PAPER ID-311148

Subject Code: BP601T

Roll No:

BPHARM

(SEM VI) THEORY EXAMINATION 2023-24

MEDICINAL CHEMISTRY III – THEORY

TIME: 3 HRS

M.MARKS: 75

Note: 1. Attempt all Sections. If require any missing data; then choose suitably. **SECTION A**

$10 \ge 2 = 20$

1.	Attempt all questions in brief.	10 x
a.	Paraphrase about the mechanism of action of aminoglycosides.	
b.	What are β-Lactamase inhibitors?	
c.	Cite the examples of Anti-UTI agents.	
d.	Discuss the mechanism of metronidazole as an antiprotozoal agent.	
e.	Give the synthesis of chloramphenicol.	
f.	Write the synthesis and uses of Acyclovir.	
g.	Give the structure and uses of dapsone.	
h.	Recall the uses and structure of Nitrofurantoin.	
i.	Explain the mechanism of action of tetracycline.	
j.	State the examples of macrolide antibiotics.	
	SECTION B	(

2. Attempt any two parts of the following:

a.	Discuss the history of antibiotics with classification and mechanism of action of penicillins.		
b.	Explain the etiology of malaria with synthesis, MOA, and uses of Chloroquine.		
c.	Classify the Anti-tubercular Agents with synthesis, MOA of isoniazid.		

SECTION C

3. Attempt any *five* parts of the following:

 $7 \ge 5 = 35$

 $2 \times 10 = 20$

Give a short note on the QSAR study with a focus on physicochemical parameters. a. Summarize the principle of combinatorial chemistry with its types and applications. b. Describe the SAR of tetracyclines with examples. c. Illustrate the MOA and uses of folate reductase inhibitors. d. Classify the anti-fungal agents with examples e. Write the SAR of quinolones with the synthesis of ciprofloxacin f. Discuss the SAR of Sulfonamides with their uses. g.