Charts 37 and 38.

Chart 37: Agreement ratings for 'our school/kura/organisation received the necessary support to pilot the Literacy and Numeracy Standards'

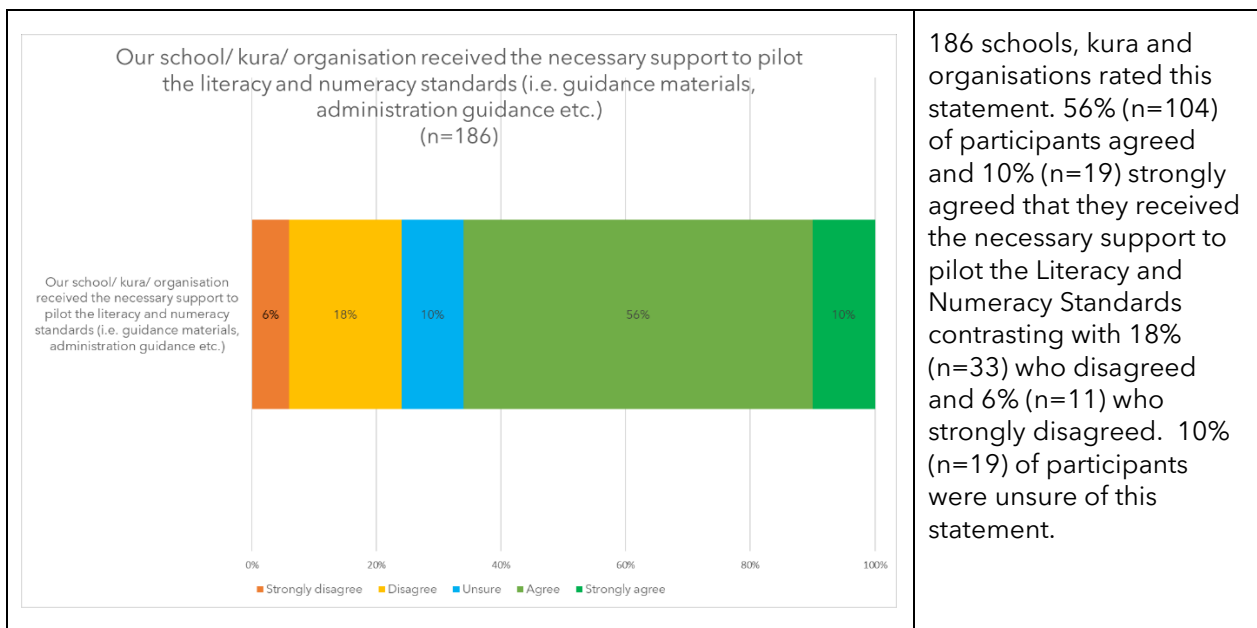
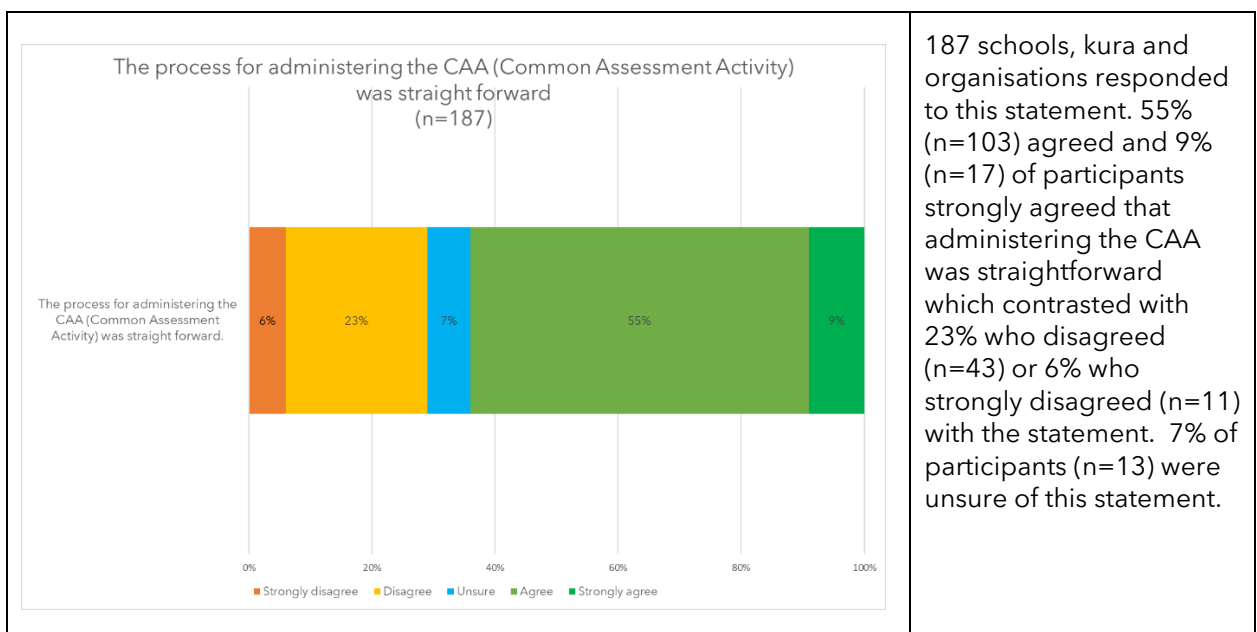


Chart 38: Teacher agreement ratings for 'the process for administering the CAA was straightforward'



Opportunities for strengthening the delivery of the Literacy and Numeracy Standards

Schools and organisations were asked for comments and ideas that would assist the MoE and NZQA to strengthen the delivery of the Literacy and Numeracy Standards. One hundred and twenty-nine survey participants responded to this question, and many took the opportunity to reiterate comments they had already made in previous survey questions. Most participants reported what they considered was problematic about the implementation of the Literacy and Numeracy Standards. Many of these comments were lengthy and, in a few cases, participants also expressed their beliefs about the validity of the whole Literacy and Numeracy change.

The focus on concerns or problems is understandable as participants grapple with the changes that are inherent in a pilot of this complexity. Many responses were similar to the responses in the mid-year survey and included suggestions for ways in which the problems and issues could be solved. This is not surprising given that many schools were involved in both surveys and that there was a small-time span between both events.

The responses to this question were varied but for the most part focused on the following: the technical/digital aspects of the pilot, the logistics of administering the pilot, the CAA and supporting products, increased knowledge of teachers, and the impact on students. Each of these key areas are discussed below.

Technical/digital aspects of the pilot

Many schools and organisations identified issues that were focused on administrative challenges related to the 'digital-first' approach that negatively affected the successful delivery of the CAAs.

An overarching problem around 'scale' was highlighted by several pilot participants. If the expectation continues that all schools and organisations are expected to sit the CAAs at the same time, as the rollout of the Literacy and Numeracy Standards continues there will be increasing technical issues. Some schools identified that technical issues would compound further if all external NCEA level 1-3 assessments are administered online as well.

