

## Year 8 Class 9 questions

### Q1

What percentage is 275 grams of 2 kg?

% **13.75%**

### Q2

Find 3% of \$235.

\$  **\$7.05**

### Q3

Increase \$3200 by 35%.

\$  **\$4320**

### Q4

Find the profit or loss as a percentage of the cost price.

Cost price = \$15      Selling price = \$10.80

% **28%**

Is this a profit or a loss?

profit   loss

### Q5

A 3 metre long piece of ribbon is cut into two pieces in the ratio 3 : 2.

How long is the shorter piece?

metres **1.2 metres**

### Q6

Write 36 minutes as a percentage of 2 hours.

% **30%**

### Q7

Write 81 minutes as a percentage of 3 hours.

% **45%**

### Q8

Find  $\frac{1}{2}$ % of \$650.

\$  **\$3.25**

### Q9

Find 5.2% of 3.5 m.

m **0.182 m**

### Q10

Increase \$190 by 22.5%.

\$  **\$232.75**

### Q11

Increase \$300 by 2.4%.

\$  **\$307.20**

### Q12

Maria buys a coat for \$450 and sells it for \$500. Calculate (to 1 d.p.) her profit as a percentage of the cost price.

% **11.1%**

**Q13**

Albert buys a lounge for \$3200 and sells it for \$2100. Calculate (to 1 d.p.) his loss as a percentage of the cost price.

% 34.4%

**Q14**

A sweets mix contains Jellies, Smarties and Bananas in the ratio 8:9:10.

If there are 864 sweets in total, how many are Smarties?

288

**Q15**

*Tropicana* is made by mixing orange juice, pineapple juice and passionfruit juice in the ratio 5:3:2. How much orange juice is needed to make 2 litres of *Tropicana*?

mL 1000 mL

**Q16**

Jena scored 21 out of 25 on a test.

What percentage is this?  % 84%

**Q17**

Vikki has run 11.7 km of the 18 km course.

What percentage is this?  % 65%

**Q18**

Tony has cycled 90 km of the 125 km course.

What percentage is this?  % 72%

**Q19**

Find  $16\frac{2}{3}\%$  of 3 t.

t 0.5 t

**Q20**

Find  $15\frac{1}{3}\%$  of 300 kg.

kg 46 kg

**Q21**

Find  $75\frac{1}{3}\%$  of 6 km.

km 4.52 km

**Q22**

Tom's bike cost him \$250 and he wants to sell it to make a 20% profit. What price should he sell it for?

\$  \$300

**Q23**

UFO sightings increased by 95% from 1968 to 1969. If 80 UFO's were seen in 1968, how many were spotted in 1969?

156

**Q24**

Mary's dress cost her \$160 and she wants to sell it to make a 15% profit. What price should she sell it for?

\$  \$184

**Q25**

Kate buys cans of soft drink in boxes for \$6 and sells it for \$10. Calculate her profit as a percentage of the selling price.

% 40%

**Q26**

Maya buys a laptop for \$1200 and sells it for \$745. Calculate (to 1 d.p.) her loss as a percentage of the selling price.

% 61.1%

**Q27**

Nancy buys a house for \$450 000 and sells it for \$525 000. Calculate (to 1 d.p.) her profit as a percentage of the selling price.

% 14.3%

**Q28**

A class of 30 students contains boys and girls in the ratio 2:3.

How many more girls are there than boys?

6

**Q29**

2 tonnes of gravel mix contains river stone and blue metal in the ratio 3:7.

How much more blue metal is there than river stone?

kg 800 kg

**Q30**

A fruit drink is made using orange, pineapple and passionfruit juice in the ratio 3:2:1.

How much more pineapple juice than passionfruit juice is there in 2.4 litres of the drink?

mL 400 mL