## Travel Graphs (Distance/Time Graphs) - www.m4ths.com - Steve Blades ©

(1) The diagram below shows a distance/time graph. The graph represents a journey Bobni made from his house.

(a) Find the speed Bobni travelled at for the first section of the journey.
(b) Describe what Bobni was doing for the second hour of the journey.
(c) Show that the speed for the $3^{\text {rd }}$ section of the journey was 12 mph .
(d) For how long was Bobni stationary for in total?
(e) When did Bobni start travelling back towards his house?
(f) Find the speed for the last section of travel.
(g) Find the total distance covered.
(h) Find the average speed for the whole journey excluding the breaks.
(2) Use the distance/time graph below to find the average speed of the entire journey

(3) The diagram below shows a distance/time graph for a journey from Town A.

(a) At what time was the person the furthest from Town A?
(b) State when the person was stationary.
(c) Find the average speed for the first part of the journey.
(d) How far were they from A when they finished the journey?
(e) Between what times was the person moving fastest?
(f) What was the total distance the person covered?
(4) Draw a distance/time graph suing the following information:

- The person travels from home for 6 miles in 2 hours.
- The person then rests for 3 hours
- The person then returns home in 1 hours.
(5) Draw a distance/time graph suing the following information:
- The person starts 2 miles from Point $A$
- The person then travels 10 miles in 4 hours
- The person then is stationary for an hour.
- The person then returns to point A in 2 hours.
(6) Draw ANY 2 different distance/time graph where the person travels to and from a fixed point at the same speed (a) Without a break and (b) With a break.