Suggested solutions to these issues include extensive software and system upgrades in some schools, greater funding of technical support positions in schools, more flexible timetabling of the CAA, and the involvement of schools (particularly Principal Nominees) to identify and help solve complex technical issues.

A school summed up their feelings about the future:

Given that digital assessment via assessment master will become increasingly common, the ministry needs to provide funding to schools for an administrator of digital assessment role. It is not feasible in the long term that teachers and PNs are responsible for such a complex administrative role across so many subjects, assessment windows, and modes of assessment. It involves changes to timetabling, room allocation (both physically and in assessment master), and many other layers of planning, such as having additional devices, multi-boards, calculators, and so on.

Other technical issues included:

- The login system not working on one of the September assessment days caused stress for students and staff, and in some cases disappointment where the students were unable to sit the Literacy (writing) assessment. Affected schools commented that it was unrealistic to ask schools to move their whole cohort to another day. The reorganisation of a CAA involved increased staff workload and caused significant loss of teaching time as some students in other levels of the school were rostered home, so teachers could supervise the Literacy and/or Numeracy assessments. One school asked for a suitable alternative plan for events of this nature.
- Login processes need to be quicker and less time consuming. Suggested improvements include the use of one generic username and password for both supervisor/marker roles and one URL for supervisor/marker/administrations. The different URLs proved problematic as teachers had difficulty when they tried to log into their marker login, as their supervisor login came up. Another suggestion was to integrate the ESL into the platform so that teachers can login using this rather than the cumbersome and unwieldy process of creating supervisor usernames and passwords.
- The ability to enter all students in a school into Assessment Master should be available so schools are more accurately entering students who are ready for the assessment.
- Ensure that the online assessments match the digital tools students already use. Have more tools on the assessment site e.g., calculator, speech-to-text, text-to-speech, colour range tinting, spelling checking, grammar checker.
- Other participants suggested much greater resourcing of information technology in schools, including hardware and software, while other participants suggested that schools are supplied with text reader, and speech-to-text tools and tools such as Equation that can write equations.
- The formatting of the digital assessments was an area of concern. Several schools identified student issues with having to scroll up and down on the screen, which teacher say is an assessment barrier for many students. Having more windows within the questions might reduce this problem.
- Supervision of the CAA requires significant organisation outside of the normal timetable as the assessment requires more time and technical support than one teacher in a one-hour period.
- The need to have all relevant material and resources on one platform was seen by some participants as a way of coping with the increasing demands of the assessments. Some schools have not been able to access Te Aka. Some schools argued for the simplification of technical support as they found having *“multiple platforms to get information on, do the training, and then assess the numeracy standard complex and confusing.”*
- Greater funding for technology is necessary according to some schools and organisations because the Literacy and Numeracy assessments requires *“significant organisation outside of the normal timetable as the assessment requires more time and technical support than one teacher in one-hour period.”* Other

schools have commented on the problems of booking all technological resources for up to a week. Another issue raised was the struggle for schools to be able to provide devices as *"few of our junior students have the financial resources to pay for them."*

- A few schools commented on the impact of their junior students not having regular access to computers and one school commented that *"unless students are regularly using tools like text reader and speech-to-text our students will be disadvantaged."*

Logistics of administering the pilot

How are we going to manage all our learners completing this assessment? This key question underpins the concerns schools have with administering the assessments within their schools. At the crux of school and organisations' concern about this question is the belief that if this an external examination, then it should be run by external supervisors and have an exam centre manager or alternatively if it needs to be managed by the school, due to there being multiple assessment opportunities, there needs to be more funding available for relief to cover teachers in charge of the exams. Teachers argue that running a whole cohort test *"that has no time frame simultaneously, while keeping the rest of the year level classes and timetable operating is not sustainable."* Schools and organisations identified the following issues:

- Schools/organisations argued that they need better resourcing. In many cases the resourcing refers to the payment of relief teachers to support the large numbers of teachers required to supervise classes and or the CAAs. Other suggestions include the need for more technical support/coordinators within the school given the increase of online assessments, and the upgrading of schools' internet systems, where necessary. Several schools have acknowledged the substantially increased workload of Principal Nominees.
- More than two opportunities to sit the assessments within one year was suggested by several participants. A few participants suggested that one of the assessment events be held in late term 4 during the external NCEA exam period. Other participants suggested that as many schools compiled their calendars at the end of the previous year, Literacy and Numeracy assessment dates need to be clearly communicated to schools and organisations so they could avoid other activities.
- Consulting with schools and organisations about the best timing of assessments throughout the year.
- Understanding the reality of what happens in schools during the assessments was seen as important. Some schools invited NZQA and the Ministry into their school over the three-day assessment period to observe what teachers do. Other participants described the impact on their schools. One school had 17 staff out for three hours for three days which did not cover the setting of relief and the impact of teacher absences from their classes. One teacher commented that: *"The NCEA changes were marketed as less work - that is simply not true. You can't keep adding things to schools without the appropriate resourcing."* Another participant commented on the logistics of timetabling: *"rooming, supervision, not clashing with other events etc is very complicated and requires a complex web of communications."*

- Workload issues have been identified as a major concern by some participants, who commented *“that the impact on staff well-being with relief cover etc has been diabolical.”* Other participants felt that teachers cannot be expected to give up non-contacts to supervise tests or set relief for other classes so they can supervise tests, especially *“as there is no recognition of the extra work involved.”* Several schools commented that *“it required significant organisation outside of the normal timetable as the assessment requires more time and technical support than one teacher in a one-hour period.”*
- The role and workload of the Principal’s Nominee may need to be reviewed. One PN described the impact on her work. She found.

the administration of the CAA highly complex and stressful, and struggled to manage it as one person, along with all other PN responsibilities. It has made me think seriously about quitting this role, as once the CAA becomes compulsory, the nature of the assessment (for any student that is assessment ready, across multiple levels, with complex SAC needs and digital support as well as trained supervision required, multiple times a year PLUS the burden of derived grade admin for those absent) is likely to be unsustainable for anyone other than a full-time assessment administrator.

- Some schools and organisations described the marking time frame as too long. A school commented that *“the turnaround from getting results from assessment 1 and sitting the 2nd assessment left only a small window to prepare the students for assessment 2.”*

The CAA and supporting products

Some comments were suggestions for how the assessments could be improved. These echo other recommendations for change that have been addressed in other areas of this report but mainly included: making the assessments shorter and reducing the wordiness of some questions, reducing the amount of Literacy in the Numeracy assessment, and better proof reading of the questions in the assessment because of the mistakes in them.

Three quarters (n=98) of the 128 schools and organisations who made suggestions about ways that the Literacy and Numeracy Standards could be strengthened also identified improvements to aspects of the assessment processes and resources. This is a theme that was important to schools and organisations in many of their answers to other survey questions. It is an important theme that was also highlighted in the June survey.

