

Multiplication with

Strategy 1: Count On (from 11x)

$$\begin{aligned} & \mathbf{12 \times 7} \\ & = \mathbf{7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7} \\ & \quad \underbrace{\hspace{10em}} \\ & = \mathbf{(11 \times 7) + 7} \end{aligned}$$

Strategy 2: Partial Products

$$\begin{aligned} & \mathbf{12 \times 7} \\ & = \mathbf{7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7 + 7} \\ & \quad \underbrace{\hspace{10em}} \quad \underbrace{\hspace{2em}} \\ & = \mathbf{(10 \times 7) + (2 \times 7)} \end{aligned}$$

Distributive Property

$$\begin{aligned} & \mathbf{12 \times 7} \\ & \quad \underbrace{\hspace{1.5em}} \quad \underbrace{\hspace{1.5em}} \\ & = \mathbf{(10 + 2) \times 7} \\ & = \mathbf{(10 \times 7) + (2 \times 7)} \end{aligned}$$

Strategy 3: Factors (& Associative Property of Multiplication)

$$\begin{aligned} & \mathbf{12 \times 7} \\ & = \mathbf{2 \times 6 \times 7} \\ & \quad \underbrace{\hspace{2em}} \\ & = \mathbf{2 \times 42} \\ & = \mathbf{42 + 42} \end{aligned}$$