

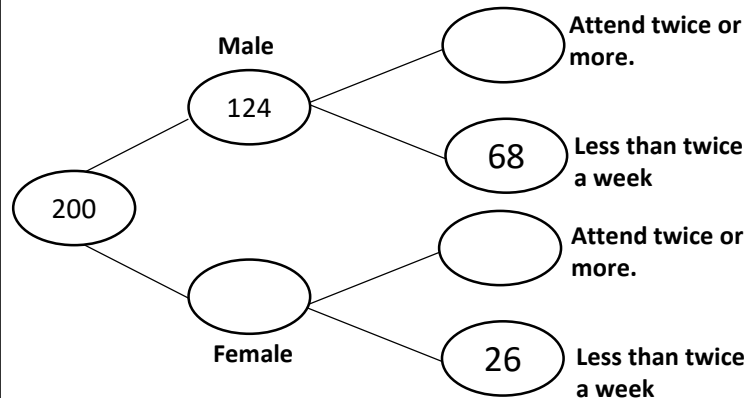


Timester Challenge

Frequency Trees



Complete the frequency tree which represents the 200 members of a gym and their use of the gym.



Calculate the percentage of people attending twice or more a week.

Calculate the percentage of females who attend less than twice a week?

Bronze ★

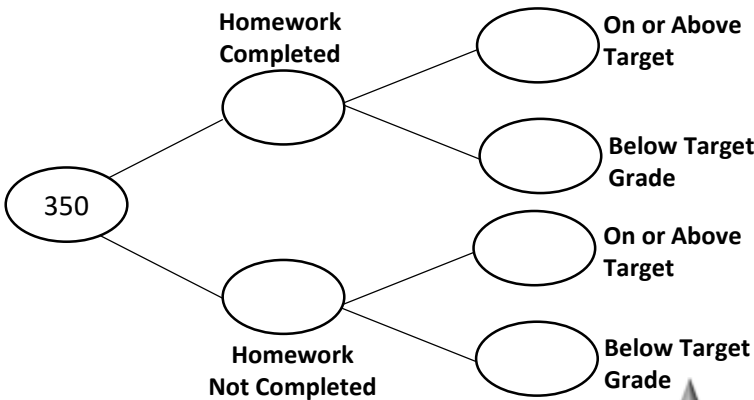
A school conducted research into the impact that completing homework has on students end of year 11 grades.

240 out of the 350 students completed their homework regularly.

85% of students got their target grade or higher when they completed their homework regularly .

70% of students who didn't complete their homework regularly got below their target grade.

Complete the frequency tree.



Silver ★

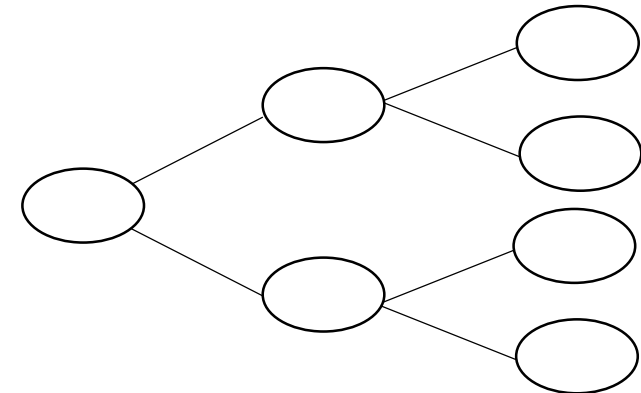
80 teachers were asked if they prefer tea or coffee.

$\frac{3}{8}$ of the teachers were male.

Double the amount of male teachers preferred tea than coffee.

The female teachers preferred tea and coffee in the ratio of 2:3.

Complete the frequency tree.



You select a teacher at random. What is the likelihood the teacher is a female who prefers drinking tea?

