Chapter-statistics

Q1.

Compute the median from the following data

Mid value	115	125	135	145	155	165	175	185	195
Frequency	6	25	48	72	116	60	38	22	3

Q2.

If median height of 50 students of a class in the following frequency distribution is 144 cm, find the missing frequencies x and y

Height (in cm)	**125–130**	**130–135**	**135–140**	**140–145**	**145–150**	**150–155**	**155–160**
No. of students	**2**	**4**	***x***	***y***	**8**	**9**	**5**

Q3.

Determine the missing frequency *x*, from the following data, when Mode is 67.

Class	**40–50**	**50–60**	**60–70**	**70–80**	**80–90**
Frequency	**5**	***x***	**15**	**12**	**7**

Q4.

The average score of boys in the examination of a school is 71 and that of the the girls is 73. The average score of the school in the examination is 71.8. Find the ratio of the number of boys to the number of girls who appeared in the examination.

Q5.

In a retail market, fruit vendor were selling mangoes in packing boxes. These boxes contained varying number of mangoes. The following was the distribution:

No. of mangoes	**50–52**	**53–55**	**56–58**	**59–61**	**62–64**
No. of boxes	**15**	**110**	**135**	**115**	**25**

Find the mean and median number of mangoes kept in a packing box.

Q6.

6. If the median of the following frequency distribution is 32.5. Find the values of f_1 and f_2.

Class	Frequency
0–10	f_1
10–20	5
20–30	9
30–40	12
40–50	f_2
50–60	3
60–70	2
Total	40

Q7.

The mean of 'n' observation is $\bar{x}$, if the first term is increased by 1, second by 2 and so on.

What will be the new mean.

Q8.

. The mean of the following frequency distribution is 50. But the frequencies f_1 and f_2 in class 20-40 and 60-80 are missing. Find the missing frequencies.

Class interval	0-20	20-40	40-60	60-80	80-100	Total
Frequency	17	f_1	32	f_2	19	120

Q9.

Marks obtained by 70 students are given below:

Marks	20	70	50	60	75	90	40
No. of Students	8	12	18	6	9	5	12

Find the median

Q10.

Show that the mode of the series obtained by combining the two series S_1 and S_2 given below is different from that of S_1 and S_2 taken separately:

S_1: 3, 5, 8, 8, 9, 12, 13, 9, 9

S_2: 7, 4, 7, 8, 7, 8, 13