Much of the demands for more sample assessment tasks, practice questions, annotated exemplars and other revision materials stems from the uncertainty and lack of confidence that many teachers have in a new high stakes assessment, which is different than the more familiar NCEA subject assessments. There is a constant theme through teachers' responses in both the June and September surveys that teachers want to and need to get the Literacy and Numeracy assessments right for their students, for their schools and for themselves.

The importance of specific feedback for students was highlighted by many schools and organisations. This was feedback in addition to generic marking schedules. Many wanted a detailed breakdown for each student against the marking criteria showing what they achieved or didn't. Teachers who have asked for this feedback believe that *"individual feedback is key for us. In terms of value for learning and clarity for supporting students this is crucial."* Frequently the request for detailed feedback is strongly linked to student assessment papers not being returned and a lack of detailed information about individual student results other than a simple achieved or not achieved.

Another school explained this desire for clarity as wanting:

Feed back to the students on exactly what they individually need to pass. Just an achieved/not achieved is not in any way satisfying to the students. They need to know where they have a problem (if they have a problem). Did they fail because they were careless or was their knowledge lacking? If they achieved, they would like to know how well they did, was it just the bare minimum or did they achieve well.

One school commented on very useful feedback from NZQA that came when they queried two 'not achieved' results for two of their students. They received feedback about which *"Outcomes the students did not achieve in"*, which they found very helpful and felt if schools and organisations had this information *"teachers, parents and students would be much happier with the process."*

Almost all schools and organisations used sample assessment tasks and regard them as important resources to use with their students. They asked for more to support their preparation for the assessments. One teacher said, *"we feel like we are going into this blind."* In order to understand the assessments and the expectations that are required of teachers then access to how they are marked, annotated exemplars, questions banks, and marking rubrics are all resources that will help build the confidence of teachers and students.

Many teachers have not had access to face-to-face professional development. Several school and organisations in both June and September's surveys have highlighted the need for professional development in reading as they admit that they have not been taught how to teach reading at a secondary level.

Increased knowledge of teachers

Greater teacher awareness and understanding of Literacy and Numeracy processes is becoming more nuanced amongst greater numbers of teachers within schools and organisations. Greater understanding by the sector about student selection and acceptance that all teachers contribute to students increasing Literacy and Numeracy levels will assist the MoE and NZQA strengthen the changes that are being introduced, although it was also acknowledged that great challenges remain.

Experience of the first assessment event in June impacted on teachers' perceptions of students' readiness to sit the September assessments. Several schools and organisations noted that they would be reviewing selection processes as they *"were starting to question our assumptions about who is ready to assess and what that is based on."* This response appears to be linked with the increasing number of junior students who are exhibiting greater stress leading to the September assessment event. Three schools commented

that this was apparent amongst year 9 students and consider they *"need to be very mindful of when they allow learners to complete these assessments."*

Schools and organisations commented that there is now growing acceptance within their schools and organisations about the need for *"refocusing across the curriculum on making their teaching of Literacy and Numeracy more explicit in their subjects."* One teacher reported that *"most staff are showing a greater interest in the rules of grammar, spelling, sentences and how to teach them"*. This growing awareness and the development of new Literacy and Numeracy programmes will contribute to the strengthening of the implementation of the NCEA Literacy and Numeracy changes.

While there were many suggestions regarding the opportunities to strengthen the delivery of the Literacy and Numeracy Standards, alongside this were also schools and organisations expressing positive views about the introduction of the standards. Comments such as *"I think it was a wake-up call that was needed,"* and *"it has given us an opportunity to bring a focus on literacy and numeracy skills and incorporate these in our forward planning with an explicit attention across faculty areas"* suggest that teachers are anticipating seeing improvements in literacy and numeracy as a result of these changes.

Impact on students

Several participants have asked the question 'Where to next?' as they ponder the effects of students not gaining the co-requisites for Literacy and Numeracy on students' wider hopes and aspirations for achieving NCEA. Many more schools and organisations in the end of year survey are showing concern about the impact on those students who struggle with learning and will leave school most likely with no formal qualifications. One educator pointed out that most of their students' first experience of NCEA will be the Literacy and Numeracy assessments and *"some students will fail and fail and fail. What will this do to their self-esteem / confidence and their future pathways?"*

One school has noted that because their students were more anxious and demotivated by their grades, they will need to think in more depth about students sitting the assessments later than proposed as *"it is important that the expectations of the standard required are not diluted. Significant support will be needed over a number of years to assist learners to meet these standards and to assist teachers with this."* Another respondent described negative impacts when students have not yet achieved the CAA and parents and students have been very upset about it. *"These parents have asked what their child needs to work on, and it is very hard to answer when we do not have personalised feedback from the CAA they sat in June."*

Other participants described the positive engagement and increased motivation observed for some students as a result of participating in the Literacy and Numeracy Standards: *"the students have been far more engaged and have enjoyed the challenge more than we'd anticipated at the outset."*

A teacher from a Realm country school reported that:

It has been an advantage to students as they are given the opportunity to better their reading and writing skills most of all, improve their computer skills.

One teacher had a different perspective when she noted that year 10 students were *"taking their studies more seriously. They decided not to participate in Maths week (fun Maths), preferring to do more revision and practice for their CAA. I found that sad."*

Although other teachers observed more positive impacts on their Year 10 cohorts:

Students treated the test with extremely impressive levels of seriousness and maturity, well beyond Year 10 expectations.

It has added some energy to our Year 10 programme. It has increased our Year 10 ākonga understanding of NCEA.

Summary: Teacher experiences and views of the Literacy and Numeracy pilot

This section has reported teachers views from the end-of-year survey about the supporting resources and also more broadly about the implementation aspects of the pilot. Ensuring schools have the capability and capacity to deliver the standards and administer the assessments is critical for ensuring there is equitability of access for all students. The key findings from teachers' reported experiences were:

Supporting Resources:

- Only 18% of the 186 respondents agreed/strongly agreed that the teaching, learning, and assessment resources on the NCEA website for supporting the standards are designed appropriately to support students achieve the standards.
- Teachers highly valued the sample assessment activities with 85% using them as an essential resource and more examples were requested. Teachers also requested practice assessments with marking schedules, questions/question banks, starter activities, and annotated exemplars.

Pilot implementation

- A majority (64%) of schools and organisations agreed/strongly agreed they had received the necessary support to pilot the standards and 64% agreed/strongly agreed that the process for administering the CAA was straightforward.
- Suggested opportunities for strengthening the delivery of the pilot focused on the technical/digital aspects, the logistics of administering the assessments, the questions in the assessment, the supporting materials, and the need for increased knowledge of teachers.
- Technical issues were identified as an issue in many schools, causing concern that as the rollout continues these issues will increase due to all schools and organisations sitting the CAAs in the same time slots. There was also concern that if the other NCEA external assessments are online as well, schools will not have the digital infrastructure to cope with these demands.
- Logistical issues were raised with significant pressure for the period leading up to and during assessment events. Workload, stress/wellbeing, students rostered home, supervision of assessments, lack of teacher aides and spaces for students requiring learning support, budget implications, technical support, and timetabling were all issues identified by schools/organisations as problematic.
- Some respondents queried their role in organising and supervising an external assessment which for other external NCEA assessments (level 1-3) is the responsibility of NZQA.
- Some teachers observed greater awareness and understanding of literacy and numeracy across their school, with increased understanding about student selection and also acceptance that all teachers contribute to developing students' literacy and numeracy levels.
- There were a range of views about the impact on students, with some concerns raised about the prospects for students who struggle with learning. Other views emphasised increased engagement and motivation from students.

