



International Islamic University Chittagong

Department of Pharmacy

Program: B. Pharm (Hons.)

Midterm Examination

Semester: Autumn 2023

Course Code: Pharm- 4807

Course Title: Medicinal Chemistry -III

Time: 1 hour 30 minutes

Full Marks: 30

*(Answer any **three** questions from the followings. Figures in the right margin indicate marks)*

1.
 - a) Define SAR. Discuss the molecular basis of inhibitory neurotransmitter. 2
 - b) Criticize the important outcomes from SAR and mechanism of benzodiazepines. 3
 - c) Sketch the release pattern and roles of endogenous histamine. 3
 - d) Evaluate the mode of action of antihistamines. 2

2.
 - a) Illustrate the types and functions of prostaglandins. 2
 - b) Cite the biosynthetic pathways of PGs and highlight the drug targets. 3
 - c) Discuss the structure and uses of diclofenac and ketorolac. 2
 - d) Explain the outcomes from SAR of salicylates and p-amino phenol derivatives. 3

3.
 - a) Sketch the synthesis and clinical features of acetylcholine. 2
 - b) Illustrate the binding sites of cholinergic receptors. 3
 - c) Outline the mechanism of acetylcholinesterase. 3
 - d) Write short notes on- antidote of OPC poisoning. 2

4.
 - a) Evaluate the clinical features of adrenergic agonist and antagonist. 4
 - b) Make a comparison between selectivity of alpha and beta-adrenoreceptor binding. 3
 - c) Give brief notes on- beta blocker. 3