EduSahara™ Worksheet

Name : Chapter Based Worksheet

Chapter : Statistics

Grade : ICSE Grade VIII

1. The marks obtained by 13 students in a test are given below. Find their mean marks.

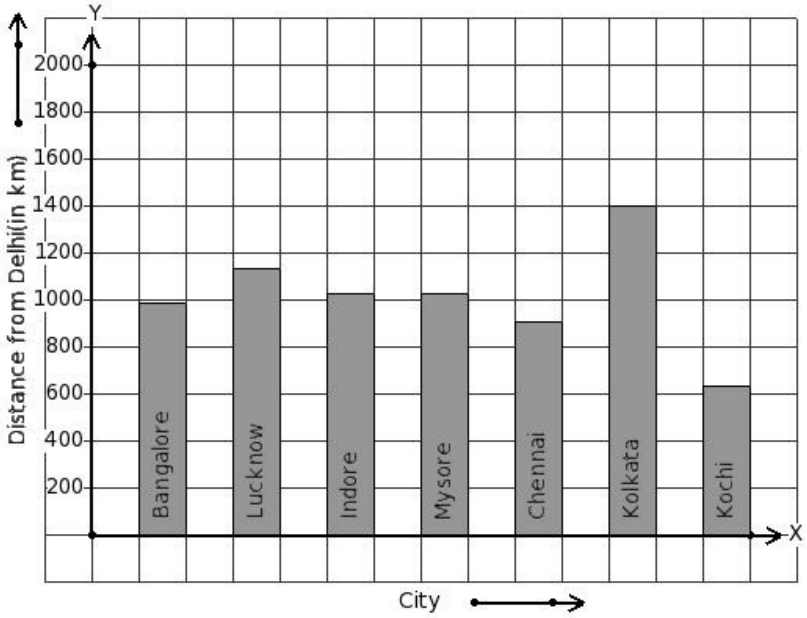
17 7 17 16 33 31 34 32 1 29 25 41 6

(i) $\frac{287}{13}$ (ii) $\frac{291}{13}$ (iii) $\frac{245}{11}$ (iv) $\frac{111}{5}$ (v) $\frac{289}{13}$

2. Find the median of all the factors of 20.

(i) $\frac{9}{2}$ (ii) $\frac{11}{2}$ (iii) $\frac{7}{2}$ (iv) 5 (v) $\frac{17}{4}$

3. The air distance of some cities from Delhi (in km) are given below. Find the city that has minimum distance.



(i) Lucknow (ii) Kochi (iii) Chennai (iv) Indore (v) Bangalore

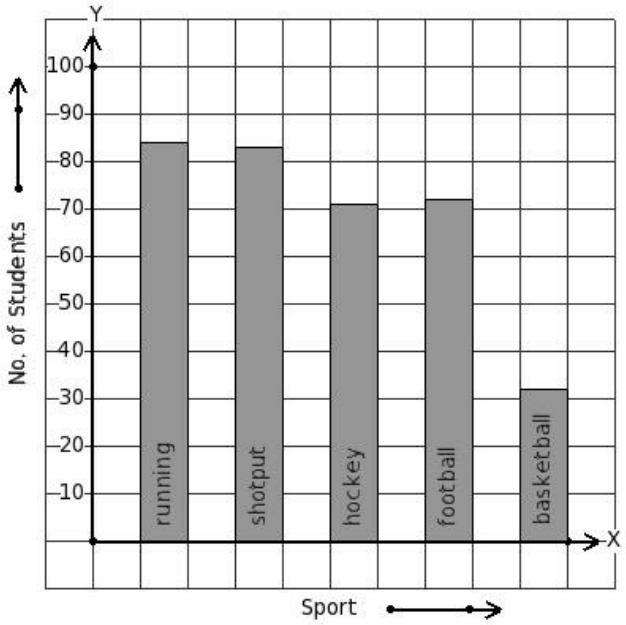
4. If the lower and upper limit of class interval are 24 and 27 respectively, then the class interval is

(i) 24-27 (ii) 23.5-27.5 (iii) 24.5-26.5 (iv) 23.5-27 (v) 24-27.5

5. In inclusive form representation, the observation 59 falls in which class?

(i) 48-58 (ii) 49-59 (iii) 39-49 (iv) 44-54 (v) 60-69

6. The number of bars present in the bar chart of the following table is



(i) 4 (ii) 2 (iii) 6 (iv) 8 (v) 5

7. Find the median of the first 20 odd numbers.

(i) 20 (ii) 21 (iii) 19 (iv) 18 (v) 23

8. Scores of 11 students are given below. Find the mean score.

76 89 71 77 75 87 78 79 81 75 75

(i) $\frac{885}{11}$ (ii) $\frac{865}{11}$ (iii) $\frac{864}{11}$ (iv) $\frac{863}{11}$ (v) $\frac{874}{11}$

9. Weights of 30 students are given below. Find the mean.

Weight (in kg)	40	44	45	46	52	53	55	56	58
No. of students	3	5	4	3	3	2	4	4	2

(i) 50 kg (ii) $\frac{148}{3}$ kg (iii) $\frac{151}{3}$ kg (iv) $\frac{154}{3}$ kg (v) $\frac{149}{3}$ kg

10. Given the mean of 10 samples as $6\frac{1}{2}$,

what is the new mean if two samples 9 and 9 are added ?

