Please enlarge the following pages to A3 size, as each document is designed to provide a single-page view of the year for each level.

Hyperlinks to the units are included.

Number and Algebra **Measurement and Space** **Statistics and Probability**

Rationales

This is a recommended sequence only – schools can use this as a base document to start a conversation with teams. However, we suggest deciding on a yearly sequence that provides for substantial blocks of teaching, followed by spaced retrieval using engaging warm-up games, pre-warm-up counting and skip-counting songs, daily and weekly maths chats strategically recommended for each term and dot/number talks (not daily review PowerPoints), to ensure:

1. Teachers have time to assess, then deliver material sequentially, rather than piece-by-piece throughout the year, which avoids rushing through 'topics' before students have consolidated and mastered critical skills. **There must be time for substantial learning following the pre-test, and spaced retrieval rationales do not hold until the content has been properly and thoroughly embedded in long-term memory in the first place to enable it to be retrieved.** For example, within a typical Year 1 addition unit, the focus should be one more, counting on, partitioning and 10 facts. With a 'one-week-per-topic approach,' one strategy would need to be taught on each day, as opposed to having a week-long focus on each strategy across a 3-5 week focus on addition. The block method mirrors how teams deliver content in Singapore, and our numeracy coaches have observed this in-person and researched this approach with schools in Singapore in the process of developing this sequence.
2. Teachers can assess students throughout a unit and deliver point-of-need teaching, which simply cannot occur if topics such as Place Value, Addition, Multiplication, Fractions, and others, are allocated a mere one week at a time. By the time the topic is 'revisited' in Term 2, often students cannot build on what was started (but not consolidated or mastered) in the rushed Term 1 'coverage' of the content. During longer units, teachers can identify gaps, then have time to work on these intensively with students. Coverage does not equal mastery.
3. By deciding on the sequence at the start of the year, teams can spend their planning time throughout the year implementing the '*how* are we going to teach,' as opposed to the '*what* are we going to teach.'
4. Teams can be confident that all parts of the curriculum are allocated a fair amount of time, relative to the number of skills and big ideas that fall within each concept's overarching domain, and that there is assessment for each strand (colour-coded above), prior to each reporting period. In the early years, the ideal allocation for number units is 70-80% of the year.

Critical note: Warm-ups can be used for spaced retrieval and further consolidation, particularly for the challenging concepts. Specific focuses are recommended in the warm-ups row (below the main concept row for each term).

Note: Number and algebra units have been prioritised at the start of terms when student and teacher energy is higher.

Note: Problem-solving and real-life applied mathematics are integrated into units. Concepts can be relocated to best fit with integrated units/inquiry topics throughout the year, if these meaningfully lend to any concepts.

Note: Ongoing warm-ups and 11-week terms allow time for revision of needs-based gaps, particularly gaps evident in post-assessments.

