Question 1.The following graph shows the temperature of a patient in a hospital, recorded every hour.
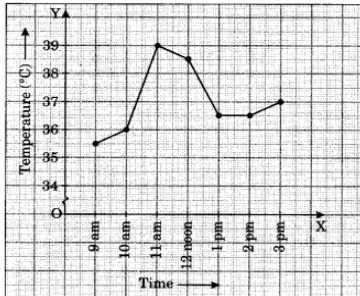

(a) What was the patient's temperature at 1 pm?

(b) When was the patient's temperature 38.5°C?

(c) The patient's temperature was the same two times during the period given. What were the two times?

(d) What was the temperature at 1:30 pm? How did you arrive at your answer?

(e) During which periods did the patient's temperature show an upward trend?

Solution:

(a) The patient's temperature at 1 pm was 36.5°C

(b) The patient's temperature was 38.5°C at 12:00 noon.

(c) The patients temperature was 36.5°C at 1 pm and 2 pm.

(d) The temperature at 1:30 pm was 36.5°C. We have taken the mid value of 1 pm. and 2 pm, i.e., 1:30 p.m and proceed perpendicularly upwards to meet the horizontal line showing 36.5°C.

(e) During 9 am to 10 am and 10 am to 11 am, the temperature showed upwards trend.

Question 2.The following line graph shows the yearly sales figures for a manufacturing company.
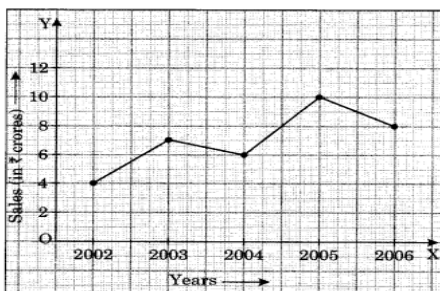
(a) What were the sales in (i) 2002 (ii) 2006?

(b) What were the sales in (i) 2003 (ii) 2005?

(c) Compute the difference between the sales in 2002 and 2006.

(d) In which year was there the greatest difference between the sales as compared to its previous year?

(a) The sales in the year 2002 was Rs 4 crore and in the year 2006 was Rs 8 crore.
(b) The sales in the year 2003 was Rs 7 crore and in 2005 was Rs 10 crore.
(c) Sales in 2002 = Rs 4 crore
Sales in 2006 = Rs 8 crores
Difference = Rs (8 – 4) crore = Rs 4 crore.
(d) The greatest difference between the sales was in the year 2005, as compared to previous year.

Question 3.For an experiment in Botany, two different plants, plant A and plant B, were grown under similar laboratory conditions. Their heights were measured at the end of each week for 3 weeks. The results are shown by the following graph.
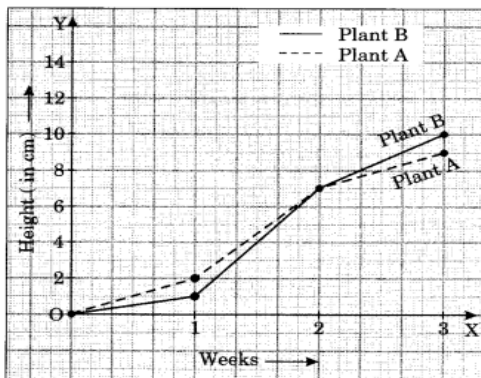
(a) How high was plant A after (i) 2 weeks (ii) 3 weeks
(b) How high was plant B after (i) 2 weeks (ii) 3 weeks
(c) How much did plant A grow during the 3rd week?
(d) How much did plant B grow from the end of the 2nd week to the end of the 3rd week?
(e) During which week did plant A grow most?
(f) During which week did plant B grow least?
(g) Were the two plants of the same height during any week shown here? Specify.

Solution:
(a) The height of plant A (i) after 2 weeks was 7 cm (ii) after 3 weeks was 9 cm.
(b) The height of plant B (i) after 2 weeks was 7 cm (ii) after 3 weeks was 10 cm.
(c) Plant A grew 7 cm to 9 cm i.e, 2 cm.
(d) Plant B grew 7 cm to 10 cm i.e., 3 cm.
(e) Plant A grew most in a 2nd week i.e., 5 cm.
(f) Plant B grew the least in a first week i.e., 1 cm.
(g) Yes, the two plants grew the same height at the end of 2nd week i.e., 7 cm.