Recommendations: Resources and pilot delivery

Relevant recommendations from Report One

1. Leaders and teachers must understand the purposes of the pilot and their role in preparing students for the assessments. Several participants did little to prepare their students or were using the assessments as a way of identifying students' strengths and weaknesses before changing teaching and learning programmes.
2. For further assessment events, schools will need to consider logistics carefully. Aspects such as technical issues, resourcing, workload, budget, and staffing were identified as issues in their schools. Increased support for school administration and examples of effective administrative practice would be beneficial for all schools.
3. Some participants indicated there was a requirement to administer the assessment at the same time for all students, and that it made logistics difficult. Some consideration could be given to allow the sitting of CAA in sessions, so adequate classrooms and staffing are available.
4. Further resources to support the preparation and understanding of the levels required would make teachers feel more supported. This could include marking schedules, exemplars and task activities, and question banks. This will require careful design and messaging so that these are used in ways that support the overall purpose of the standards.

Additional recommendations for Report Two

5. Consider the development of pedagogical guides (similar to the Level one NCEA Pedagogical Guides) for a range of different subjects in the junior secondary school that would assist curriculum subjects with integrating literacy and numeracy skills and knowledge into their specialised subjects.
6. Continue to address and problem-solve the technical issues that affect the implementation of the CAA. Possible solutions identified by pilot teachers include software and system upgrades in some schools, more funding of technical support positions in schools; more flexible timetabling of CAA and the involvement of schools, particularly Principal's Nominees to identify and help solve complex technical issues.
7. Continue to further resource and support the preparation and understanding of the literacy and numeracy levels required through marking schedules, exemplars and task activities, and question banks which are designed so that these are used in ways that support the overall purpose of the standards.
8. Consider the implications of the increased workload for schools (particularly Principal's Nominees), and increased demands on staffing and classroom spaces for supervision. Possible solutions identified by pilot teachers include increased staffing funding or provision of external supervision similar to other external NCEA assessments.

Conclusion

This report is the second of two reports for the evaluation of the 2022 Te Reo Matatini me te Pāngarau | Literacy and Numeracy pilot. The findings in this second report build on and further consolidate the key findings that were presented in the first report.

The evaluation has sought to understand two aspects of the pilot of the Te Reo Matatini me te Pāngarau | Literacy and Numeracy Unit Standards:

1. How are the assessments performing and what are the opportunities for further refining and improving them?

The results data for ākonga who participated in the Te Reo Matatini me te Pāngarau assessments is inconclusive, however it does provide an indicative measure of achievement at this time. There has been improvement from the June assessment event to the September assessment event, however, further support is needed for Te Reo Matatini me te Pāngarau.

The findings from the June and September assessment events suggest that the Literacy and Numeracy CAAs continue to generally perform well against the levelling of the standards and also suggest good alignment with other measures of attainment, such as e-asTTle. This is particularly true for Literacy (reading) and Numeracy. The performance of the Literacy (writing) CAA, in terms of lower rates of achievement may indicate a need for further monitoring, particularly if students who are identified as being 'ready' are passing at lower rates than those in Literacy (reading) and Numeracy.

Understanding the equitability of the Literacy and Numeracy CAA involved comparing the overall secondary achievement results for the two assessment events by gender, ethnicity, and decile. The comparative achievement levels by ethnicity and decile reveals lower levels of achievement for students who identify as Māori and Pasifika and also for students in lower decile schools. Additional analysis around the relative readiness of these cohorts showed the achievement gaps between the different ethnicity and decile groupings were reduced when the results for all students who were not at the recommended minimum readiness level were excluded.

This finding, that the groups of students who showed the lowest levels of achievement also had a greater proportion of their cohort who were not at the recommended curriculum level, is likely to be due to many schools taking a Year level approach rather than a readiness approach to selecting students. This suggests taking a Year level approach disproportionately impacts particular groups of students. However, some schools also identified concerns about the implications of choosing students to participate in the assessments based on their current curriculum level. Acknowledging the tension in the two approaches, and being aware of the possible impacts, will be an important consideration for more clearly defining and communicating the most appropriate student selection approach.

While accounting for variability in the readiness levels between ethnicity and decile groupings reduced the differences in achievement, these achievement gaps were not eliminated altogether. In looking at the results for four sub-groups: English Language Learners, students using Special Assessment Conditions, students attending tertiary and

students from Realm countries, significantly lower rates of achievement were also reported for these groups across all three standards and for both assessment events.

The disparities in educational outcomes related to ethnicity and decile is a finding which is already well documented in New Zealand research. Such achievement disparities are seen to be related to socio-economic circumstances and ethnicity. However, based on teacher feedback, it is also likely that there are some barriers related to the assessment design and accessibility of the CAAs that are contributing to inequities.

The issues included: difficulties regarding access to devices and the variability in students' digital skills; the additional challenges for students with neurodiversity and other learning needs; and concerns about the question contexts, the method of assessment used, and the level of literacy required to understand the questions (particularly for the Numeracy assessment). Particular concerns were expressed about the implications of a one-off 'exam' style approach for a co-requisite NCEA assessment, and suggestions were made for reducing the 'high stakes' nature of this by providing some alternative options.

2. How are pilot schools, kura, and organisations building their capability to implement the standards and what is needed going forward?

A range of perspectives were gathered through a teacher survey, interviews and focus groups, and direct discussions with kura pilot participants. There appear to be some challenges with different aspects of implementing the standards that require further attention. This covers the approaches being used for selecting students and for determining student readiness, the administration of the CAAs, and the varying amount of strategic and responsive development occurring within teaching and learning programmes to support student success. Teachers play a vital role in supporting student success and this includes ensuring students are engaged in effective teaching and learning and being well prepared for the CAAs.

Additional technical/logistical problem-solving, clearer communication, and for schools, kura and organisations to have access to suitable resources and professional development, are all seen to be necessary and beneficial next steps.

Additional challenges are faced by the Realm country schools, the Tertiary organisations, Alternative Education and Te Kura, and schools piloting the Te Reo Matatini and Pāngarau assessments. These schools, kura, and providers all require appropriate levels of support to ensure their ākonga/students are ready for the new co-requisite standards.

Students experiencing equitable access to the standards will be dependent on all schools and organisations having the necessary capability and capacity for delivering the standards and administering the assessments.