(i) $\frac{85}{12}$ (ii) $\frac{27}{4}$ (iii) $\frac{83}{12}$ (iv) $\frac{71}{10}$ (v) $\frac{95}{14}$

11. If the mean of 10 8 5 2 x 9 1 6 is $5\frac{1}{2}$, find the value of x.

(i) 4 (ii) 0 (iii) 3 (iv) 2 (v) 6

12. Temperatures of 30 days are given below. Find the median.

Temperature (in degree C)	25	26	27	28	29	30	31	32	33	34	35
No. of days	1	3	3	6	2	3	2	2	2	5	1

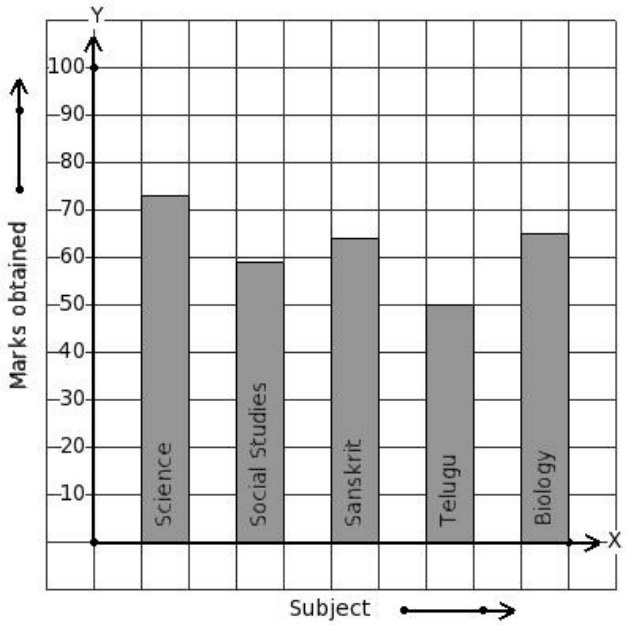
(i) $\frac{63}{2}$ °C (ii) 30 °C (iii) $\frac{59}{2}$ °C (iv) $\frac{61}{2}$ °C

13. The upper limit of the class with frequency x is

Class-Interval	Frequency
12 - 17	x
17 - 22	24
22 - 27	16
27 - 32	16
32 - 37	29

(i) 14 (ii) 17 (iii) 20 (iv) 16 (v) 18

14. The marks obtained by Krishna in his annual exam are shown below. Find the subject that has minimum score.



(i) Sanskrit (ii) Telugu (iii) Social Studies (iv) Science (v) Biology

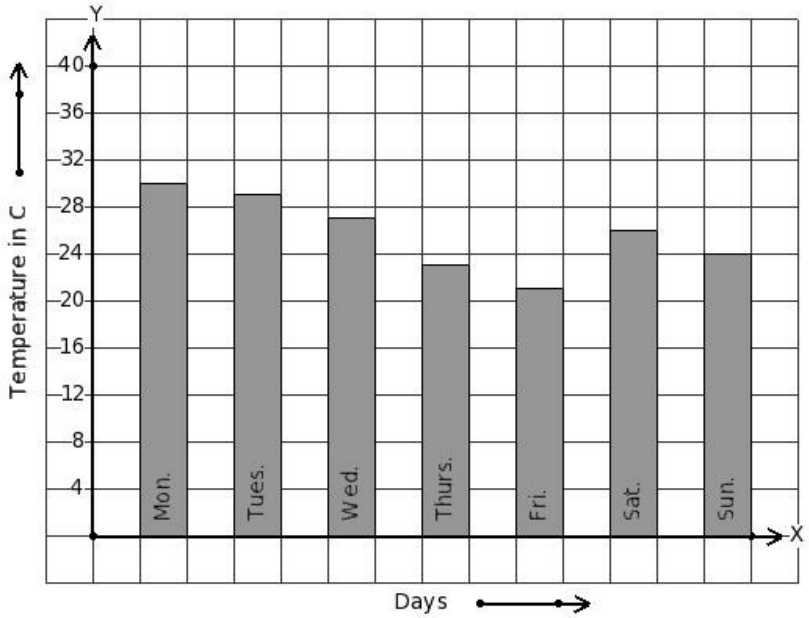
15. Find the median of all prime numbers between 30 and 80.

