

# INTERNATIONAL INDIAN SCHOOL, RIYADH

**CLASS: X**

**TOPIC: STATISTICS**

1. The median of the following data is 525. Find the values of  $x$  and  $y$ , if the total frequency is 100 (9, 15)

C.I	0 - 100	100-200	200 - 300	300 - 400	400-500	500-600	600-700	700-800	800-900	900-1000
F	2	5	$x$	12	17	20	$y$	9	7	4

2. The median of the data is 28. Find the values of  $x$  and  $y$ , if the total frequency is 50 (8, 16)

Marks	0 - 10	10 - 20	20 - 30	30 - 40	40 - 50
No of students	5	$x$	15	$y$	6

3. If the mean of the following distribution is 27, find the value of  $p$  (P = 7)

C. I	0 - 10	10 - 20	20 - 30	30 - 40	40 - 50
F	8	$P$	12	13	10

4. Find the missing frequency: mean = 50, Total frequency = 120 (28, 24)

$x$	10	30	50	70	90
$f$	17	$F_1$	32	$F_2$	19

5. The mean of the following frequency distribution is 132 and the sum of the observations is 50. Find the Missing frequencies  $f_1$  and  $f_2$  (10, 8)

C. I	0 - 40	40 - 80	80 - 120	120 - 160	160 - 200	200 - 240
F	4	7	$F_1$	12	$F_2$	9

6. Find the mean, median and mode of the following data (30, 30.67, 33.3)

C.I	0 - 10	10 - 20	20 - 30	30 - 40	40 - 50	50 - 60	60 - 70
F	6	8	10	15	5	4	2

7. The mode of the following frequency distribution is 55. Find the values of  $x$  and  $y$  (X = 7, Y = 5)

C. I	0 - 15	15 - 30	30 - 45	45 - 60	60 - 75	75 - 90
F	6	7	$Y$	15	10	$X$

8. For a given data less than ogive and more than ogive intersect at a point  $P(x, y)$ . Then what does abscissa of the Point represents

9. Write the empirical relationship between the three measures of central tendency

10. If median = 15 and mean = 16, find mode of the distribution (13)

11. Following is the distribution of marks obtained by 60 students: Calculate the arithmetic mean (26.5)

Marks	More than 0	more than 10	More than 20	More than 30	More than 40	More than 50
No of students	60	56	40	20	10	3

12. From the following data draw the two types of curves and find the median

C. I	200 - 220	220 - 240	240 - 260	260 - 280	280 - 300	300 - 320
F	7	3	6	8	2	4