

B.Pharm III Year II Semester (R19) Supplementary Examinations January/February 2023
MEDICINAL CHEMISTRY - III

Time: 3 hours

Max. Marks: 75

PART – A
(Compulsory Question)

- 1 Answer the following: (10 X 02 = 20 Marks)
- | | |
|---|----|
| (a) Structure of any two cephalosporins. | 2M |
| (b) MOA of tetracyclines. | 2M |
| (c) Structure and uses of Proguanil. | 2M |
| (d) What is Mutual prodrug. | 2M |
| (e) Brief about Nalidixic acid. | 2M |
| (f) What is HIV Protease inhibitors. | 2M |
| (g) Write benzimidazole anthelmintics. | 2M |
| (h) Classify antiprotozoal agents. | 2M |
| (i) Write short note on Hansch Analysis. | 2M |
| (j) List out various approaches of drug design. | 2M |

PART – B
(Answer any two questions: 02 X 10 = 20 Marks)

- 2 Define Tuberculosis and Anti-tubercular agents. Write about synthesis, mechanism of action of Isoniazid and para amino salicylic acid. 10M
- 3 Write about the nomenclature, classification and SAR of penicillin. 10M
- 4 Define Anti – malarial drugs, write about its classification and synthesis of Chloroquine and Pamaquine. 10M

PART – C
(Answer any seven questions: 07 X 05 = 35 Marks)

- 5 Write a short note on Beta lactamase inhibitors. 5M
- 6 Write short notes on Monobactam antibiotics. 5M
- 7 Write a note on Macrolide antibiotics. 5M
- 8 Write about SAR and stereochemistry of Chloramphenicol. 5M
- 9 Write about synthesis and uses of Ciprofloxacin. 5M
- 10 Write about the synthesis and uses of Nitrofurantoin. 5M
- 11 Write a note on anti fungal antibiotics. 5M
- 12 Write the mode of action, synthesis and uses of Metronidazole. 5M
- 13 Write short notes on combinatorial chemistry. 5M

B.Pharm III Year II Semester (R19) Regular Examinations July/August 2022

MEDICINAL CHEMISTRY – III

Time: 3 hours

Max. Marks: 75

PART – A

(Compulsory Question)

- 1 Answer the following: (10 X 02 = 20 Marks)
- | | |
|---|----|
| (a) What are beta lactamase inhibitors? | 2M |
| (b) Write a note on monobactam antibiotics. | 2M |
| (c) Give the mechanism of action of erythromycin. | 2M |
| (d) Write the structure and uses of pamaquine. | 2M |
| (e) Write the structure of Amantadine HCl. | 2M |
| (f) Give the structure and uses of rifampicin. | 2M |
| (g) Write the mechanism of action of albendazole. | 2M |
| (h) Write the structure and uses of dapsone. | 2M |
| (i) Define combinatorial chemistry. | 2M |
| (j) Define pharmacophore. | 2M |

PART – B

(Answer any two questions: 02 X 10 = 20 Marks)

- 2 Discuss briefly about chemistry, classification and SAR of sulfonamides. 10M
- 3 Write the nomenclature, classification and Structure activity relationship of tetracycline. 10M
- 4 Write about the physico-chemical parameters used in Quantitative Structure Activity Relationship (QSAR) studies. 10M

PART – C

(Answer any seven questions: 07 X 05 = 35 Marks)

- 5 Write a note on amino glycosides. 5M
- 6 Write the structure, mechanism of action and uses of any three cephalosporin. 5M
- 7 Write about synthesis of trimethoprim and dapsone. 5M
- 8 Write a note on quinolines as anti malarial agents. 5M
- 9 Classification of anti – viral agents. 5M
- 10 Discuss about structure activity relationship of quinolones. 5M
- 11 Write about synthesis of miconazole and tolnaftate. 5M
- 12 Write the structures for the following: 5M
- (i) Ketoconazole. (ii) Thiabendazole. (iii) Sulfamethoxazole.
(iv) Clotrimazole. (v) Diethylcarbamazine citrate.
- 13 Explain about molecular docking techniques. 5M
