

End-of-year review: number, measures and shape

MODULE 10 · ALGEBRA — PATTERNS, RULES AND NUMBER SENTENCES

ALGEBRA

HOW TO ANSWER TODAY

- **Value of a digit.** Find which place the digit sits in, then write what it is worth there as a number (not the place name).

In 3,742 the digit 7 sits in the hundreds place. Its value is 700.

- **Convert units.** To a SMALLER unit → multiply. To a BIGGER unit → divide. Common factors:
 $\text{cm} \leftrightarrow \text{mm} \times 10$, $\text{m} \leftrightarrow \text{cm} \times 100$, $\text{km} \leftrightarrow \text{m} \times 1,000$, $\text{kg} \leftrightarrow \text{g} \times 1,000$, $\text{l} \leftrightarrow \text{ml} \times 1,000$.

$$250 \text{ cm} \rightarrow \text{m}: \div 100 = 2.5 \text{ m} \cdot 3.5 \text{ kg} \rightarrow \text{g}: \times 1,000 = 3,500 \text{ g}$$

 STRETCH PROBLEMS

- 1** The class bird-feeder chart shows that **4,531** birds have visited the classroom window since September. Write **4,531** in expanded form.

- 2 The noticeboard at the mart in Cork lists 8,006 calves sold this year. In the number 8,006, what is the value of the digit 8?

- 3 The school noticeboard shows that 4,857 books were borrowed from the library this year. Write 4,857 in expanded form.

- 4 Tadhg's robotics team measures the wire for their classroom robot and it is **72 cm** long. To label it on their build sheet, they need the length in millimetres. How many millimetres long is the wire?

- 5 The school's stationery store card shows 3,164 pencils have been handed out this year. Write 3,164 in expanded form.