

GUJARAT TECHNOLOGICAL UNIVERSITY
DIPLOMA PHARMACY - SEMESTER-II • EXAMINATION-SUMMER • 2014

Subject Code: 420002**Date: 21-05-2014****Subject Name: Pharmaceutical Chemistry - II****Time: 10:30 am - 01:30 pm****Total Marks: 80****Instructions:**

1. Attempt any five questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.

- Q.1 (a)** Draw the structure of following hetrocyclic ring system. **04**
(i) Thiophene
(ii) Coumarin
(iii) Indole
(iv) Pyridine
- (b)** Draw the structure of following **04**
(i) Aspirin
(ii) Metronidazole
(iii) Procaine
(iv) sulfacetamide
- (c)** Write the storage condition of followings **04**
(i) Cyclopropane
(ii) Diethyl ether
(iii) Insulin
(iv) Physostigmine
- (d)** Write the name and use of active chemical constituent present in the following brands **04**
(i) Xylocaine
(ii) Metacine
(iii) Coramine
(iv) Benadryl
- Q.2 (a)** What are antibiotics and antibacterials? Briefly classify antibiotics with suitable example and draw structure of one drug from each class. **08**
- (b)** Which are the causative organisms of malaria? Describe the life cycle of malarial parasite. Classify anti-malarial agents with examples. **08**
- Q.3 (a)** What are sedative and hypnotics? Briefly classify them with suitable examples. Give the structure and property of phenobarbitone. **08**
- (b)** What are tranquilizing agents? Classify them with suitable examples. Write a detail note on anti psychotic agent **08**
- Q.4 (a)** Explain the following: **06**
(i) Antiseptics
(ii) Disinfectants
(iii) Lipid lowering agents
(iv) Carditonic agents
(v) Vitamins
(vi) Anticholinergic agents
- (b)** What is diabetes mellitus? Write a note on oral hypoglycemic agents. **05**
- (c)** Define anti-histaminic agents. Classify them with suitable examples. Give the structure of Chlorpheniramine. **05**
- Q.5 (a)** What are analgesics? Classify them. Write a brief discussion on narcotic **06**

	analgesics.	
	(b) Classify antitubercular agents with examples. Draw the structure of Isoniazid and PAS.	05
	(c) What are diuretics? Write the structure and chemical properties of any two of them.	05
Q. 6	(a) Why cancer is difficult to treat compared to infection? Write a note on anti cancer agents.	06
	(b) What are Antiarrhythmic agents? Briefly classify them with suitable examples	05
	(c) What is epilepsy? Write a note on anti convulsant agents	05
Q.7	(a) Write a notes on following	16
	(i) Diagnostic agent	
	(ii) Anti fungal agents	
	(iii) Steroidal drugs	
	(iv) Adrenergic agents	
