Sub Code:MPL102

Paper Id: 298106 Roll No:

M. PHARM
(SEM-I) THEORY EXAMINATION 2019-20
PHARMACOLOGICAL SCREENING METHODS-I

Time: 3 Hours *Total Marks: 70*

Note: **1.** Attempt all Sections. If require any missing data; then choose suitably.
2. Any special paper specific instruction.

SECTION A

1. Attempt *all* questions in brief. **2 x 7 = 14**

a. Define bioassay.
b. What are CNS stimulants?
c. Discuss the mechanism of action of antiulcer agents?
d. Define Immunoassay and explain its principle of functioning.
e. What are anti-psychotics?
f. Name anti-asthmatics and COPD drugs..
g. What are antiarrythmic drugs with examples?

SECTION B

2. Attempt any *three* of the following: **7 x 3 = 21**

a. Explain the statistical treatment methods in evaluation of drugs
b. Write down the pharmacology of anti-psychotics and nootropics.
c. What are the screening methods for anti -emetic and anti-diarrheal agents?
d. Elaborate the methodology for the screening of antihypertensives agents.
e. Describe the method for production, maintenance and applications of transgenic animals.

SECTION C

3. Attempt any *one* part of the following: **7 x 1 = 7**

(a) Explain the anaesthesia and euthanasia of experimental animals.
(b) Explain the limitations of animal experimentations.

4. Attempt any *one* part of the following: **7 x 1 = 7**

(a) Describe the preclinical screening of antimicrobial agents using in vivo, in vitro and animal models.
(b) Describe the preclinical screening techniques for antioxidants and analgesics.

5. Attempt any *one* part of the following: **7 x 1 = 7**

(a) Describe the preclinical screening of anti-inflammatory and antipyretic agents using in vivo, in vitro and animal alternative models.
(b) Elaborate the immunoassay technique for digoxin and insulin.

6. Attempt any *one* part of the following: **7 x 1 = 7**

(a) Describe the pharmacology of anti-diabetic and anti cancer agents.
(b) Explain the preclinical screening of the antiarrhythmic drugs.

7. Attempt any *one* part of the following: **7 x 1 = 7**

(a) Explain the principle of biological standardization.
(b) Explain the screening methods for antihypertensive drugs.