SPEED APPLICATIONS RUNNING PERFORMANCE



Q1. The table below shows the average running speed (in metres per second) and length of running stride of 3 people.

Name	Speed	Running Stride	
Donna	6.8 m/s	1.4 m	
Sarah	7.3 m/s	1.7 m	
Jacqui	5.9 m/s	1.2m	

(a) How many strides would Donna need to complete the race over 100 metres?

(b) How many seconds would Sarah need to complete a race over 200 metres?

(c) How many strides would Jacqui have taken for 800 metres?



Q2. Chris can run the 100 m sprint in 12.3 seconds and Matt can run 200 m in 25.7 s.

(a) If Chris could maintain the same speed from the 100 m race for the 200 m race, what time would he have clocked?(b) What would be the difference in time between Chris and Matt for the 200 metres?

Q3. Complete the table of speeds of athletes in a 100 metres race.

Lane	Name	Time	Speed (m/s)
1	Petra	13.53 s	
2	Teri	12.37 s	
3	Diane	12.18 s	
4	Michelle	12.10 s	
5	Robyn	12.95 s	
6	Colleen	13.24 s	

ANSWERS

Q1. (a) 72 (b) 27.4 s (c) 667

Q2. (a) 24.6 s (b) 1.1 s

Q3. Petra 7.4 Teri 8.1 Diane 8.2 Michelle 9.9 Robyn 7.7 Colleen 7.6