

CALCULATION METHODS FOR NEW CURRICULUM

Year	Addition	Subtraction	Multiplication	Division
R	Songs / rhymes / games / activities using vocabulary	Songs / rhymes / games / activities using vocabulary	Songs / rhymes / games / activities using vocabulary	Songs / rhymes / games / activities using vocabulary
1	Use number track Marked number line Empty number line	Number track to count back and on Marked number line Empty number line Use resources to find difference between	Practical problems involving grouping. Arrays	Practical activities involving sharing then grouping. Arrays
2	Empty number line Partitioning Partitioning bridging tens	Empty number line within 100 to count back in ones and tens Partitioning on empty number line (use in conjunction with 100 square) Empty number line to count on to find difference between Then numbers that bridge 100 using 200 square	Combining groups (repeated addition) Using arrays to support multiplication Empty number line (linking to repeated addition).	Sharing and grouping Arrays Empty number line to count forward and jump back to make link between repeated subtraction.
3	Empty number line bridging 100 Expanded written method Formal written method (2 digits) Then bridge tens Then 3 digits + 2 digits	Empty number line bridging 100, larger numbers by counting back and counting on to find difference Expanded written method (no exchanging) Formal written method Then expanded written method with exchanging Formal written method with exchanging	Number lines and arrays Partitioning of teen number by 1 digit number. Partitioning using number line Grid method Expanded short multiplication Formal short multiplication (with carrying)	Empty number line to count forward and jump back to make link between repeated subtraction. Introduce formal layout using \times/\div facts that they know.
4	Empty number lines with 3 and 4 digit numbers. Expanded method Formal written method (3 digits) Then 4 digits + 3 digits	Empty number lines with 3 and 4 digits Expanded then formal written method Then 3 digits from 3 digits and 4 digits from 4 digits with exchanging	Empty number lines Grid method (2 digits \times 1 digit) Then expanded short multiplication Then short multiplication (formal method). Grid (3 digits \times 1 digit) then expanded then short multiplication.	Formal written layout for division for \times tables they know. Introduce remainders. Partitioning Empty number lines Formal written method of short division (bus stop)

5	Empty number lines with larger numbers and decimals. Formal written method	Empty number lines with larger numbers and decimals. Formal written method where more than 1 exchange is done. Subtraction of decimals in context of money and measures. Formal written methods with large numbers and decimals.	Formal short method of multiplication (2 digits x 1 digit) Grid (2 digits by 2 digits) Expanded long multiplication (2 digits x teen number) Compact long multiplication Then larger 2 digit numbers (grid, expanded then compact). Then short and long method with decimals in context of money and measures.	Formal written method of short division with whole number answers. Then with remainders.
6	Formal written method with larger numbers, decimals and use to solve problems.	Formal written method with larger numbers, decimals and use to solve problems.	Formal short and formal long multiplication method with larger numbers and decimals (returning to grid and expanded if necessary).	Formal method of short division with and without remainders. Formal method of long division with remainders as fractions or decimal.