

B.R.A.Bihar University Muzaffarpur

M.Phil Chemistry

Session -2014-15

Assignment Questions

Paper -I

Full Marks-30

किन्ही तीन प्रश्नों का जबाव दें | सभी प्रश्नों का मान बराबर है |

1. Discuss the objective and importance of research.
2. How are national and international journals ranked?
3. What is the significance of following terms in computer- RAM, ROM, LAN, MAN, WAN, Primary and secondary memory?
4. Discuss the importance of binary system in computers.

Paper -II

1. Demonstrate the various postulates of wave mechanics.
2. Discuss the application of "Huckel Molecular Orbital" theory in 'ethylene'.
3. Discuss the NMR peaks for p-xylene and ethyl benzene.
4. Give the selection rule for electronic transitions. What are the various electronic transitions?

Paper -III

1. Describe the basic theory of low energy electron diffraction (LEED), what are the applications of LEED.
2. Describe photo physical pathway of a photo chemical reaction with reference to Jablonskii diagram.
3. Draw molecular orbital energy level diagram for metallocene and comment on their magnetic behavior.
4. Explain the structure and function of the following.
1. Carboxypephidare 2. carbonic anhydrate 3. Rubredoxin 4. Feridoxin
5. Discuss Norrish type I and Norrish type II reactions.
6. Write note on new trends in green chemistry.