The co-requisite nature of the Te Reo Matatini me te Pāngarau | Literacy and Numeracy Standards poses a potential risk that fewer students will achieve an NCEA qualification. The readiness of the whole education sector (not just New Zealand secondary schools), to develop and implement the needed systems, processes, and student-focused programmes and interventions, will be critical to ensuring students are adequately prepared for success.

Appendices

Appendix 1: List of Charts and Tables

List of Charts

Chart 1: Achievement for Te Reo Matatini me te Pāngarau for June, September, and overall 2022	34
Chart 2: Achievement of Te Reo Matatini me te Pāngarau Standards by gender for overall 2022	35
Chart 3: Percentage of secondary students by year level participating in the Literacy and Numeracy CAA - overall 2022	47
Chart 4: Comparison of e-asTTle Reading sublevel scores for students who participated in the Literacy (reading) CAA - June and September	50
Chart 5: Comparison of e-asTTle Writing sublevel scores for students who participated in the Literacy (writing) CAA - June and September	51
Chart 6: Comparison of e-asTTle Maths sublevel scores for students who participated in the Numeracy CAA - June and September	52
Chart 7: Percentage of secondary students participating in Literacy and Numeracy CAA with e-asTTle scores below 4A by ethnicity - overall 2022	53
Chart 8: Percentage of secondary students participating in Literacy and Numeracy CAA with e-asTTle scores below 4A by decile - overall 2022	55
Chart 9: Approach used by schools/organisations to select students to participate in the Literacy/Numeracy CAA - September	57
Chart 10: Diagnostic tools used by schools/organisations to determine student readiness for the Literacy and Numeracy Standards - September	60
Chart 11: Agreement rating for 'our students were ready to sit the common assessment activity'	61
Chart 12: Secondary student achievement of Literacy and Numeracy standards for June, September, and overall 2022	65
Chart 13: Achievement of Literacy and Numeracy Standards for secondary students who re-sat the Literacy and Numeracy CAA in September	66
Chart 14: Secondary student achievement for Literacy and Numeracy standards compared to e-asTTle scores - overall results 2022	67
Chart 15: Achievement for Literacy and Numeracy assessments for secondary students below and above e-asTTle Level 4A	68
Chart 16: Secondary student achievement by gender in Literacy and Numeracy Standards for overall 2022	74
Chart 17: Secondary student achievement by ethnicity for Literacy and Numeracy CAA - September	77
Chart 18: Secondary student achievement by ethnicity for Literacy and Numeracy-CAA - overall 2022	78
Chart 19: Comparing achievement by ethnicity in Literacy (reading) between all students with students e-asTTle scores 4A and above - overall 2022	79
Chart 20: Comparing achievement by ethnicity in Literacy (writing) between all students with students e-asTTle scores 4A and above - overall 2022	80

Chart 21: Comparing achievement by ethnicity in Numeracy between all students with students e-asTTle scores 4A and above - overall 2022	80
Chart 22: Secondary student achievement by decile for Literacy and Numeracy CAA - September	84
Chart 23: Secondary student achievement by decile for Literacy and Numeracy CAA - overall 2022	85
Chart 24: Secondary student achievement in Literacy (reading) by decile for students with e-asTTle scores 4A and above - overall 2022.....	86
Chart 25: Secondary student achievement in Literacy (writing) by decile for students with e-asTTle scores 4A and above - overall 2022.....	87
Chart 26: Secondary student achievement in Numeracy by decile for students with e-asTTle scores 4A and above - overall 2022	88
Chart 27: Comparison of Achievement of Literacy and Numeracy CAA for ELL students with all secondary - June and September.....	92
Chart 28: Achievement rates for Literacy and Numeracy for students using SAC provisions - September.....	96
Chart 29: Achievement of Literacy and Numeracy CAA for students from Realm countries for June and September	108
Chart 30: Student agreement ratings for 'I felt ready for today's assessment'	125
Chart 31: Student agreement ratings for 'I had everything I needed to complete the assessment today'	126
Chart 32: Student agreement ratings for 'the skills I used today will be meaningful in the rest of my life'	127
Chart 33: Student agreement ratings for 'the questions in today's assessment reflect students like me'.....	128
Chart 34: Students who used text-to-speech function agreement ratings for how useful they found it to be	129
Chart 35: Teacher agreement ratings about the changes that will result from the Literacy and Numeracy Standards	135
Chart 36: Teacher agreement ratings for 'the teaching, learning and assessment resources available on the NCEA website are designed to appropriately support all students to achieve the standards'	141
Chart 37: Agreement ratings for 'our school/kura/organisation received the necessary support to pilot the Literacy and Numeracy Standards.....	146
Chart 38: Teacher agreement ratings for 'the process for administering the CAA was straight forward.....	146

List of Tables

Table 1: Numbers of pilot schools and organisations who entered students in the Literacy and Numeracy Standards – June and September	25
Table 2: Numbers of pilot kura and schools who entered students in the Te Reo Matatini me te Pāngarau Standards – June and September.....	25
Table 3: Number of participating ākonga by standard - June, September and overall 2022.....	31
Table 4: Proportion of students participating in Te Reo Matatini me te Pāngarau CAA by unit standard combination type (June & Sept 2022).....	31
Table 5: Participation by ethnicity in Te Reo Matatini me te Pāngarau (September)	32
Table 6: Participation in Te Reo Matatini me te Pāngarau by decile - June, Sept, overall 2022	32
Table 7: Year level of ākonga participating in Te Reo Matatini me te Pāngarau - September.....	33
Table 8: Ākonga achievement for Te Reo Matatini me te Pāngarau - June, September, and Overall 2022	33
Table 9: Achievement results for ākonga re-sitting Te Reo Matatini me te Pāngarau Standards - September.....	34
Table 10: Ākonga achievement by gender in Te Reo Matatini me te Pāngarau Standards for June, September and overall 2022	35
Table 11: Ākonga achievement by Year level in Te Reo Matatini me te Pāngarau for June, September and overall 2022	36
Table 12: Ākonga achievement by ethnicity in Te Reo Matatini me te Pāngarau for June, September and overall 2022	36
Table 13: Number of all participating students by Literacy and Numeracy CAA – June, September, and overall 2022	43
Table 14: Proportion of all students participating in CAA by assessment standard combination type - June and Sept	43
Table 15: Secondary Student participation in Literacy (reading) and Literacy (writing) CAAs by ethnicity – September and overall 2022	44
Table 16: Secondary student participation in Literacy (reading) and Literacy (writing) CAAs by decile – September and overall 2022	44
Table 17: Secondary student participation in Numeracy CAA by decile – September and overall 2022	45
Table 18: Participation in Literacy and Numeracy CAAs by year level and standard for secondary students – overall 2022.....	45
Table 19: Year level of students participating in the September Literacy/Numeracy CAAs	47
Table 20: Percentage of secondary students with usable e-asTTle scores	49
Table 21: Percentage of participating secondary students with e-asTTle scores below or at/above the recommended level - June, September and overall 2022	50
Table 22: Comparison by ethnicity of e-asTTle scores above 4A compared with below 4A for students participating in the Literacy and Numeracy CAA – overall 2022.....	53
Table 23: Comparison by decile of e-asTTle scores below 4A compared with at/above 4A for students participating in the Literacy and Numeracy CAA – overall 2022.....	54

