

Roll No

CE-224

B.E., III Semester

Examination, December 2016

Choice Based Credit System (CBCS)

Geology

Time : Three Hours

Maximum Marks : 60

- Note:** i) Total number of questions eight.
ii) Attempt any five questions.
iii) All questions carry equal marks.

1. a) Define Geology, Engineering Geology, Remote sensing and Geographic information system.
b) Write an essay on "Interior of the earth" with special mention about study of Earthquake waves and views of two scientists about internal composition of the Earth.
2. Define 'Minerals'. Write about the physical properties of minerals used in "Identification of Minerals in hand specimen" with identification properties of Quartz and Haematite.
3. Rocks are aggregate of Minerals. Write about the formation of sedimentary rocks, their classification and properties of sandstone and limestone.
4. Geological history of rock formation is explained by Geological system. Explain the rocks of Gondwana system in view of their occurrence, distribution (rock types), succession and economic importance.

5. Write short notes on the followings (any three)
 - a) Dip and Strike of bedding plane
 - b) Folds, fold axis, limbs of folds and axial plane
 - c) Normal and Reverse faults
 - d) Importance of faults in selection of site for Civil Engineering structures like dam or buildings.
6. Discuss the relationship of Geological knowledge to Civil Engineering and application of Geological knowledge in planning and execution of Civil Engineering structures with special reference to selection of site for Dam - its planning and execution.
7. a) Explain about the basic principals of remote-sensing and its roll in Civil Engineering.
b) How you can use satellite imagery for selection of site for underground resources of ground water like dug well/ tube well etc.
8. a) Application of GIS in Civil Engineering.
b) What are Earthquakes and explain the precautions to be taken while constructing Earthquake resistant buildings.
