

Roll No.....

PY-604

B.Pharmacy VI Semester

Examination, December 2016

Pharmacognosy - IV

Time : Three Hours

Maximum Marks : 70

Note: i) Answer five questions. In each question part A, B, C is compulsory and D part has internal choice.

ii) All parts of each question are to be attempted at one place.

iii) All questions carry equal marks, out of which part A and B (Max. 50 words) carry 2 marks, part C (Max. 100 words) carry 3 marks, part D (Max. 400 words) carry 7 marks.

iv) Except numericals, Derivation, Design and Drawing etc.

1. a) Write a note on surface sterilization.
- b) Write a note on suspension culture.
- c) Discuss historical development of plant tissue culture.
- d) Discuss different type of plant tissue culture.

OR

Write the application of plant tissue culture in production of secondary metabolite with suitable examples.

2. a) Classify chromatographic techniques.
- b) What is column chromatography?
- c) Discuss paper chromatography in detail.
- d) Discuss the role of finger printing technique in evaluation of herbal drugs.

OR

Give an account of HPLC technique and discuss it's application in evaluation of herbal drugs.

3. a) Write the name of anti microbial agent obtained from marine source.
- b) Write the name of anti inflammatory agent obtained from marine source.
- c) Define Cosmeceuticals.
- d) What marine pharmacognosy? Discuss role of marine herbs as there peutics agent.

OR

Discuss in detail about herbs as a health food.

4. a) Write the biological source and uses of lemongrass oil.
- b) Write the biological sources and uses of sandal wood oil.
- c) Write the isolation procedure for mentha oil.
- d) What are volatile oil? Explain the general method of isolation of volatile oil.

OR

Discuss isolation and uses of Eucalyptus oil and clove oil.

5. a) Write the biological sources of atropine and papain.
- b) Write the biological sources of quinine and vincristine.
- c) Write a note on industrial production of quinine.
- d) Discuss in detail about industrial production, analysis and pharmaceutical importance of morphine.

OR

Discuss in detail spectral analysis of herbal drugs.
