

Semester-III, B.Sc. (Industrial Chemistry) Examination

October # 2015

Paper- IC-301: Material Science-I

Subject Code: 3795

Time: 2.30 Hours

Total Marks: 70

- Que.1 (A) Give industrial production of H_3PO_4 by electric furnace method? 10
(B) Write a note on fossil fuels. 04
OR
- Que.1 (A) How Cu was extracted from non-sulphide ores? Explain it in detail. 10
(B) Discuss about the zinc alloys. 04
- Que.2 (A) Discuss extraction of Fe from its ore. 10
(B) Write a note on liquid fuels. 04
OR
- Que.2 (A) Describe the carbon steel production with chemical reactions. 10
(B) Write a note on gaseous fuels. 04
- Que.3 (A) Discuss industrial production of sulphuric acid by contact process. 10
(B) Give an industrial application of NaOH. 04
OR
- Que.3 (A) Discuss industrial production of CaC_2 . 10
(B) State economic importance of a fuel. 04
- Que.4 (A) Explain industrial production of HNO_3 by ammonia oxidation process. 10
(B) Discuss about the micro constituents in aluminium alloys. 04
OR
- Que.4 (A) Give reduction of ZnO by Beigian and Vertical Retort process. 10
(B) Which factors are considered for selecting particular fuel? 04
- Que.5 (A) How industrially Lead alloys are manufactured? 10
(B) State advantages and disadvantages of solid fuels over liquid and gaseous fuels. 04
OR
- Que.5 (A) What is fuel? Write a note on solid fuels. 10
(B) Discuss properties of steel alloys. 04