(i) 54 (ii) 55 (iii) 57 (iv) 56 (v) 59

16. The observations of an ungrouped data are x_1, x_2, x_3 and $x_1 < x_2 < x_3$.
If the mean and median of the data are 60 and 40 respectively and $x_3 - x_1 = 100$,
find x_1, x_2, x_3

(i) $40, 40, 240$ (ii) $22, 40, 122$ (iii) $24, 40, 124$ (iv) $20, 40, 120$

17. Following bar graph gives the average temperature of a place during a week. Find the day that has maximum temperature.



(i) Mon. (ii) Sun. (iii) Sat. (iv) Tues. (v) Wed.

18. Heights of 10 students (in cm) are given below. Find the median height.

154 133 145 159 171 157 171 170 148 143

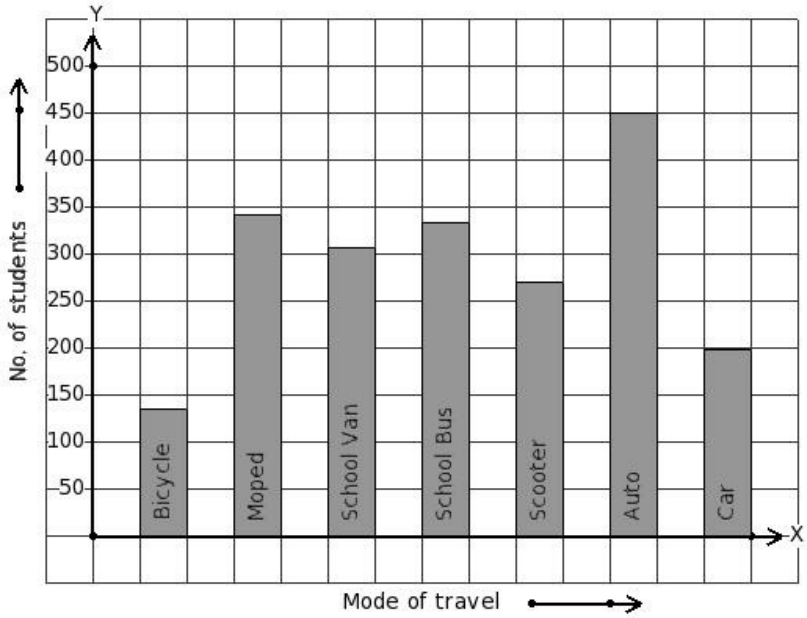
(i) $\frac{315}{2}$ cm (ii) $\frac{311}{2}$ cm (iii) 156 cm (iv) $\frac{313}{2}$ cm

19. Scores of 15 students are given below. Find the mode score.

75 81 71 72 76 76 87 70 77 87 80 73 86 72 72

(i) 73 (ii) 70 (iii) 72 (iv) 71 (v) 74

20. 2034 students of a school use different modes of travel to school. Identify the table for the given bar diagram.



(i)

Mode of travel	Bicycle	Moped	School Van	School Bus	Scooter	Auto	Car
No. of students	135	198	306	333	342	450	270

(ii)

Mode of travel	Bicycle	Moped	School Van	School Bus	Scooter	Auto	Car
No. of students	450	342	198	333	270	135	306

(iii)

Mode of travel	Bicycle	Moped	School Van	School Bus	Scooter	Auto	Car
No. of students	135	342	306	333	270	450	198

(iv)

Mode of travel	Bicycle	Moped	School Van	School Bus	Scooter	Auto	Car
No. of students	450	342	270	306	333	135	198

