

Programme: B. Pharm
Course: Herbal Drug Technology
Course Code: BP603T
Enrolment no. _____

Full Marks: 75
Time: 3 Hrs.

Q.N o.	Questions	CO	Bloom Taxonomy Category	Marks
Section I				
1	Objective Type Questions			
	<p>i. Which of the following is a common side effect of Ephedra? a. Sedation b. Increased heart rate c. Weight gain d. Excessive sleepiness</p> <p>ii. Which herbal excipient is commonly used as a binder in tablet formulations? a. Starch b. Gelatin c. Microcrystalline cellulose d. Both A and C</p> <p>iii. Which of the following is a novel herbal dosage form? a. Syrup b. Tablets c. Phytosomes d. Mixtures</p> <p>iv. What is the primary health benefit of using Ashwagandha? a. Reducing blood sugar levels b. Enhancing sleep and reducing stress c. Boosting metabolism d. Improving vision</p> <p>v. Which institution is likely to be involved in research on medicinal plants? a. Environmental protection agencies b. Pharmaceutical regulatory bodies c. Botanical gardens and research institutes d. Aerospace engineering companies</p> <p>vi. Which one of the following is NOT among the tridoshas, the cornerstone of Ayurvedic philosophy? a. Vata b. Pitta c. Kapha d. Prithvi</p> <p>vii. Spirulina is primarily known for its high content of: a. Omega-3 fatty acids b. Protein and essential amino acids c. Vitamin C d. Fiber</p> <p>viii. Which of the following herbs can potentially interact with blood-thinning medications? a. Garlic b. Ginseng c. Ashwagandha d. Chicory</p> <p>ix. Which of the following is a common fixed oil used in herbal cosmetics? a. Mineral oil b. Coconut oil c. Petroleum jelly d. Paraffin wax</p> <p>x. The term 'Biopiracy' refers to: a. Unauthorized use of synthetic drugs b. Illegal patenting of traditional knowledge and biological resources c. Stealing herbs from protected areas d. Smuggling of endangered plants</p> <p>xi. Which of the following terms is defined as the exclusive legal right to an invention? a. IPR b. Copyright c. Patent d. Bioprospecting</p> <p>xii. Which of the following is considered a traditional Indian plant involved in a major biopiracy case? a. Aloe vera b. Turmeric c. Eucalyptus d. Camphor</p> <p>xiii. Good Manufacturing Practices are laid down in which schedule for ASU drugs? a. Schedule Y b. Schedule H c. Schedule T d. Schedule Z</p> <p>xiv. Which of the following is NOT a role of herbal excipients in cosmetic formulations? a. Enhancing product stability b. Providing active therapeutic effects c. Improving product texture d. Acting as a preservative</p> <p>xv. Infrastructural requirement under GMP includes all except: a. Raw material storage area b. Clean water supply c. Patient examination area d. Proper ventilation</p> <p>xvi. Farmer's right refers to: a. The right to patent seeds b. The right to compensation for crop loss c. The right to save, use, and sell farm produce d. The right to reject herbal research on crops</p> <p>xvii. Which herb is commonly used as a natural antioxidant in skin care products? a. Green tea b. Ginger c. Garlic d. Fenugreek</p> <p>xviii. Which of the following drugs/herbs can cause hypertensive crisis if taken with certain foods? a. Ginkgo biloba b. Hypericum c. Ephedra d. Garlic</p> <p>xix. Asavas are medicinal preparations made by- a. Soaking the drug in powder form b. Soaking the drug in paste form c. Soaking the drug in decoction form d. Soaking the drug in emulsion form</p> <p>xx. Herbal medicines are prepared from- a. Herbs b. Herbal active constituents c. Both a & b d. None of the above</p>			1 x 20 = 20
		CO1	Remember	

Section II			
2. Short Answer type questions.			
a	Write down the different methods of pest control in biodynamic agriculture.	CO1	Understand
b	Explain in brief about herb-herb interaction with suitable examples.	CO2	Apply
c	Write down the various herbal binders with their source and active compound.	CO3	Remember
d	Briefly explain about accelerated stability testing.	CO4	Understand
e	Write down the objectives of Schedule T.	CO5	Understand
f	Explain in detail about the role of flavors & perfumes used in herbal cosmetics	CO3	Understand
	or		
	Write down the various herbal sweeteners with their source and active compound.	CO3	Remember
g	Mention the process to grant patent.	CO4	Remember
	or		
	Write down the kind of inventions that can be protected by patent.	CO4	Understand
Section III			
3. Long Answer Type questions			
3	Describe the recommended list of machinery, equipment, and minimum manufacturing premises requirements for the manufacture of Ayurvedic medicines as per regulatory standards.	CO5	Analyze
	or		
	Illustrate the recommended list of equipment used in the in-house quality control section of a herbal drug industry and interpret their functional significance.	CO5	Evaluate
4	Critically examine the general aspects, market dynamics, growth patterns, potential scope, and categorization of nutraceutical products currently available in the market.	CO2	Analyze
	or		
	Assess the therapeutic significance of Ginseng, Ashwagandha, and Garlic by evaluating their biological nomenclature, phytochemical constituents, and pharmacological applications.”	CO2	Evaluate

Course Outcomes (CO):

On the successful completion of the Course, students will be able to:-

CO1. Understand raw material as source of herbal drugs from cultivation to herbal drug product

CO 2. Understand about the importance of Nutraceuticals and their application.

CO 3. Know the WHO and ICH guidelines for evaluation of herbal drugs.

CO4. Know the herbal cosmetics, natural sweeteners and nutraceuticals.

CO5. Appreciate patenting of herbal drugs, GMP.