Table 24: Secondary student achievement for Literacy and Numeracy standards – June, September and overall 2022	65
Table 25: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - June.....	69
Table 26: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - September.....	69
Table 27: Achievement of Literacy and Numeracy CAA for all secondary compared with secondary at/above 4A - overall 2022.....	69
Table 28: Secondary student achievement by gender in Literacy and Numeracy standards for June, September and overall 2022	74
Table 29: Secondary student achievement by Year level for June, September and Overall 2022 ..	75
Table 30: Secondary student achievement by ethnicity for Literacy and Numeracy CAA - June, September, and overall 2022	76
Table 31: Secondary student achievement by decile for Literacy and Numeracy CAA - June, September and overall 2022	82
Table 32: Achievement by standard for ELL students compared with all secondary students - June and September	92
Table 33: Participation in Literacy and Numeracy CAA for students using SAC provisions - September.....	95
Table 34: e-asTTle levels for students with a reader or a writer entitlement participating in the Literacy and Numeracy CAA - September	95
Table 35: Achievement of Literacy and Numeracy CAA for students using SAC compared with all secondary students - September	95
Table 36: Achievement of Literacy and Numeracy for students using SAC who were 'at or above' e-asTTle level 4A compared with all secondary students 'at or above' e-asTTle level 4A - September	96
Table 37: Achievement of Literacy and Numeracy for all secondary students compared with all secondary students at or above e-asTTle level 4A.....	97
Table 38: Comparison of tertiary and secondary student achievement for Literacy and Numeracy CAA - June and September.....	103
Table 39: Comparison of tertiary and secondary student achievement for Literacy and Numeracy CAA - overall 2022.....	103
Table 40: Achievement of Literacy and Numeracy CAA for students from Realm countries for June and September	108
Table 41: Achievement of Literacy and Numeracy CAA for repeating students from Realm countries - September.....	109
Table 42: Comparison of Realm country and secondary student achievement of Literacy and Numeracy CAA - overall 2022	109
Table 43: Response Rate for Learner Survey	124
Table 44: Teacher responses to 'which support materials/resources have been useful to support your students sitting the CAA?'	142
Table 45: Type and numbers of respondents to the end of year Literacy and Numeracy teacher survey	163

Table 46: Numbers of survey responses submitted per schools/organisations	163
Table 47: Response Rate for Learner Survey	164

Appendix 2

Sources of Data for the Evaluation

Pilot teacher end-of-year survey for Literacy and Numeracy Standards

All schools/organisations who participated in the September assessment event for the 2022 pilot received the Literacy and Numeracy Teacher Survey and were asked to complete it for the subject(s) they had piloted.

Table 45: Type and numbers of respondents to the end of year Literacy and Numeracy teacher survey

Type of school / organisation	Number of schools/ organisations in September event	Number of schools/ organisations who responded to the survey	Number of survey responses
English-medium secondary schools	170	116	177
Tertiary/Alternative Ed	4	9	11
Realm schools	7	3	4
TOTAL	181	128	192

- The survey response rate is 71% with the 192 surveys received being representative of 128 different schools and organisations.
- Of the 192 survey responses, 89 (47%) are for Numeracy, 56 (24%) are for Literacy (reading) and 47 (24%) for Literacy (writing).
- The role of the teacher completing the survey varied: head of department (41%), subject teacher (5%), numeracy/literacy co-ordinator (18%), principal's nominee (11%), principal/deputy principal (18%) and 6% other.

The overall number of responses from the English-medium secondary schools is sufficient to draw conclusions, however, the small number of responses from the other organisations (Tertiary/Alternative Education and Realm countries) means any conclusions drawn will have limited generalisability.

Different numbers of survey responses were received from pilot schools/organisations, ranging from none to five, as detailed in Table 3 below. This range was due to schools/organisations piloting different numbers of assessments and also some schools (n=11) had two staff (with different roles) submit a survey for the same subject.

Table 46: Numbers of survey responses submitted per schools/organisations

	Number of survey responses per school/organisation					
	0	1	2	3	4	5
Schools/ organisations	53	86	22	15	3	1

The survey, customised and collated using a Teams survey form, contained both quantitative and qualitative questions. The Ministry of Education reviewed these questions. The survey questions focused on the following aspects of the pilot:

- the selection process used for students who participated in the assessments
- teacher perceptions about the assessments
- teacher perceptions about the equitability of the assessments

- processes for determining which students would have Special Assessment Conditions
- views on supporting resources
- impact of the new standards on systems or programmes in the school/organisation
- how the delivery of the Literacy and Numeracy standards could be strengthened.
- Impacts or changes from implementing the standards.

Data from quantitative questions (agree/disagree Likert scales) was analysed and presented in bar charts. Thematic analysis was used to analyse the qualitative data.

Limitations of the survey

1. Because most teachers had not been able to view the CAA, their responses were limited.
2. The survey responses sit within the context of pilot participants not having seen the assessment results.
3. Small numbers of responses from Tertiary institutions, Alternative Education providers, and Realm countries meant that their data cannot be considered representative. However, it does provide insights into their unique context and perspective.

Learner survey

The NZQA developed the learner survey and administered it following each of the September assessments. The survey, optional for students to complete, involved giving an agreement rating (strongly agree to strongly disagree) for four statements about the assessment, and also, if relevant, about the text-to-speech function. There was also an opportunity to submit general comments.

Table 5 details the response rates for the two learner surveys, showing a higher response rate for the second assessment event. Both surveys have response rates that are statistically representative of the wider group of students who participated in the assessments.

Table 47: Response Rate for Learner Survey

Standard	June survey		September survey	
	(n)	(%)	(n)	(%)
Reading	3,050	32%	4,664	42%
Writing	2,756	31%	5,206	42%
Numeracy	3,087	23%	5,613	36%

A limitation of the survey is that it is not known what type of school or organisation that the student voice represents. The response rate for the learner survey was slightly higher (4 percentage points for Literacy (reading) and Numeracy and 5 percentage points higher for Literacy (writing) for those students who achieved the standard than for those who did not.

Results data from the assessments

NZQA provided the results data to Evaluation Associates | Te Huinga Kākākura Mātauranga for each of the five pilot standards by year level, gender, decile, ethnicity, ELL status, and type of organisation. NZQA also provided data that allowed for analysis of the relationship between e-asTTle and NCEA results.

New Zealand Council for Educational Research (NZCER) conducted a psychometric analysis for each CAA, and this was also provided to Evaluation Associates.

Focus groups and interviews

The focus groups and interviews provide deeper insight about the experiences of piloting the standards for the following pilot sub-groups that were identified as having specific needs that were of interest.

