Roll No. [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Total No. of Pages : 01

Total No. of Questions : 08

M.Tech. (Electrical Engineering) (Power Systems and Renewable Energy) (Sem.–3)

POWER SYSTEM DEREGULATION

Subject Code : PSRE-301B-21

M.Code : 92884

Date of Examination : 24-12-22

Time : 3 Hrs. **Max. Marks : 60**

INSTRUCTIONS TO CANDIDATES :

1.Attempt any FIVE questions out of EIGHT questions.

2.Each question carries TWELVE marks.

1. What do you understand by wheeling of Electrical Power? How it is necessary to calculate for transmission line network. Explain wheeling charges collected by Transco.
2. What is the disadvantage in postage stamp method of transmission prices? Explain the procedure of MW-mile method of calculation of transmission pricing with suitable example.
3. What are the motivations for restructuring the power industry? Describe the role of ISO, its function and responsibilities.
4. What do you understand by disco participation matrix and ACE participation factor? How do the transactions take place during bilateral transactions and during contract violation by any genco or any disco.
5. **Write short notes on the following :**
   a) Bidding and auction mechanism
   b) Energy imbalance services
   c) Scheduling and dispatch services.
6. Describe the different methods used for finding the market clearing price. Define and explain the following terms :
   a) Inter-state trading
   b) Intra-state trading
   c) Unscheduled interchange charges.
7. Give a brief introduction of ancillary services in restructured electricity market. Describe the methods for determining the payment for voltage support service. Describe the methods of calculating opportunity cost and cost of loss when a synchronous generator provides ancillary service.
8. What is congestion in power system? Describe the methods of transmission congestion cost calculation in restructured electricity markets and its impact of marginal price.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Download all NOTES and PAPERS at StudentSuvidha.com