INVERSE PROPORTION
SKILLS QUESTIONS

Remember to multiply to find the TOTAL first.

Q1. Three horses have enough food for 5 days.
(a) What is the total amount of food?
(b) How long would the same amount of food last for 6 horses?
(Assume that each horse eats the same amount per day.)

Q2. Five cattle have food for 8 days.
(a) What is the total amount of food?
(b) How long would the same amount of food last for 4 cattle?

Q3. A job requires 10 people to 60 hours of work each.
(a) What is the total of man-hours for this job?
(b) How long would it take 15 people to do the same job?

Q4. Nine trucks can move a pile of rubble if each make 8 trips.
(a) What is the total of truck-trips to do the job?
(b) If only 6 trucks were used, how many trips would each truck have to make?

Q5. A cyclist completes a journey in 4 hours at 15 km/h.
(a) What distance was travelled?
(b) If he had travelled at 20 km/h, how long would the trip have taken?

Q6. A car travels at 100 km/h for 5 hours.
(a) What distance was travelled?
(b) How long would the trip have taken at 80 km/h?

Q7. An army carries enough food for 500 soldiers for 3 days. How long will the same amount of food last for 750 soldiers?

Q8. A hospital kitchen stores enough food for 2000 patients for a week. How long would this food last 3500 patients?

Q9. To complete a task, 5 printing machines run constantly for 6 hours. To do the task in 4½ hours, how many machines would be needed?

Q10. To complete a task, 3 machines run constantly for 8 hours and 45 minutes. To complete the same task in 2⅛ hours, how many machines would be needed?

ANSWERS

Q1. (a) 15
(b) 2.5 days

Q2. (a) 40
(b) 10 days

Q3. (a) 600
(b) 40 hours

Q4. (a) 72
(b) 12 trips

Q5. (a) 60 km
(b) 3 hours

Q6. (a) 500 km
(b) 6.25 hours

Q7. 2 days

Q8. 4 days

Q9. 6.6 rounded up to 7 printers

Q10. 12.4 rounded up to 13 machines