

Seat No.: _____

Enrolment No. _____

GUJARAT TECHNOLOGICAL UNIVERSITY
B.Ph. - SEMESTER– VII • EXAMINATION – WINTER -2020**Subject Code:2270002****Date: 04/01/2021****Subject Name: Pharmaceutical Technology- I****Time: 10:30AM To 12:30PM****Total Marks: 54****Instructions:**

1. Attempt any **THREE** questions from Q-1 to Q-6.
2. Q.7 is compulsory to attempt.
3. Make suitable assumptions wherever necessary.
4. Figures to the right indicate full marks.

- Q.1** (a) Describe preparation methods for water for injection and list quality control tests. **06**
(b) Describe various sources of contamination. Discuss its preventive measures. **05**
(c) Write a short note on lyophilized products. **05**
- Q.2** (a) Discuss aseptic techniques. Draw efficient layout of parenteral production unit. **06**
(b) Describe various containers & closures used in parenteral packaging. **05**
(c) Write a short note on parenteral nutrients. **05**
- Q.3** (a) Enlist methods for improvement solubility, Describe any two. **06**
(b) Write a brief note: Suspending agent, emulsifying agent. **05**
(c) Explain in brief : i) extracts ii) tincture iii) infusion iv) Gels **05**
- Q.4** (a) Describe different aerosol formulations. Write pharmaceutical applications of aerosols. **06**
(b) Discuss factors influencing drug penetration from semisolid bases through skin with mechanism. **05**
(c) What is propellant? Describe various parts of aerosols pack. **05**
- Q.5** (a) Enlist various suppositories bases describe individuals characteristics. **06**
(b) Discuss formulation composition of Shampoo and conditioners **05**
(c) Explain Validation. Describe validation of Autoclave. **05**
- Q. 6** (a) Write a note on baby care products, hygienic products **06**
(b) Discuss various methods for aerosols filling. **05**
(c) Write composition with its characteristics of skin -Sunscreen, moisturizers. **05**
- Q.7** (a) Give Brief HVAC requirement as per schedule M for manufacturing premises. **06**
OR
(a) Discuss Labeling conditions as per GMP. **06**
OR
(a) Write in brief Manufacturing records for pharmaceuticals. **06**
