

Q.5. calculate mean of the following data.

$$\bar{X} = \frac{96 + 180 + 98 + 75 + 270 + 80 + 102 + 100 + 94 + 75 + 200}{12}$$

$$= \frac{1980}{12} = 165 \text{ Ans.}$$

Discrete Series

Q.7. From the following frequency distribution find the mean height of the students:

f	X	Fx
5	160	800
10	162	1620
15	164	2460
30	166	4980
25	168	4200
10	170	1700
5	172	860
$\Sigma f = 100$		16620

$$\bar{X} = \frac{16620}{100}$$

$$= 166.20 \text{ cm Ans.}$$

(ii)

X	F	Fx
4	15	60
5	30	150
6	45	270
7	60	420
8	55	440
9	40	360
10	5	50
	$\Sigma F = 250$	$\Sigma Fx = 1750$

$\bar{X} = \frac{\Sigma Fx}{\Sigma F}$
 $= \frac{1750}{250}$
 $= 7$ Ans.

8. (i) Student of a school contributed towards national defence

F	X	Fx
10	5	50
15	4	60
24	3	72
30	2	60
21	1	21
$\Sigma F = 100$		$\Sigma Fx = 263$

$\bar{X} = \frac{\Sigma Fx}{\Sigma F}$
 $= \frac{263}{100}$
 $= 2.63$ Ans.

(ii) Below are the number of children of a certain locality

X	F	Fx
8	1	8
7	2	14
6	6	36
5	8	40
4	20	80
3	38	114
2	60	120
1	60	60
0	35	0
$\Sigma F = 230$		$\Sigma Fx = 472$

$\bar{X} = \frac{472}{230} = 2.05$ Ans.

(iii) calculate the mean number of accident per driver from the following

X	F	Fx
0	45	0
1	36	36
2	40	80
3	19	57
4	12	48
5	8	40
6	3	18
7	2	14
8	1	8
$\Sigma F = 166$		$\Sigma Fx = 301$

$\bar{X} = \frac{301}{166} = 1.81$ Ans.