## First B.Pharm (Ayurveda) Degree Examinations, October 2014

## PHARMACEUTICAL CHEMISTRY

Time: 3 hrs Max marks: 100

- Answer all questions
- Write equations wherever necessary
- Draw diagrams wherever necessary

Essays (2x10=20)

- 1. Explain in detail about aldol condensation.
- 2. Explain about the characteristic reactions of benzene.

Short notes (10x5=50)

- 3. Huckel's rule.
- 4. Explain in detail on activating and deactivating influence of substituent's present in benzene ring.
- 5. Low reactivity of aryl halide towards nucleophilic substitution reaction.
- 6. Explain the resonance theory of benzene.
- 7. Explain the various method of preparation of alcohols.
- 8. sp3 hybridization.
- 9. Explain the mechanism of SN1 reaction.
- 10. Mechanism involved in free radical substitution reaction of alkanes.
- 11. Mention the molecular orbital structure of benzene.
- 12. Explain the stability of cyclohexane.

Answer briefly (10x3=30)

- 13. Can you reduce aldehyde. Explain.
- 14. Distinguish between primary, secondary and tertiary alcohols.
- 15. What is a co-valent bond.
- 16. Identification tests for aldehyde.
- 17. Define U.V spectroscopy.
- 18. Why phenol is more acidic than ethanol.
- 19. Discuss the identification tests for mono and di carboxylic acid in briefly
- 20. Explain hydrogen bond.
- 21. Describe the kekule structures of benzene.
- 22. Nomenclature of alkenes.

\*\*\*\*\*\*