

B.Sc DEGREE EXAMINATION, EVEN SEMESTER 2021
II Year IV Semester
Mathematical Statistics-II

Max.marks :25

Answer any **FIVE** questions ($5 \times 5 = 25$) Marks

1. Derive PDF of Chi-square distribution.
2. State and Prove Rao-Blackwell theorem
3. State and Prove Cramer-Rao inequality
4. Write the Procedure and properties of Maximum Likelihood Estimator and
5. Construct the Confidence Interval for mean(s)
6. State and Prove Neyman Pearson Lemma
7. Explain the test of independence of attributes based on contingency table.