

B.Tech II Year I Semester (R15) Supplementary Examinations June 2017

BUILDING MATERIALS & CONSTRUCTION

(Civil Engineering)

Time: 3 hours

Max. Marks: 70

PART – A

(Compulsory Question)

- 1 Answer the following: (10 X 02 = 20 Marks)
- What do you mean by stone quarrying?
 - List out the waste based building material.
 - What are the common types of glass?
 - What is meant by polymerization?
 - What are the thermal properties of insulating materials?
 - List out the sound insulating materials.
 - Write about English bond.
 - Compare the merits and demerits of flat and pitched roof.
 - Mention the different types of floors.
 - What is meant by distemping?

PART – B

(Answer all five units, 5 X 10 = 50 Marks)

UNIT – I

- 2 (a) Give the sketches of various finishing surfaces of stones.
(b) Discuss on sustainable materials used in construction.

OR

- 3 What are the different stages of manufacturing of bricks? Describe brief the burning of bricks in Bull's trench kiln.

UNIT – II

- 4 (a) Explain the functions of glass in buildings.
(b) What are the advantages and disadvantages of glass?

OR

- 5 (a) Explain the moulding and fabricating for plastic products.
(b) What are the advantages and disadvantages of plastic in buildings?

UNIT – III

- 6 (a) How do you select insulating material? Explain.
(b) Discuss on reflective insulation systems.

OR

- 7 (a) Discuss on building insulation materials.
(b) Explain sound absorption and green insulation.

UNIT – IV

- 8 What is significance of bonding in brick work? Differentiate between English bond and double Flemish bond with sketches.

OR

- 9 (a) Discuss on cladding to external walls.
(b) What are the various components of framed structure? Discuss fundamental requirements of super structure.

UNIT – V

- 10 (a) Discuss on different types of construction joints.
(b) Explain the various types of pointing with sketches.
- 11 (a) What are the various ingredients of paint? State the functions of each of them.
(b) Discuss on oil paints and emulsion paints.
