



**B.TECH.**

**THEORY EXAMINATION (SEM-VIII) 2016-17**

**COMPUTER AIDED DESIGN**

**Time : 3 Hours**

**Max. Marks : 100**

**Note : Be precise in your answer. In case of numerical problem assume data wherever not provided.**

**SECTION-A**

**1 Explain the following : (10×2=20)**

- a) Use of cad in civil engg
- b) Use of environmental engg softwares
- c) 2D modelling softwares
- d) Concept of 3D and 4D modelling
- e) Soft computing
- f) Two structural design softwares
- g) Limitation of softwares
- h) Earthquake resistant design softwares
- i) High rise construction and computational tools
- j) Modular programming.

**SECTION-B**

**2 Attempt any five of the following : (10×5=50)**

- a) What is neural networks and its application in civil engg
- b) Define Expert system, their development in geotechnical engg.
- c) How you will make plan and elevation of a 1500 sqft covering area.
- d) Is there any role of softwares in making plumbing requirement in an apartment.
- e) What are advantages of Computer Aided design over conventional design.
- f) Discuss concept of 2D/3D/4D modeling of building.
- g) How you will analyze a rcc beam in any structural engg softwares.
- h) Discuss concept of geotechnical softwares for deep foundations .

**SECTION-C**

**Attempt any two of the following : (15×2=30)**

3. Discuss Use of software packages in the area of water logged areas.
4. Design rcc dome of intz water tank for 250 klitres. take staging height 22m. sbc 12kn/sqm. Assume other details.
5.
  - a) Is there any role of Environmental fields software in drainage plan of a city?
  - b) How you will model a 2 story 2 bay rcc frame structure.