- Alternative Education providers (interviews n=2)
- Tertiary providers (interview n=2)
- Te Aho o Te Kura Pounamu (focus group n=5)

The experiences and perspectives of two other sub-groups was provided through data gathering by Ministry of Education staff who work closely with these groups but have not been involved in the administration of the pilot. This includes:

- The pilot schools in Realm countries provided feedback to the Ministry staff who regularly visit and work closely with these schools.
- A feedback session with five large secondary Pilot schools with high numbers of Culturally and Linguistically Diverse Learners (CALD), including high numbers of ESOL funded students, was held by the Ministry's 'Migrant, Refugee and International Education' team.

Appendix 3:

NCEA Te Reo Māori & Pāngarau Kaiako/Teacher Readiness Report - Dec 2022 Ngā Kura Māori

Author: Whare Isaac-Sharland, Tai Huki Consult Ltd

Click [here](#) to access

Appendix 4:

Overall 2022 Participation and Achievement Data Summary Table

2022 Pilot of the Literacy and Numeracy Unit Standards						
Cohort and Standard		Overall 2022 Participation		Overall 2022 Achieved Results		
		All students (n)	% of students at or above 4A	All Achieved (n)	(%)	% achieved at or above 4A
All Secondary	R	18,420	81.9%	12,388	67.3%	86.3%
	W	17,583	79.3%	8,752	49.8%	78.5%
	N	25,535	79.0%	16,371	64.1%	87.1%
Resitting secondary in Sept	R	1,931			36%	
	W	3,525			38%	
	N	3,372			39%	
Female	R	9,478		6,501	68.6%	
	W	9,168		5,315	58.0%	
	N	12,986		8,128	62.6%	
Male	R	8,945		5,890	65.8%	
	W	9,168		3,437	40.8%	
	N	12,553		8,245	65.7%	
Māori	R	3,834	71.4%	2,038	53.2%	79%
	W	3,543	80.7%	1,281	36.2%	65%
	N	5,219		2,442	46.8%	82%
Pacific Peoples	R	2,328	65.6%	931	40.0%	68%
	W	2,243	66.8%	736	32.8%	65%
	N	2,931		1,054	36.0%	68%
Asian	R	2,807	86.8%	2,037	72.6%	87%
	W	2,723	87.7%	1,619	59.5%	84%
	N	3,915		2,924	74.7%	90%
MELAA	R	434	85.3%	302	69.6%	94%
	W	421	87.4%	216	51.3%	82%
	N	600		377	62.8%	88%
European	R	12,230	85%	2,442	46.8%	89%
	W	11,736	81.7%	6,264	53.4%	80%
	N	17,535		12,227	69.7%	89%
Decile 1	R	341			27.6%	59%
	W	282			11.7%	22%
	N	322			20.5%	50%
Decile 2	R	573			33.3%	56%
	W	544			24.4%	60%
	N	471			22.7%	54%
Decile 3	R	1,354			56.6%	81%
	W	1,314			44.6%	78%
	N	1,743			50.3%	80%
Decile 4	R	2,483			64.7%	87%
	W	2,323			48.0%	76%
	N	3,442			55.3%	83%
Decile 5	R	1,337			61.0%	83%
	W	1,136			42.8%	76%
	N	2,188			58.8%	84%
Decile 6	R	3,190			66.2%	85%
	W	3,071			43.8%	71%
	N	4,054			59.5%	86%
Decile 7	R	2,548			71.4%	89%

2022 Pilot of the Literacy and Numeracy Unit Standards					
Cohort and Standard		Overall 2022 Participation		Overall 2022 Achieved Results	
		All students (n)	% of students at or above 4A	All Achieved (n)	% achieved at or above 4A
	W	2,498		50.8%	84%
	N	3,876		66.7%	86%
Decile 8	R	2,752		76.2%	92%
	W	2,738		56.8%	85%
	N	3,645		72.1%	91%
Decile 9	R	1,831		79.8%	89%
	W	1,738		66.4%	87%
	N	3,076		80.8%	93%
Decile 10	R	1,679		77.7%	88%
	W	1,627		59.2%	83%
	N	2,396		80.1%	95%
Tertiary	R	57		25	43.9
	W	46		8	17.4%
	N	59		21	35.6%
Realm	R	275		80	29.1%
	W	274		86	31.4%
	N	319		83	26.0%
SEPTEMBER RESULTS					
English Lang Learners	R	27		9	33.3%
	W	30		12	40.0%
	N	14		6	42.9%
Special Assessment Conditions	R	168		70	41.7%
	W	155		38	24.5%
	N	152		66	43.4%

Note 1: The percentage of students reported as being above 4A the percentage of the cohort of students participating in the CAA that had valid 3-asTTle scores.

Note 2: A valid e-asTTle score was defined as being either (1) recent (Jan 2022 or later) or (2) if a score is not recent it must be above the sub-level score 4A. In September the percentage of secondary students with valid e-asTTle scores were 63% for Literacy (reading), 23% for Literacy (writing) and 50% for Numeracy and these proportions are representative (98% confidence level 2% margin of error).

Note 3: Students in Realm country schools are not included in the Pacific Peoples e-asTTle data set.

Note 4: The Ministry currently holds only binary sex data. This means that there is no way to determine whether trans, genderqueer, non-binary, or intersex learners participated in the pilot and, therefore, no way of understanding their experiences of the assessments.

Note 5: Ethnicity is recorded using total response ethnicity counts a student in all ethnic groups they identify with. Enrolment forms for schools, Student Management Systems used by the education sector, MoE and NZQA information systems allow students to identify with up to three ethnic groups.

Note 6: The Realm countries are Niue (1 school) and the Cook Islands (6 schools).

Appendix 5

2022 NCEA Literacy and Numeracy Pilot - Assessment event two - September

Survey questions

2022 NCEA Literacy and Numeracy Pilot - Assessment event two - September 2022

The purpose of this survey is to gather information on the standards and assessments for Literacy and Numeracy as part of the 2022 pilot. Feedback and information about the standards and assessments of Te Reo Matatini me te Pāngarau will be gathered separately through a combination of survey and online focus groups being coordinated by Tai Huki Consult Ltd.

Please complete only ONE response from your school/kura/organisation for EACH assessment. For example, if students have been assessed in reading, writing, and mathematics please submit three responses.

Who should fill in this survey?

Teachers and/or leaders involved in the 19th to 23rd September assessment event for the 2022 NCEA Literacy and Numeracy Pilot.

Your answers are confidential, and all survey data is kept securely and in accordance with NZQA/MOE protocols.

Specific comments would be helpful as it will provide our analysis with more detailed explanations.

Thank you for your participation.

Q1. The response to this survey is in relation to:

- Literacy - reading
- Literacy - writing
- Numeracy

Q2. Choose the option which best describes your organisation

- New Zealand school
- Alternative education provider
- Tertiary institution
- Realm country school

Q3. Choose the option which best describes the role of the person completing this survey

- Subject teacher
- Head of department
- Literacy coordinator
- Principal's nominee
- Numeracy coordinator
- Principal / Deputy principal
- Other

Q4. What is the name of your school/ kura/ organisation?

