

FUTURE INSTITUTE OF ENGINEERING AND MANAGEMENT

CA2: Report Writing

Submit Within **11/03/2023**

To Upload [Click Here](#)

Answer all:

1. Following is a frequency distribution lacking two class frequency. Find them if the mean is 7.74.

Value	3 -5	5 -7	7 - 9	9 - 11	11 - 13	Total
frequency	32	-	57	-	25	200

Also find first four central moments and coefficient of skewness and kurtosis. Write the character of the distribution.

2. The s.d. of first n even positive integers is $\sqrt{5}$. Find n .
3. The probability that a construction job will be finished in time is $17/20$; the probability that there will be no strike is $3/4$; and the probability that the construction job will be finished in time, assuming that there will be no strike is $14/15$. Find the probability that (i) the construction job will be finished in time and there will be no strike. (ii) there will be strike or the job will not be finished in time.
4. The probability of a missile hitting a target is $1/4$. (i) If 7 such missile are sent what is the probability of hitting the target at least twice. (ii) How many missiles must be sent so that the probability of hitting at least once is greater than $2/3$.
5. X is a poisson variate with parameter 3. Find the probability that X assume the value (i) 3,2,1,0 (ii) less than 3 (ii) at least 2.