



Seat No. : _____

TW-110

B. Arch/ID/BCT Semester-II Examination

May-2013

BUILDING CONSTRUCTION-II (AR – 203)

(Marketing)

Time : 3 Hours]

[Max. Marks : 100

Instructions : (1) Attempt **all** questions.

(2) Figures to the right indicate marks.

(3) Assume suitable data if necessary.

(4) Draw neat sketches wherever necessary.

1. Draw a segmental arch for a span of 2 mts showing its different elements and label it. **15**

2. Attempt the following : (any **one**) **10**

(a) Draw a foundation for a 230 mm thick brick wall. Show its plan and section at a suitable scale.

(b) Draw a center line plan for a load bearing structure of space 3000 × 6000 mm.

3. Attempt the following : (any **one**) **30**

(a) Design an upper floor for a space having size 3500 mm × 7000 mm. consider joist size 500 mm wide and 115 mm in depth and size of binder and girder should be decided as per material used. Show appropriate members of the floor with plan, two sections and any two joinery details.

(b) Design a roof for a load bearing structure of size 3000 mm × 4500 mm, wall thickness being 350. Consider rafter size 75 mm wide and 125 mm in depth. Center to center distance between two rafters is 300 mm. Draw plan, two sections and any two joinery details.

4. Write short notes with sketches on the following : (any **four**) **20**

(a) Lengthening joint

(b) Essentials of a good foundation

(c) Girder and binder

(d) Wooden lintels

(e) Brick Lintels

(f) Strutting

5. Explain with sketches the following : (any **five**)

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- (1) Joist and rafters
 - (2) Horse shoe shaped arch
 - (3) Florentine arch
 - (4) Any one stone arch
 - (5) Queen post roof truss
 - (6) Bridle joint
 - (7) Junction detail of eaves and gutter.
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