# Increasing and decreasing by a fraction of an amount
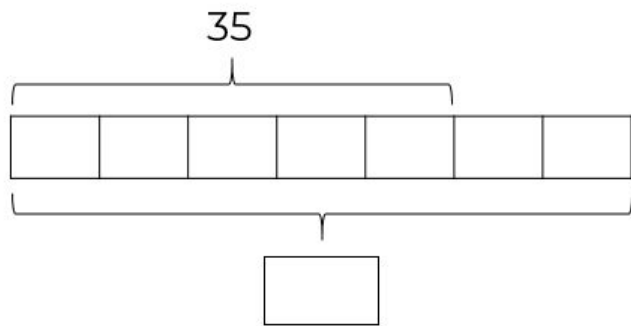
Maths

Mr Chan

# Increasing by a fraction of an amount

1. Use the bar model to increase 35 by $\frac{2}{5}$

35



2. Beth is asked to decrease £55 by $\frac{2}{11}$

Here is her beginning of her working out.

$$55 \div 11 = 5$$
$$2 \times 5 = 10$$

What is the final calculation in working out?

# Increasing by a fraction of an amount

3. Work out the following.

a) Increase 600kg by $\frac{2}{3}$

b) Decrease $65 by $\frac{4}{5}$

c) Increase 7.5km by $\frac{3}{10}$

d) Decrease 63 mm by $\frac{6}{7}$

4. Emily has found the same TV in two different stores.

**TV World**
Normal price £450
Special offer
$\frac{1}{3}$ off normal price today!

**TV me TV you**
Normal price £387.50
Special offer
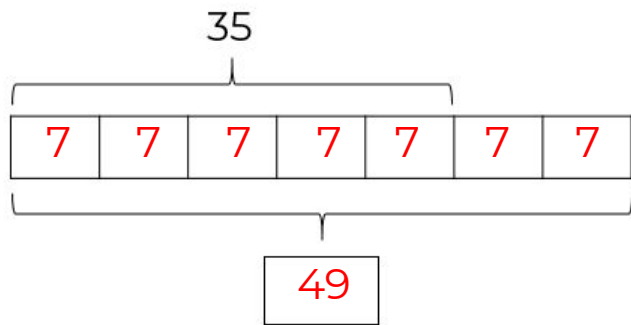$\frac{1}{5}$ off normal price today!

Which store is the TV cheapest in?

# Answers

# Increasing by a fraction of an amount

1. Use the bar model to increase 35 by $\frac{2}{5}$

35

| 7 | 7 | 7 | 7 | 7 | 7 | 7 |
|---|---|---|---|---|---|---|

49

2. Beth is asked to decrease £55 by $\frac{2}{11}$

Here is her beginning of her working out.

$$55 \div 11 = 5$$
$$2 \times 5 = 10$$

What is the final calculation in working out?

$$55 - 10 = 45$$

# Increasing by a fraction of an amount

3. Work out the following.

a) Increase 600kg  by $\frac{2}{3}$     1000 kg

b) Decrease $65 by $\frac{4}{5}$     $13

c) Increase 7.5km by $\frac{3}{10}$     9.75 kg

d) Decrease 63 mm by $\frac{6}{7}$     9 mm

4. Emily has found the same TV in two different stores.

> **TV World**
> Normal price £450
> Special offer
> $\frac{1}{3}$ off normal price today!

> **TV me TV you**
> Normal price £387.50
> Special offer
> $\frac{1}{5}$ off normal price today!

Which store is the TV cheapest in?

TV world £300 (cheapest)     TV me TV you £310