

PARUL UNIVERSITY
FACULTY OF PHARMACY
B.Pharm., Winter 2018 - 19 Examination

Semester: 7**Subject Code: 08101406****Subject Name: Herbal Drug Technology****Date: 08/12/2018****Time: 10:00 am to 1:00 pm****Total Marks: 75****Instructions:**

1. Figures to the right indicate full marks.
2. Make suitable assumptions wherever necessary.

Q.1 Essay type Questions. (Any 2 out of 3) (10 marks each) (20)

1. Define and enlist various extraction techniques. Discuss any two advanced Extraction Techniques.
2. Define and Classify Nutraceuticals. Discuss each class in detail.
3. Describe Chemistry of Medicinally Important Phytoconstituent - **Quinine**.

Q.2 Short Essay Type Questions. (Any 7 out of 9) (5 marks each) (35)

1. Discuss applications of different methods of Chromatography **OR** Spectroscopy.
2. Discuss Source, Production and Estimation of Calcium Sennosides.
3. Discuss Shikimic Acid Pathway.
4. Enumerate WHO Parameters for standardization of Herbal drugs. Discuss extractive value.
5. Classify Cosmeceuticals and discuss about Haircare preparations.
6. Discuss Tracer Technique.
7. Discuss Modified Maceration method.
8. Discuss chemistry of Menthol.
9. Give Sources, Production and Estimation of Phytoconstituents- **Atropine**.

Q.3 Answer in short. (2 marks each) (20)

1. Write importance of Dietary Fibers.
2. Write difference between Prebiotics and Probiotics.
3. Discuss two herbs used for Dental care products.
4. List out Industrial utilization of Menthol and Diosgenin.
5. Enlist Chemical tests for detection of Alkaloids.
6. Define Infusion and Digestion.
7. Enumerate factors affecting extraction.
8. Write significance of Ash value.
9. Write down advantages of CO₂ as Supercritical Fluid.
10. Describe any two chemical tests for detection of Tannin.