Early Stage 1 Suggested Sequence – NSW Syllabus

	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6	Week 7	Week 8	Week 9	Week 10
Term 1	**WHOLE NUMBERS (PLACE VALUE)**							**POSITION** 1.5 weeks	**DATA** 1.5 weeks	
	WARM-UPS: Counting forwards and backwards pre-warm-up songs throughout the term Place Value Unit 1 Start counting how many days we have been at school (popsicle sticks, ten frames, 120 chart) *Send home Ninja Sliders at the same time as home readers with the parent note – bedtime maths!*									
	15 MINUTE TASKS (4 X 15 MINUTES = 1 HOUR OF DAILY MATHS IN SHORT BURSTS): Weeks 1-5: Patterns with objects Patterns Unit 1 Weeks 1-5: Count to 3, then 6 Place Value Unit 2 Weeks 1-5: Subitise Place Value Unit 5 Weeks 1-5: Digit roads (daily warm-down, fine motor Friday) Unit 4					Count to 10 Place Value Unit 3	Compare numbers Place Value Unit 7	Positional language, simple directions	Sorts/classifies Patterns Unit 1 Graphs objects Yes/no questions	
Term 2	**WHOLE NUMBERS AND COMBINING (ADDITION)**						**SHAPE** 2 weeks		**TIME** 2 weeks	
	WARM-UPS: Counting forwards and backwards pre-warm-up songs all term (Place Value Unit 1) Subitising warm-ups all term (Units 5 & 6) Digit roads Positional language warm-ups Categorising challenges (patterns) warm-ups									
	Subitise Place Value Unit 5 Place Value Unit 6	Real-life addition Addition Unit 1	Real-life addition Addition Unit 1	One more Add Unit 2 Count on Add Unit 3	Partition Addition Unit 4	Partition Addition Unit 4	2D and 3D shapes (sort and identify), connecting to familiar objects		Informal instruments, daily events, long v. short, days of the week, o'clock	
Term 3	**WHOLE NUMBERS**			**SEPARATING (SUBTRACTION)**					**LENGTH**	
	WARM-UPS: Time morning routine on what day is it tomorrow, what day was it yesterday, months and seasons songs (no analogue time) Morning counting routines (days at school, students present) Songs to 120 Place Value Unit 11, skip-counting songs by 10, 5, 2 Patterns Unit 2 Ongoing partitioning (Addition Unit 4) ninja slider challenge, warm-ups Estimation cups Place Value Unit 14 Shape vocabulary around classroom and school									
	Subitise PV Unit 6 Partition Addition Unit 4	Subitise PV Unit 6 Partition Addition Unit 4	Count to 10 Unit 3 and beyond: Unit 11	Physical take away Subtraction Unit 1	Physical take away Unit 1	One Less Subtraction Unit 2	Count back Subtraction Unit 3	Difference between Subtraction Unit 4	Direct comparison Half of a length Comparative language Beginning informal units	
Term 4	**COMBINING**		**SHARES & GROUPS**			**MONEY**	**AREA**	**MASS AND VOLUME**		**ORDINAL NUMBER OLYMPICS**
	WARM-UPS: Start a classroom money system – earn for jobs, fines Ninja slider challenge Time morning routines on days of the week, months, seasons Counting songs to 120 (Place Value Unit 11) Skip-counting songs to front-load year 1 content by 10, 5 and 2 (Patterns Unit 2)									
	One more One less +2/-2 Place Value Unit 8	Count on Addition Unit 3	Share between two Division Unit 1	Create equal shares Division Unit 2	Equal groups Multiply Unit 1	Class shops to revise +, - and ÷ using dollar coins Money Unit 1	Comparative language, predict and superimpose	Mass: Hefting to compare, heavier, lighter	Volume: Pouring, packing and building to compare	Ordinal numbers Place Value Unit 10

Stage 1 – Year 1 Suggested Sequence – NSW Syllabus

	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6	Week 7	Week 8	Week 9	Week 10
Term 1	**WHOLE NUMBERS (PLACE VALUE)**							**LENGTH/AREA**	**DATA**	
	Warm-ups focused on subitising (Place Value Unit 6) and partitioning 3 to 9 (Ninja Sliders ongoing routine) Daily class calendar chat									
	Subitise Place Value Unit 6	Compare PV Unit 7 +1/-1 Unit 8	Count to 120 Unit 11	Two-digit numbers Unit 12	Two-digit numbers Unit 12	Two-digit numbers Unit 12	Teen numbers Unit 13	Informal units to measure and compare length	Design basic surveys and basic graphs	
Term 2	**COMBINING (ADDITION)**					**SUBTRACTION**			**TIME**	
	Warm-ups focused on partitioning (Addition Unit 4) and 10 facts (Addition Unit 5 fluency games)									
	One more Add Unit 2 Count on Addition Unit 3	Count on Addition Unit 3	Partition Addition Unit 4	Partition Addition Unit 4 10 Facts Unit 5	10 Facts Addition Unit 5 until fluent	Physical take away Subtraction Unit 1	One less, two less Subtraction Unit 2	Count back Subtract Unit 3	Calendars and months	Analogue time
Term 3	**SKIP-COUNTING / GROUPS** 3 weeks			**SHAPE** 1.5 weeks	**POSITION** 1.5 weeks		**ADDITION & SUBTRACTION** 3 weeks			**CHANCE** 1 week
	Ongoing warm-ups relating to skip-counting by 10, 5 and 2 (Multiplication Unit 2) including a daily class song									
	Make equal groups Multiply Unit 1	Skip-counting Multiply Unit 2	Skip-counting Multiply Unit 2	Describe features of 2D and 3D shapes	Positional language		Partition Addition Unit 4	Difference between Subtraction Unit 4	Fact families Subtraction Units 5, 6, 7	Probability language
Term 4	**SHARES (DIVISION)**			**FRACTIONS**		**WHOLE NUMBERS**			Patterns	MASS AND VOLUME
	Ongoing warm-ups relating to skip-counting by 10, 5 and 2 (Multiplication Unit 2) including a daily class song OR Fact families Daily estimation warm-up (estimation 180 website or props brought in by students or teacher) (Place Value Unit 14)									
	Create equal shares Division Unit 2	Create equal shares Division Unit 2	Quotition and skip-count to divide Division 3	'Out of' foundation for fractions Fractions Unit 1	Half Fractions Unit 2	Basic renaming Place Value Unit 9	Round and Estimate Place Value Unit 14	Round and Estimate Place Value Unit 14	Patterns with Objects Patterns Unit 1	Equal-arm balance for mass, informal units

