

Discount and increase – €30 reduced by 20%

WHAT THIS LESSON TEACHES

A **discount** is the amount taken off the original price. The **sale price** is what you actually pay: original – discount.

→ €80 with 10% off: discount = €8, sale price = **€72**.

→ €50 with 25% off: discount = €12.50, sale price = **€37.50**.

ANSWER KEY

a) Discount = €6 (20% of €30); sale = ****€24****.

b) Discount = €12.50 (25% of €50); sale = ****€37.50****.

c) Increase = €4; new price = ****€44****.

Q1: 480

Q2: €159.80 (discount: €28.20)

a) Always — Total parts = $2 + 3 = 5$; boys take 2 of those parts, so $\frac{2}{5}$.

b) Never — Common trap. $2:3$ is parts of a whole of 5, so boys are $\frac{2}{5}$, not $\frac{2}{3}$.

c) Always — Same number of parts each — exactly equal.

d) Always — $2:3 = 4:6 = 8:12$ — same proportion, same shares.

e) Always — Total parts = 6; one part = €5; the 5-part share = €25.

f) Sometimes — Often yes (boys:girls, jam:butter both in g), but cross-unit ratios exist (e.g. €/kg). Stay alert to units.

EXTENSION SHEET · STRETCH ANSWERS

S1: €295.09 (discount: €158.90)

S2: 21

S3: €153

S4: €311.94 (discount: €55.05)

S5: €78.60 (discount: €52.40)