

Sub.Code : 660

NEB GRADE-XII

Maintenance and Rehabilitation of Structure

Candidates are required to give their answers in their own words as far as practicable. The figures in the margin indicate full marks.

Time: 3 hrs.

Full Marks: 75

Pass Marks: 27 (For partial students only)

Attempt **all** questions.

Group 'A'

(Very short answer questions)

5x3=15

1. What is the classification of maintenance ?
2. Enumerate different types of painting based on the materials.
3. What is short-creting ?
4. List the important non-destructive field tests.
5. What is estimate ?

Group 'B'

(Short answer questions)

6x5=30

6. What are the various maintenance process of life lines of buildings ?
Describe the maintenance process of bridges.
7. What is Ferrocement tank ? Explain the construction procedure of overhead water tank with Ferrocement.
8. What is tender ? Discuss the preparation of tender for the annual repair of roads.
9. Describe how would you determine the approximate age of a building.
10. What is rain water harvesting ? Why it is necessary and how it is implemented ?
11. Prepare a general layout of ordinary compound wall.

Group 'C'

(Long answer questions)

3x10=30

12. What are the different methods involved in strengthening of RCC beams, columns and slabs ? Describe the steps involved in RC jacketing of columns in RCC building.
13. Explain how would you repair RCC structures damaged due to fire. Also discuss the effect of dampness in masonry buildings.
14. Explain the causes of damages due to earthquakes, fire hazards, flood hazards and dilapidation. Also name the basic equipments to be used for the investigation of damages.