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Fourth Semester B.Arch. Degree Examination, June/July 2015
Building Services - II

Time: 3 hrs.

Max. Marks:100

- Note: 1. Answer any FIVE full questions. Selecting atleast TWO questions from each part.**
2. Q.No. 5 is compulsory.
3. Assume suitable data wherever necessary.

PART - A

- 1 a. What is a conductor? Explain the different types of conductors. (10 Marks)
b. Explain any five systems of electrical wiring. (10 Marks)
- 2 a. Bring about the comparison between the service connections given to an individual premises with respect to the advantages and disadvantages of the same. (10 Marks)
b. Discuss Indian electricity rules for domestic wiring. (10 Marks)
- 3 a. What is a substation? Discuss the classification of substations. (10 Marks)
b. What is earthing? Explain plate earthing, with a neat labeled sketch. (10 Marks)
- 4 Write short notes on any four of the following :
a. Fuse.
b. MCB.
c. Insulators.
d. Transformer.
e. Switch board. (20 Marks)

PART - B

- 5 Draw a single line sketch of a two bedroom residential building in a plot of size 12.19m × 18.28m. show the electrical layout using standard electrical symbols. Calculate the electrical load and the number of sub circuits required for lighting the building. (20 Marks)
- 6 a. What are the factors that need to be considered in designing a lighting scheme? (12 Marks)
b. Explain any four methods of lighting. (08 Marks)
- 7 a. What is glare? What are the factors affecting glare? Discuss the different types of glare. (10 Marks)
b. Explain with neat sketch the lighting and constructional features of high pressure sodium lamps. (10 Marks)
- 8 Write short notes on any four of the following:
a. Design consideration and method of lighting for a museum.
b. Laws of illumination.
c. Coefficient of utilization.
d. Indirect lighting.
e. HID lamps. (20 Marks)

Important Note : 1. On completing your answers, compulsorily draw diagonal cross lines on the remaining blank pages.
2. Any revealing of identification, appeal to evaluator and/or equations written eg. 42+8 = 50, will be treated as malpractice.