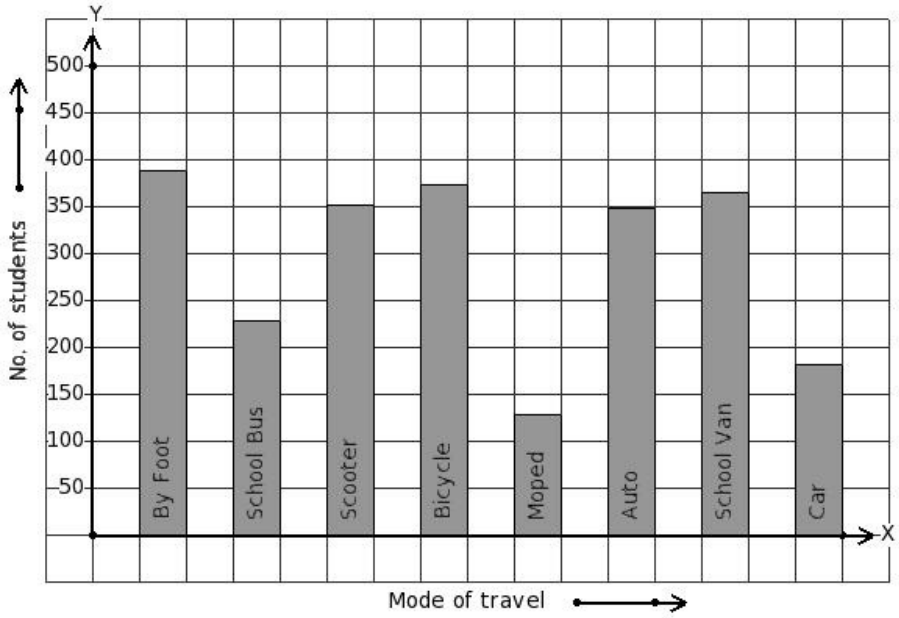
(v)

Mode of travel	Bicycle	Moped	School Van	School Bus	Scooter	Auto	Car
No. of students	198	342	270	333	450	135	306

21. The mean of 5 numbers is $10\frac{1}{5}$. Upon excluding one number, the mean becomes $11\frac{3}{4}$. Find the excluded number.

(i) 2 (ii) 5 (iii) 7 (iv) 3 (v) 4

22. Students of a certain locality use different modes of travel to school as given below. Find the mode of travel that has minimum students.



(i) Scooter (ii) Bicycle (iii) Moped (iv) School Bus (v) By Foot

23. Identify the frequency distribution table for the given ages of 10 students in years

13 17 21 17 15 13 14 23 18 19

(i)

Age (in years)	13	15	17	18	19	21	23
No. of Students	2	1	3	1	1	1	1

(ii)

Age (in years)	12	13	15	16	18	21	23	24
No. of Students	1	2	2	1	1	1	1	1

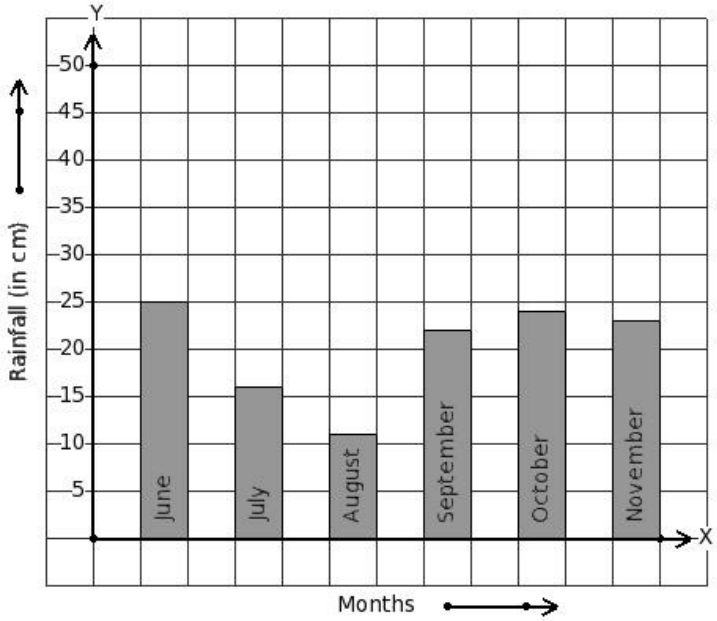
(iii)

Age (in years)	11	14	15	16	17	18	21	23
No. of Students	1	1	2	2	1	1	1	1

(iv)

Age (in years)	13	14	15	17	18	19	21	23
No. of Students	2	1	1	2	1	1	1	1

24. Read the given column-graph. Find the month that has minimum rainfall.



(i) November (ii) June (iii) September (iv) August (v) July

25. Which of the following are discrete variables?

a) Rainfall at a place over a month
b) Number of workers in a factory
c) Weights of persons in a group
d) Marks obtained by student in a particular subject
e) Heights of children in a class

(i) {c,d,b} (ii) {c,d} (iii) {b,d} (iv) {a,b} (v) {e,a,b}

Assignment Key

1) (v)	2) (i)	3) (ii)	4) (i)	5) (ii)	6) (v)
7) (i)	8) (iv)	9) (ii)	10) (iii)	11) (iii)	12) (iii)
13) (ii)	14) (ii)	15) (iv)	16) (iv)	17) (i)	18) (ii)
19) (iii)	20) (iii)	21) (v)	22) (iii)	23) (iv)	24) (iv)
25) (iii)					