

**15P440**

(Pages: 2)

Name .....

Reg. No .....

**FOURTH SEMESTER M.Sc. DEGREE EXAMINATION, MARCH 2017**

(CUCSS - PG)

(Applied Geology)

**CC15P GEL4 C13 – GEOCHEMISTRY & SEDIMENTOLOGY**

(2015 Admission)

Time: Three Hours

Maximum: 36 Weightage

**I. Short Answer Type Questions. Answer *all* questions.**

1. Categories of meteorites.
2. Siderophile elements.
3. Fugacity.
4. Eh-pH diagrams.
5. Decay schemes.
6. Fission track dating.
7. Atomic Absorption Spectrometer.
8. Diagenesis.
9. Sediment provenance.
10. Textural maturity.
11. Clastic textures.
12. Carbonaceous deposits.
13. Grain mounts.
14. Aulacogens.

(14 x 1= 14 weightage)

**II. Short Essay Type questions. Answer any *seven* questions.**

15. Geochemical constitution of earth's crust.
16. Geochemical cycle.

17. Application of Gibb's phase rule to mineralogical systems.

18. Stable isotopes.

19. Rb-Sr method of dating.

20. Grade scale and sediment classes.

21. Primary sedimentary structures.

22. Sedimentary depositional environments.

23. Heavy mineral separation methods.

24. Sedimentary basins of India.

(7 x 2 = 14 weightage)

**III. Write essays on two questions.**

25. Give an account of the geochemical classification and distribution of elements.

*Or*

26. Describe the principle and procedure of ICP-AES analytical technique in geochemical studies.

27. Describe grain size analysis in sedimentological studies highlighting on the graphic representation of data and statistical parameters.

*Or*

28. Discuss the classification of sedimentary rocks. Add a note on siliceous deposits.

(2 x 4 = 8 weightage)

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