

Reg. No.

**MANIPAL INSTITUTE OF TECHNOLOGY****MANIPAL***(A constituent unit of MAHE, Manipal)***III SEMESTER B.TECH. (Civil Engineering) END SEMESTER EXAMINATIONS****NOVEMBER 2018****SUBJECT: ENGINEERING GEOLOGY****[CIE 2105]**

Date of Exam: 29/11/2018

Time of Exam: 9.00-12:00

Max. Marks: **50****Instructions to Candidates:**

- ❖ Answer ALL the questions & missing data may be suitably assumed
- ❖ Draw neat sketches using pencil wherever necessary

1A.	Explain the role of pressure in the process of metamorphism with the help of suitable examples.	(04)	CO1, CO2
1B.	Explain the different types of convergent plate boundaries with suitable examples.	(06)	CO2
2A.	Write a short essay on the Cenozoic Era of the Geological time scale.	(03)	CO1, CO2
2B.	Write a detailed note on the silicate group of minerals with typical examples.	(03)	CO1, CO2
2C.	What are coastal aquifers? With a neat sketch describe the aquifer system in a coastal island.	(04)	CO3
3A.	What are the causes of landslides? How can they be prevented?	(03)	CO4
3B.	With the help of a suitable model, explain the transportation of sediments by the rivers?	(03)	CO2
3C.	Write short notes on Symmetrical and Overturned folds.	(04)	CO3, CO4
4A.	What is remote sensing? Explain how geographic information systems (GIS) is useful in urban development and agricultural activities.	(04)	CO5
4B.	Write short notes on sheet joints and mural joints.	(03)	CO3, CO4
4C.	Depending on the stress types, explain the different types of faults seen in the rocks. Add a note on the importance of faults in Civil Engineering.	(03)	CO3, CO4
5A.	With the help of a model, explain the relationship between vegetation and soil development.	(04)	CO2
5B.	Write an essay on the detailed investigations that a civil engineer must carry out before the construction of a dam.	(06)	CO4