

# **Gujarat Technological University**

## **Master of Pharmacy**

**Semester – II**

**Paper code -2920105**

**Specialization paper – III**

### **Advanced Analytical Pharmacognosy**

#### **Theory**

**(Six hours per week, 7 credits)**

1. Standardization of herbal medicines, traditional and folklore remedies,/ preparation and their quality, safety and efficacy assessment and intended use for acceptance by FDA.
2. Stability testing of natural products, procedures, predictable chemical and galenical changes, technical limitation, testing methods and combination products.
3. Marine Pharmacognosy
4. Principles of Ayurveda and standardization of formulation of Ayurvedic dosage form as per Ayurvedic and Herbal Pharmacopoeia.
5. Regulatory and safety measures with herbal, Ayurvedic and other drugs of traditional origin.

#### **Specialization paper - III**

### **Advanced Analytical Pharmacognosy**

#### **Practicals**

**(Six hours per week, 8 credits)**

Practical exercises based on the relevant topics mentioned in theory syllabus.

#### **References Books:**

1. Evans W. C – Trease and Evans pharmacognosy (15<sup>th</sup> ed)
2. Wallis T.E, Practical Pharmacognosy, J & A Churchill Ltd.
3. Wagner H., Blatt S. and Zgainski, Plant Drug Analysis Springer, Verlag, New York.
4. Peach K. and Tracey M.V., Modern Methods of Plant Analysis, 1-4, Narosa Publisher House, N.D.
5. Kalia A. N – Textbook of Industrial Pharmacognosy.
6. Handa S.S & Kaul K.L., Supplement to cultivation and utilization of medicinal plants, 1996.
7. R.D. Chaudhary, Herbal Drugs Industry, Eastern Publishers, New Delhi.
8. Clark, E.C.G., Isolation and Identification of Drugs, The Pharmaceutics Press, London.
9. Brain K.R., and Turner R.D., The Practical Evaluation of Phytopharmaceutics, Wrieth-Sciencetchnics Bristol.
10. WHO Publication.
11. The Ayurvedic Pharmacopoeia of India, Part I, (Vol. I–V) , part II (I & II) Govt. of India, Ministry of Health and Family Welfare, Dept. of Indian Systems of Medicine and Homeopathy, New Delhi 2008.

12. Indian Herbal Pharmacopoeia, revised new edition 2002, Published by RRL, Jammu and IDMA, Mumbai – 2002
13. British Herbal Pharmacopoeia, Published by British Herbal Medicines Association 1996.
14. Ayurvedic Formulary of India, Vol. I and II, Ministry of Health, New Delhi.
15. Stahl E, Thin Layer Chromatography – A Laboratory Hand Book, Springer – Verlag Berlin.
16. Steimser Richard – Folk Medicines
17. Rao Ramchandra – Encyclopedia of Indian Medicine Vol. I