Stage 1 – Year 2 Suggested Sequence – NSW Syllabus

	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6	Week 7	Week 8	Week 9	Week 10
Term 1	**WHOLE NUMBERS (PLACE VALUE)** 7 weeks from day 1							**POSITION**		**DATA**
	Warm-ups focused on partitioning (Addition Unit 4), 10 facts, doubles and skip-counting by 10, 5, 2 and 3 (Patterns 2)									
	Two-digit numbers Place Value Unit 12	Two-digit numbers Place Value Unit 12	Teens Place Value Unit 13	Three-digit numbers Place Value Unit 15	Three-digit numbers Unit 15	Three-digit numbers Unit 15	Round and estimate Unit 14	Interpret simple maps and relative positions of features		Questions of interest and data displays as lists, tables and picture graphs
Term 2	**ADDITION**				**SHAPE**	**SUBTRACTION**			**TIME**	
	Ongoing missing part cards routine			Warm-ups on 10 facts/backwards and doubles/backwards				Daily length estimation challenge		
	Partition Addition Unit 4 10 Facts Unit 5	Doubles Addition Unit 6 until fluent	Near doubles Addition Unit 7	Bridge to 10 Addition Unit 8	Describe features of 2D and 3D shapes	Count back Subtract Unit 3	Backwards 10 facts Subtraction Unit 5	Backwards doubles Subtraction Unit 6	Analogue time Start with minutes, connection to the 5s pattern and how the clock actually works (not rote-based o'clock, half past, quarter to)	Duration using informal and formal units
Term 3	**MULTIPLICATION**				LENGTH AND AREA	**ADDITION & SUBTRACTION**			PATTERNS	**CHANCE**
	Ongoing warm-ups skip-counting by 4 (double 2) and 9 (10 and 1 less) (Patterns Unit 2) Daily pauses to tell the time									
	Daily estimation warm-up (estimation jar or estimation 180) (Place Value Unit 14) Missing part cards Seasons song									
	Skip-count Multiply Unit 2 Repeated addition Multiply Unit 3	Repeated Addition Multiply Unit 3	Array-based strategies Multiply Unit 4	Array-based strategies Multiply Unit 4	Formal units for length Informal units for areas	Difference between Subtract Unit 4	Fact families Subtraction Unit 7	Fact families Subtraction Unit 7	Missing elements Patterns Unit 3	Formal probability language
Term 4	**DIVISION**			**FRACTIONS**		POSITION	**PLACE VALUE**			MASS, VOLUME, CAPACITY
	Daily calendar chat (days to important events) Weekly map chat about map from the local area Weekly spot-the-shapes photo									
	Equal shares in arrays Division Unit 2	Equal shares in arrays Division Unit 2	Quotition and skip-counting to divide Division 3	Halves, quarters, eighths Fractions Unit 2	Proper fractions Fractions Unit 3	Half, quarter turns Slide, flip	Three-digit numbers Place Value Unit 15	Round and estimate Unit 14	Renaming Place Value Unit 16	Equal-arm balance for mass, informal units for volume