



DAP-M202111

Seat No. _____

Third Year D. Pharm. Examination

April / May - 2022

3.5 - Medicinal Chemistry (Theory)

Time : 3 Hours]

[Total Marks : 70

- Instructions :** (1) Figure to the right indicate marks.
(2) Draw neat and clean diagram when required.

1 Answer the following questions: **10x2=20**

- (1) Draw the malaria cycle.
- (2) Classify anti-fungal agents.
- (3) Give two examples of each, anti-viral and anti-AIDS agents.
- (4) Define preservatives and diagnostic agents with an example.
- (5) Explain anthelmintics, write down the synthesis of mebendazole.
- (6) Classify anti-hyperlipidemic agents.
- (7) Differentiate anti-scabies and anti-pedicular agents.
- (8) What are the anti-anginal agents ? Write a synthesis of isosorbide dinitrite.
- (9) Give an example of any four drugs used as an anti-hypertensive agent, with structure.
- (10) Enlist at least four drugs used as a corticosteroid with structure.

2 Answer any two out of 'the following questions: **2x10=20**

- (1) Write a note on diuretics along with its detailed classification and add a note on the synthesis of chlorthiazide and furosemide.
- (2) Give a note of cardiovascular agents, write in detail about coagulants and anti-coagulants with the synthesis of warfarin.
- (3) Give a brief classification of antibiotics, write a detailed note on beta-lactam antibiotics along with any one SAR.

3 Answer any six out of the following questions: **6x5=30**

- (1) Write a short note on urinary track anti-infective agents with SAR of quinolones.
- (2) What do you mean by QSAR, combinatorial chemistry, prodrug, CADD and antisense molecules, write with an-examples.
- (3) Define and classify anti tubercular agents along with synthesis of isoniazide and para-amino salicylic acid.
- (4) Give a brief classification on anti-neoplastic agents.
- (5) Write a note sulphonamides and sulphones.
- (6) Give a short note on steroidal hormones.
- (7) Explain in brief endocrine system.
- (8) Write a note on thyroid and anti-thyroid agents.