

Year 4 Written Methods of Calculation

ADDITION

Written method used in addition calculations in Year 4 are outlined below.

Expanded Partitioning Method

$$879 + 45 = 924$$

$$\begin{array}{r} 800 + 70 + 9 \\ \quad 40 + 5 \\ \hline 800 + 110 + 14 \end{array}$$

Vertical expanded Method of Addition

$$\begin{array}{r} 587 \\ + 675 \\ \hline 12 \\ 150 \\ \hline 1100 \\ \hline 1262 \end{array}$$

Standard Method of Column Addition

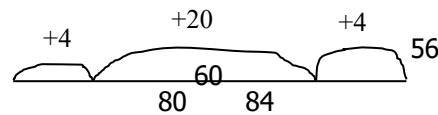
$$\begin{array}{r} 587 \\ + 675 \\ \hline 1262 \\ 11 \end{array}$$

SUBTRACTION

Written method used in subtraction calculations in Year 4 are outlined below.

Complimentary Addition Using empty numberlines

$$84 - 56 =$$



$$84 - 56 = 28$$

Expanded Partitioning Method $643 - 98 = 545$

$$\begin{array}{r} 500 \quad 130 \\ 600 + 40 + 13 \\ \quad 90 + 8 \\ \hline 500 + 40 + 5 \end{array}$$

Standard Method of Subtraction (decomposition)

$$\begin{array}{r} 646 \\ - 268 \\ \hline 378 \end{array} \quad \begin{array}{r} 409 \\ - 276 \\ \hline 133 \end{array}$$

For numbers which need to be subtracted but are close together, children would be encouraged to count on in their heads, maybe with jottings.

MULTIPLICATION

Written method used in multiplication calculations in Year 4 are outlined below.

Expanded method

$$\begin{array}{r} 32 \\ \times 3 \\ \hline 6 \quad (2 \times 3) \\ 90 \quad (30 \times 3) \\ \hline 96 \end{array}$$

Formal method

$$\begin{array}{r} 32 \\ \times 3 \\ \hline 96 \end{array}$$

DIVISION

Written method used in division calculations in Year 4 are outlined below.

Remind children about using their times tables and about dividing by 10.

Written Division

$$78 \div 5$$

$$5 \overline{) 78} \begin{array}{l} 15 \\ \hline \end{array}$$

Remainder: 3