



# Maths Term Overview Term 4, 2022

Based on research from the Workshop Model and Gradual Release of Responsibility

- Atwell, N. (1987). *In the Middle: Writing, Reading and Learning with Adolescents*, second edition. Portsmouth: Heinemann. Calkins, L. (2010). *A Guide to the Reading Workshop*. Portsmouth: Heinemann.
- Tovani, C. (2011). *So What Do They Really Know?* Portland: Stenhouse.
- Fisher, D. and Frey, N. (2014). *Better Learning Through Structured Teaching: A Framework for the Gradual Release of Responsibility, 2nd Edition*. 2nd ed. Alexandria: ASCD.



		Number & Algebra	Measurement & Geometry	Statistics & Probability
The proficiency strands <b>Understanding, Fluency, Problem Solving and Reasoning</b> are an integral part of the Maths curriculum across the three content strands: Number & Algebra, Measurement & Geometry and Statistics & Probability. The four processes will continue to be embedded across each term.	<b>Foundation</b>	<p>Establish understanding of the language and processes of counting by naming numbers in sequences, initially to and from 20, moving from any starting point (<a href="#">VCMNA069</a>)</p> <p>Compare, order and make correspondences between collections, initially to 20, and explain reasoning (<a href="#">VCMNA072</a>)</p> <p>Represent practical situations to model addition and subtraction (<a href="#">VCMNA073</a>)</p> <p>Represent practical situations to model sharing (<a href="#">VCMNA074</a>)</p>	<p>Use direct and indirect comparisons to decide which is heavier or holds more, and explain reasoning in everyday language (<a href="#">VCMMG078</a>)</p>	<p>Recognise unpredictability and uncertainty of some events. (<a href="#">VCMSP083</a>)</p>
	<b>Year 1</b>	<p>Develop confidence with number sequences to and from 100 by ones from any starting point. Skip count by twos, fives and tens starting from zero (<a href="#">VCMNA086</a>)</p> <p>Recognise, model, read, write and order numbers to at least 100. Locate these numbers on a number line (<a href="#">VCMNA087</a>)</p> <p>Count collections to 100 by partitioning numbers using place value (<a href="#">VCMNA088</a>)</p> <p>Represent and solve simple addition and subtraction problems using a range of strategies including counting on, partitioning and rearranging parts (<a href="#">VCMNA089</a>)</p> <p>Represent practical situations that model sharing (<a href="#">VCMNA090</a>)</p> <p>Recognise and describe one-half as one of two equal parts of a whole (<a href="#">VCMNA091</a>)</p> <p>Investigate and describe number patterns formed by skip counting and patterns with objects (<a href="#">VCMNA093</a>)</p> <p>Recognise the importance of repetition of a process in solving problems (<a href="#">VCMNA094</a>)</p>	<p>Measure and compare the lengths, masses and capacities of pairs of objects using uniform informal units (<a href="#">VCMMG095</a>)</p> <p>Tell time to the half-hour (<a href="#">VCMMG096</a>)</p> <p>Describe duration using months, weeks, days and hours (<a href="#">VCMMG097</a>)</p> <p>Recognise and classify familiar two-dimensional shapes and three-dimensional objects using obvious features (<a href="#">VCMMG098</a>)</p>	<p>Identify outcomes of familiar events involving chance and describe them using everyday language such as 'will happen', 'won't happen' or 'might happen' (<a href="#">VCMSP100</a>)</p>
	<b>Year 2</b>	<ul style="list-style-type: none"> <li>Recognise and represent multiplication as repeated addition, groups and arrays (<a href="#">VCMNA108</a>)</li> <li>Recognise and represent division as grouping into equal sets and solve simple problems using these representations (<a href="#">VCMNA109</a>)</li> <li>Recognise and interpret common uses of halves, quarters and eighths of shapes and collections (<a href="#">VCMNA110</a>)</li> </ul>	<ul style="list-style-type: none"> <li>Compare masses of objects using balance scales (<a href="#">VCMMG116</a>)</li> <li>Tell time to the quarter-hour, using the language of 'past' and 'to' (<a href="#">VCMMG117</a>)</li> </ul>	<p>Identify practical activities and everyday events that involve chance. Describe outcomes as 'likely' or 'unlikely' and identify some events as 'certain' or 'impossible' (<a href="#">VCMSP125</a>)</p>
	<b>Year 3</b>	<p>Recall multiplication facts of two, three, five and ten and related division facts (<a href="#">VCMNA134</a>)</p> <p>Represent and solve problems involving multiplication using efficient mental and written strategies and appropriate digital technologies (<a href="#">VCMNA135</a>)</p> <p>Model and represent unit fractions including 1/2, 1/4, 1/3, 1/5 and their multiples to a complete whole (<a href="#">VCMNA136</a>)</p>	<p>Identify angles as measures of turn and compare angle sizes in everyday situations (<a href="#">VCMMG146</a>)</p>	<p>Conduct chance experiments, identify and describe possible outcomes and recognise variation in results (<a href="#">VCMSP147</a>)</p>
<b>Year 4</b>	<p>Apply place value to partition, rearrange and regroup numbers to at least tens of thousands to assist calculations and solve problems (<a href="#">VCMNA153</a>)</p> <p>Investigate number sequences involving multiples of 3, 4, 6, 7, 8, and 9 (<a href="#">VCMNA154</a>)</p> <p>Recall multiplication facts up to 10 x 10 and related division facts (<a href="#">VCMNA155</a>)</p> <p>Develop efficient mental and written strategies and use appropriate digital technologies for multiplication and for division where there is no remainder (<a href="#">VCMNA156</a>)</p> <p>Investigate equivalent fractions used in contexts (<a href="#">VCMNA157</a>)</p> <p>Count by quarters, halves and thirds, including with mixed numerals. Locate and represent these fractions on a number line (<a href="#">VCMNA158</a>)</p> <p>Recognise that the place value system can be extended to tenths and hundredths. Make connections between fractions and decimal notation (<a href="#">VCMNA159</a>)</p>	<p>Compare angles and classify them as equal to, greater than or less than a right angle (<a href="#">VCMMG174</a>)</p>	<p>Describe possible everyday events and order their chances of occurring (<a href="#">VCMSP175</a>)</p> <p>Identify everyday events where one cannot happen if the other happens (<a href="#">VCMSP176</a>)</p> <p>Identify events where the chance of one will not be affected by the occurrence of the other (<a href="#">VCMSP177</a>)</p>	

