

Roll No. ....

Total Pages : 2

**CMDQ/D-23**  
**PETROLEUM GEOLOGY**

**5218**

Paper-GT-705

Time Allowed : 3 Hours]

[Maximum Marks : 100

**Note** : Attempt **five** questions in all, selecting **one** question from each Unit. Question No. **1** is compulsory. All questions carry equal marks.

**Compulsory Question**

1. Write short notes on the following :

- (a) Diagenesis
- (b) Fractured reservoir rocks
- (c) Entrapment of hydrocarbons
- (d) Oil Shale.

**UNIT-I**

2. What are Kerogens? Discuss the types of Kerogens.

3. Explain following in brief :

- (a) Thermal Alteration Index (TAI)
- (b) Dispersed Organic Matter.

**UNIT-II**

- 4. Write a detailed note on classification and nomenclature of reservoir rocks.
- 5. Write brief on the following :
  - (a) Marine reservoir rocks
  - (b) Nonmarine reservoir rocks.

**UNIT-III**

- 6. Discuss the Migration and Accumulation of Hydrocarbons in detail.
- 7. Write brief notes on the following :
  - (a) Stratigraphic and combination type of traps.
  - (b) Structural Traps.

**UNIT-IV**

- 8. Discuss unconventional resources of hydrocarbons.
- 9. Write brief on the following :
  - (a) Shale gas
  - (b) Major oil fields of Assam.