

GUJARAT TECHNOLOGICAL UNIVERSITY**BE - SEMESTER-VI • EXAMINATION – SUMMER 2013****Subject Code: 162201****Date: 24-05-2013****Subject Name: Economic Geology - I****Time: 10.30 am - 01.00 pm****Total Marks: 70****Instructions:**

1. Attempt all questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.

- Q.1** (a) What is the difference between rock forming minerals and economic minerals? Also economic classification of minerals. **07**
(b) What are metallic minerals, non-metallic minerals and mineral fuel? Explain each with 3 examples and its uses. **07**
- Q.2** (a) Write a note on ore and gauge minerals. **07**
(b) Classify the economic mineral forming processes. **07**
- OR**
- (b) What is the scope of the study for Mineral Economics? Add a note on National Mineral Policy **07**
- Q.3** (a) Write a note on mineral forming processes in Igneous rocks. **07**
(b) Which economic deposits are associated with acidic, basic and ultrabasic rocks explain with example. **07**
- OR**
- Q.3** (a) How pegmatite is important in economic geology? Which economic minerals are associated with pegmatite. **07**
(b) Write a brief note on role of intrusive rocks in economic mineralogy **07**
- Q.4** (a) What is contact metasomatism? Which minerals and ores are associated with it? Give examples **07**
(b) What is contact metasomatism? Which minerals and ores are associated with it? Give examples. **07**
- OR**
- Q.4** (a) Give mode of occurrence and genesis of Indian metallic deposits for Copper and Chromium **07**
(b) Gujarat coast has most cement factories? Justify the statement. **07**
- Q.5** Write Note on any 2 **14**
1. Genetic classification of minerals based on Depth & Temperature criteria.
 2. Fissure vein and saddle reefs.
 3. Gold field of India.
 4. Use of Gypsum deposits.