Year 5	<p>Identify and describe factors and multiples of whole numbers and use them to solve problems (<a href="#">VCMNA181</a>)  Use estimation and rounding to check the reasonableness of answers to calculations (<a href="#">VCMNA182</a>)  Solve problems involving multiplication of large numbers by one- or two-digit numbers using efficient mental, written strategies and appropriate digital technologies (<a href="#">VCMNA183</a>)  Solve problems involving division by a one digit number, including those that result in a remainder (<a href="#">VCMNA184</a>)  Use efficient mental and written strategies and apply appropriate digital technologies to solve problems (<a href="#">VCMNA185</a>)  Recognise, represent and order numbers to at least hundreds of thousands (<a href="#">VCMNA186</a>)  Compare and order common unit fractions and locate and represent them on a number line (<a href="#">VCMNA187</a>)  Investigate strategies to solve problems involving addition and subtraction of fractions with the same denominator (<a href="#">VCMNA188</a>)  Describe, continue and create patterns with fractions, decimals and whole numbers resulting from addition and subtraction (<a href="#">VCMNA192</a>)  Use equivalent number sentences involving multiplication and division to find unknown quantities (<a href="#">VCMNA193</a>)  Follow a mathematical algorithm involving branching and repetition (iteration) (<a href="#">VCMNA194</a>)</p>	<p>Apply the enlargement transformation to familiar two dimensional shapes and explore the properties of the resulting image compared with the original (<a href="#">VCMMG201</a>)</p>	<p>Pose questions and collect categorical or numerical data by observation or survey (<a href="#">VCMSP205</a>)  Describe and interpret different data sets in context (<a href="#">VCMSP207</a>)</p>
Year 6	<p>Continue and create sequences involving whole numbers, fractions and decimals. Describe the rule used to create the sequence (<a href="#">VCMNA219</a>)  Explore the use of brackets and order of operations to write number sentences (<a href="#">VCMNA220</a>)  Design algorithms involving branching and iteration to solve specific classes of mathematical problems (<a href="#">VCMNA221</a>)  Select and apply efficient mental and written strategies and appropriate digital technologies to solve problems involving all four operations with whole numbers and make estimates for these computations (<a href="#">VCMNA209</a>)</p>	<p>Investigate the effect of combinations of transformations on simple and composite shapes, including creating tessellations, with and without the use of digital technologies (<a href="#">VCMMG229</a>)  Introduce the Cartesian coordinate system using all four quadrants (<a href="#">VCMMG230</a>)  Convert between common metric units of length, mass and capacity (<a href="#">VCMMG223</a>)</p>	<p>Construct, interpret and compare a range of data displays, including side-by-side column graphs for two categorical variables (<a href="#">VCMSP235</a>)  Interpret secondary data presented in digital media and elsewhere (<a href="#">VCMSP236</a>)  Pose and refine questions to collect categorical or numerical data by observation or survey (<a href="#">VCMSP237</a>)</p>

\*\*Progression may differ slightly