Gold ★



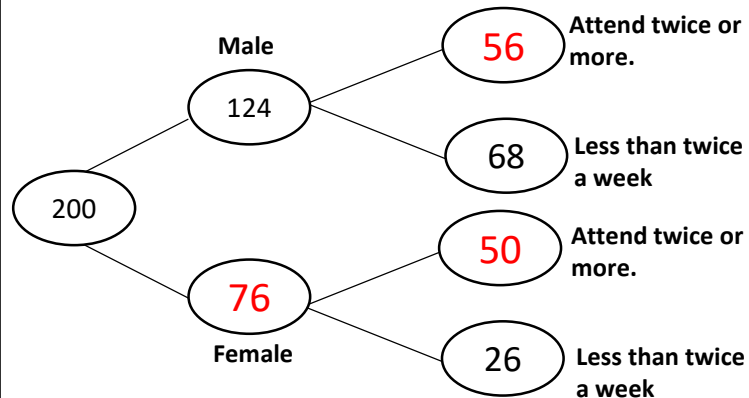
Timester Challenge

Frequency Trees

Answers



Complete the frequency tree which represents the 200 members of a gym and their use of the gym.



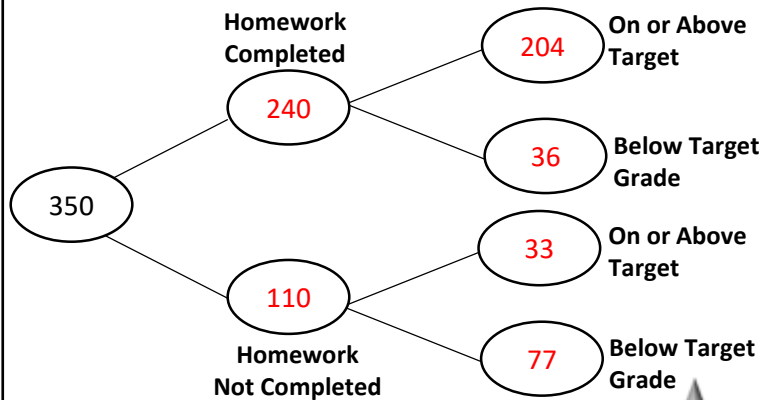
Calculate the percentage of people attending twice or more a week. $\frac{56 + 50}{200} = \frac{106}{200} = \frac{53}{100} = 53\%$

Calculate the percentage of females who attend less than twice a week?

$$\frac{26}{76} \times 100 = 34.2\%$$

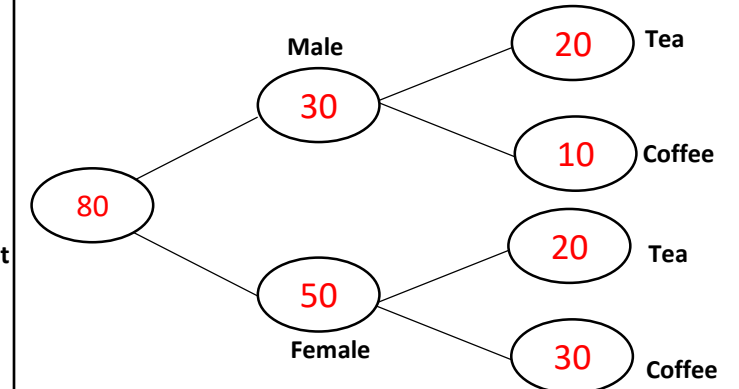
Bronze ★

A school conducted research into the impact that completing homework has on students end of year 11 grades. 240 out of the 350 students completed their homework regularly. 85% of students got their target grade or higher when they completed their homework regularly. 70% of students who didn't complete their homework regularly got below their target grade. Complete the frequency tree.



Silver ★

80 teachers were asked if they prefer tea or coffee. $\frac{3}{8}$ of the teachers were male. Double the amount of male teachers preferred tea than coffee. The female teachers preferred tea and coffee in the ratio of 2:3. Complete the frequency tree.



You select a teacher at random. What is the likelihood the teacher is a female who prefers drinking tea?

$$\frac{20}{80} = \frac{2}{8} = \frac{1}{4}$$

Gold ★