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Register Number:

Name of the Candidate:

M.C.A. DEGREE EXAMINATION, May 2015**(FIFTH SEMESTER)****552. MODELING AND SIMULATION****(Elective –II)**

Time: Three hours

Maximum: 100 marks

SECTION -A**(8 × 5 = 40)****Answer any EIGHT questions**

1. Define a model.
2. What is Monte Carlo simulation?
3. What is the techniques for generating random numbers?
4. What is Weibull Distribution.
5. Write a note on special characteristic of geometric distribution.
6. Define antithetic sampling.
7. Explain the concepts of discrete event simulation.
8. Illustrate manual simulation using event scheduling and single channel queue.
9. Discuss the various simulation language supported for computer model. State the features of SIMSCRIPT.
10. Explain Simula programming for discrete event system in GPSS.

SECTION -B**(3 × 20 = 60)****Answer any THREE questions**

11. What is meant by simulation? Explain the Monte Carlo simulation.
12. Explain in detail about the techniques for generating random numbers briefly.
13. What do you mean Empirical Discrete Distribution and Discrete uniform Distribution?
14. Explain the manual simulation using event scheduling.
15. State the various issues in simulation languages. Explain the SIMSCRIPT programming.
