**Course No.: CSE 3107** **CT#3 (B Section)** **Time: 30 Minutes** **Marks: 20**

**Name:** **Roll:**

**Q.1** Following are the runs scored by two players A and B in 10 matches: 10

**A**: 55, 80, 78, 49, 52, 76, 78, 76, 62, 76

**B**: 54, 78, 55, 66, 63, 69, 74, 64, 59, 85

Compute:

i. Pearson's coefficient of skewness and Bowley's coefficient of skewness for both batsmen and comment on the shape of the runs scored by B only.

ii. If the consistency of performance is the criterion for awarding a prize, who should get the prize?

**Answer:**

$$Sk_p = \frac{\text{mean} - \text{mode}}{\sigma}$$

$$= \frac{3(\text{mean} - \text{median})}{\sigma}$$

$$Sk_B = \frac{(Q_3 - Q_2) - (Q_2 - Q_1)}{(Q_3 - Q_1)}$$

$Q_3 =$

$Q_2 =$

$Q_1 =$

**Q.2** A university will accept 5000 students from an admission test. A total of 100000 candidates have appeared on the admission test. Assume that the scores of candidates are normally distributed with a mean of 50 and a standard deviation of 12. What is the minimum score required to get selected for that university? 7

**Answer:**

**Q.3** Why can **range** be misleading as a measure of dispersion? Explain with an example. 3

**Answer:**