

Total No. of Questions : 6]

SEAT No. :

P1991

[5145]-503

[Total No. of Pages : 2

Third Year B.Pharmacy
353: MEDICINAL CHEMISTRY-I
(2013 Pattern) (Semester - V)

Time : 3 Hours]

[Max. Marks : 70

Instructions to the candidates:

- 1) *All questions are compulsory.*
- 2) *Answer to the two sections should be written in separate answer books.*
- 3) *Figures to the right indicate full marks.*

SECTION - I

Q1) What are antihypertensive agents? Discuss with one example from each class, SAR and MOA of antihypertensive agents. **[10]**

OR

Define receptor. Enlist the different types of receptor. Explain in detail about various forces involved in drug-receptor interactions. **[10]**

Q2) Answer the following (Any Five): **[15]**

- a) Write a short note on beta blockers.
- b) Discuss SAR and MOA of potassium sparing diuretics.
- c) Give synthesis of methyldopa.
- d) Add a note on Ferguson principle.
- e) Write a note on receptor site theories.
- f) Explain in detail biosynthesis, storage and release of acetylcholine.
- g) What is protein binding? Write significance of protein binding.

P.T.O.

Q3) Write a short note on (Any Two) [10]

- a) Stereochemical factors affecting drug actions.
- b) Signal transduction mechanism.
- c) Cholinergic receptor.
- d) Cardiotonics.

SECTION - II

Q4) Explain in detail SAR and MOA of sympathomimetic drugs. [10]

OR

Write MOA of anti-anginal agents and classify it with one example from each class. [10]

Q5) Answer the following (Any Five) [15]

- a) Write synthesis of prazosin.
- b) Add a short note on anticoagulants.
- c) Discuss SAR of acetylcholine.
- d) Highlight of neuro-muscular blocking agents.
- e) Comment on adrenergic receptors along with their locations.
- f) Explain and classify ganglionic blocking agents.
- g) Give focus on bioisosterism.

Q6) Write a short note on (Any Two) [10]

- a) Biosynthesis, storage and metabolism of catecholamines.
- b) Alpha blockers.
- c) Osmotic and loop diuretics.
- d) Conjugation reaction.

