



Exercise 14C

Question 8:

The given frequency distribution is as below:

Age in years	10-20	20-30	30-40	40-50	50-60	60-70
No of patients	2	5	12	19	9	4

In order to draw, frequency polygon, we require class marks.

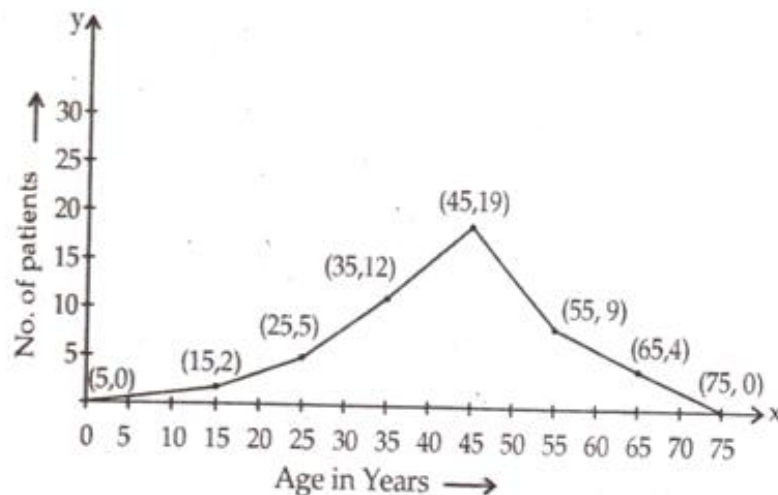
$$\text{Class marks of a class interval} = \frac{\text{upper limit} + \text{lower limit}}{2}$$

The frequency distribution table with class marks is given below:

Class Intervals	Class Marks	Frequency
0 - 10	5	0
10 - 20	15	2
20 - 30	25	5
30 - 40	35	12
40 - 50	45	19
50 - 60	55	9
60 - 70	65	4
70 - 80	75	0

In the above table, we have taken imaginary class intervals 0-10 at beginning and 70-80 at the end, each with frequency zero . Now take class marks along x-axis and the corresponding frequencies along y-axis.

Plot points (5,0), (15,2), (25, 5), (35, 12), (45, 19), (55, 9), (65, 4) and (75, 0) and draw line segments.



***** END *****

