

Total No. of Questions : 5

Total No. of Printed Pages : 3

**EI-184**

**B.E. (Illrd Sem.) (CGPA) Civil Engg. Exam.-2015**

**ENGINEERING MATERIALS & CONSTRUCTION**

**Paper : CE-303**

**Time Allowed : Three Hours**

**Maximum Marks : 60**

**Note :** Attempt all questions.

Answer must be to the point and brief.

All questions carry equal marks.

Solve any two parts only from each question.

- Q.I. (a) What is dressing of stone ? Why and how it is done.
- (b) Explain manufacturing of bricks with fly ash.
- (c) Write short note on pollution control devices in use in factory.
- (d) Give requirement of good brick earth and list out its important ingredients.

EI-184

P.T.O.

(2)

- Q.II (a) Discuss need for wood substitutes and give alternate materials that can be used in place of wood.
- (b) What is dampness in building ? Why and how it occurs ? Discuss remedial methods for the same.
- (c) Discuss common concrete admixtures. Give their uses.
- (d) What is bearing capacity of soil ? How can it be improved.
- Q.III (a) What is double under ream pile ? Give a neat sketch and discuss under what circumstances they are used ?
- (b) What type of foundation is provided for a heavy column load in soil having low bearing capacity.
- (c) Differentiate between pointing and plastering?
- (d) What is underpinning ? Where and why it is done.
- Q.IV Differentiate between—
- (a) R.B.C. and R.C.C. work for roofing.
- (b) English bond and flemish bond.
- (c) Tile flooring and mosaic flooring.
- (d) Water proofing and damp proof causes.

EI-184

Contd. ....

(3)

- Q.V (a) Describe atleast two types of doors commonly used in residential building.
- (b) Discuss three types of stair cases giving proportional sketches or used in residential buildings.
- (c) Give notes on fire protect on for commercial building.
- (d) How will you repair a cracked wall in a residential building ?