Q5. From which year groups did students sit this assessment? Select all applicable year groups.

- Year 9
- Year 10
- Year 11
- Year 12
- Year 13

- Other

Q6. Please describe how students were selected to complete the second assessment event

- All students from a year group/s or cohort were entered
- Students who were perceived by teachers to be ready for this assessment
- Students were allowed to choose
- Other

Q7. Please describe your process if further explanation is required

Q8. Please provide ratings below

	Strongly disagree	Disagree	Unsure	Agree	Strongly agree
Our school/ kura/ organisation received the necessary support to pilot the literacy and numeracy standards (i.e. guidance materials, administration guidance etc.)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The process for administering the CAA (Common Assessment Activity) was straight forward.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Our students were ready to sit the common assessment activity.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The teaching, learning and assessment resources available on the NCEA website are designed to appropriately support all students to achieve the standards.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Q9. Please comment on how you found the process for determining which students would have special assessment conditions.

Q10. What further supports or processes do you believe would enable an effective roll-out of the literacy and numeracy standards for all schools/ kura/ organisations?

Q11. If you believe there are some equity issues, which students do you think might be facing barriers and why? (This could be in relation to access or design of the assessment)

Q12. Which diagnostic tools have been used to determine the readiness of students for the literacy and numeracy standards? Please tick the relevant boxes

- We are not determining readiness at this stage
- Curriculum levels of the English learning area
- Curriculum levels of the Mathematics and Statistics learning area
- Electronic Assessment Tool for Teaching and learning (e-asTTle)
- English Language Learning Progressions (ELLPs)
- Learning Progressions for Adult Literacy (LPAL)
- Learning Progressions for Adult Numeracy (LPAN)
- Learning Progressions Framework (LPFs)
- Literacy and Numeracy for Adults Assessment Tool (LNAAT)
- Pathways Awarua
- Programme for the International Assessment of Adult Competencies (PIAAC)

- Progress and Consistency Tool (PACT)
- Progressive Achievement Tests (PATs)
- School/kura/organisation specific tools/rubrics
- Teacher judgement e.g. observations/student work
- Other

Q13. Which resources have been useful to support your students sitting the CAA? (Select all that apply)

- What is Literacy about?
- What is numeracy about?
- NCEA Literacy/Numeracy in Your Classroom
- Literacy/Numeracy pedagogy guides
- Effective practices that support Literacy/Numeracy
- Learning matrices
- Unpacking Literacy/Numeracy
- Assessment specifications
- Sample common assessment activity
- Readiness tool information
- Other

Q14. What other tools, resources, support materials would you find useful?

Q15. Since being a part of this pilot has your school/ kura/ organisation introduced any new systems or interventions that aim to support increased literacy and numeracy achievement?

- Yes
- No

Q16. If you responded yes, please describe what these are and any impact you perceive they have had.

Q17. I believe the implementation of the literacy and numeracy standards will result in:

	Strongly disagree	Disagree	Unsure	Agree	Strongly agree
Changes being made to our teaching and learning programmes.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Changes being made to the organisation of classes in our school/kura/organisation	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Changes being made to the way teachers support literacy and numeracy development.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Q18. Comment if you would like to explain any of your ratings above.

Q19. Have you observed any other impacts or changes (intended or unintended) on your school/ kura/ organisation from participation in the pilot?

Q20. Please add any other comments/ideas that would assist the MOE and NZQA to strengthen the implementation of the literacy and numeracy standards

References

- Caygill, Zhao, Hunter & Park. (2021). *How our education system is performing for literacy: Progress and achievement of New Zealand learners in English medium settings*. Wellington: Ministry of Education. Retrieved from <https://assets.education.govt.nz/public/Literacy-and-Maths-strategy-development-in-2021/How-our-education-system-is-performing-for-Literacy.pdf>
- Caygill, R. & Sok, S. (2008). *PISA 2006: School context of science achievement: how ready are our 15-year-olds for tomorrow's world?* Wellington: Ministry of Education. Retrieved from <https://www.educationcounts.govt.nz/publications/schooling/31278/6>
- Erikson, L. (2018). Disparities in educational outcomes for New Zealand students: the problem with the dominant focus on ethnicity. *Commentary on issues of higher education and research*, 10. University of Auckland. Retrieved from <https://cdn.auckland.ac.nz/assets/auckland/about-us/the-university/official-publications/commentary/commentary-issue-10.pdf>
- Education Review Office. (2011). *Alternative Education: schools and providers*. Wellington: Education Review Office.
- Education Review Office. Retrieved from <https://ero.govt.nz/sites/default/files/2021-05/Alternative-Education-July-2011.pdf>
- Education Review Office. (2012). *Evaluation at a glance: priority learners in New Zealand schools*. Wellington: Education Review Office. Retrieved from <https://temangoroa.tki.org.nz/Stories/ERO-Priority-Learners#:~:text=Priority%20learners%20are%20groups%20of,students%20with%20special%20education%20needs>.
- Evaluation Associates. (2022). *2022 NCEA te reo matatini me te pāngarau | literacy and numeracy pilot evaluation: evaluation report one*. Unpublished report for Ministry of Education.
- Mayeda, D., France, A., Pukepuke, T., Cowie, L., & Chetty, M. (2022). Colonial Disparities in Higher Education: Explaining Racial Inequality for Māori Youth in Aotearoa New Zealand. *Social Policy and Society*, 21(1), 80-92. doi:10.1017/S1474746421000464
- Ministry of Education. (2021). *2021 te reo matatini me te pāngarau | literacy and numeracy pilot: evaluation report two*. Internal Ministry of Education report: unpublished.
- Webber, A. (2020). *e-asTTle: Validity, reliability, and representativeness. Preliminary results*. Wellington: Ministry of Education.
- New Zealand Council for Educational Research. (2018). *The NCEA review: findings from the public engagement on the future of NCEA*. Wellington. Retrieved from www.nzcer.org.nz
- New Zealand Council for Educational Research. (2022). *Psychometric analyses of NCEA Level 1 digital reading literacy, writing literacy and numeracy assessments*. Internal report for the Ministry of Education: Wellington.
- Thrupp, M., & Alcorn, N. (2011). A little knowledge being a dangerous thing?: Decile-based approaches to developing NCEA league tables. *New Zealand Annual Review of Education 20*, Victoria University of Wellington, pp. 52-73.

Yuan, J., Turner, T.R., & Irving, E. (2010). *Factors Influencing University Entrance Success Rate*. Auckland: Starpath Project, The University of Auckland. Retrieved from <https://cdn.auckland.ac.nz/assets/education/about/research/images/Factors%20influencing%20University%20Entrance%20success%20rate.pdf>

Dalrymple, M. (2022). *Numeracy 32406 - our pilot adventures*. <https://drdalrymple.wordpress.com/2022/03/17/numeracy-32406-our-pilot-adventures/>