

Code: CE3T4

**II B.Tech - I Semester–Regular/Supplementary Examinations
November 2018**

**ENGINEERING GEOLOGY
(CIVIL ENGINEERING)**

Duration: 3 hours

Max. Marks: 70

PART – A

Answer *all* the questions. All questions carry equal marks

11x 2 = 22 M

1.

- a) Explain the weathering process.
- b) Discuss the various agents of metamorphism.
- c) What is the difference between a normal and reverse fault?
- d) Write the importance of Geothermal method.
- e) Explain important physical properties of muscovite.
- f) What are the physical properties of igneous rocks?
- g) Outline the applications of magnetic method.
- h) What is an aquifer?
- i) Write any 4 preventive measures to be taken in earthquake point of view.
- j) Write the importance of geology for constructions of Dams.
- k) Briefly write about lining in tunnels.

PART – B

Answer any **THREE** questions. All questions carry equal marks.

3 x 16 = 48 M

2. a) Discuss the geological work of river. Give the depositional landforms made by rivers. 8 M
- b) Outline the physical properties of minerals with suitable examples. 8 M
3. a) How do you distinguish mineral from a rock? What are the major differences between dykes and sills? 8 M
- b) Assess the petro graphic characters of i) Conglomerate
ii) Limestone. 8 M
4. a) Write short note on i) cone of depression ii) geological controls of ground water movement. 8 M
- b) Enumerate the causes and classification of landslides. 8 M
5. a) Write about the principle, physical parameters of magnetic method. 8 M
- b) Describe the importance of Electrical Resistivity studies in civil engineering. 8 M

6. a) Define dam. How do you classify them? How do you select a site to construct a dam? 8 M

b) Explain about the role of Geological Considerations in Tunneling. 8 M