

Enrollment No: _____

Roll No: _____

SMT.N.M.PADALIA PHARMACY COLLEGE

B.Pharm Semester-II April-2009

Mid semester Exam

Sub: Pharm. Chemistry-II (220003)

Date: 06/04/09, Monday

Time: 11:00 to 12:00

Max.Marks:20

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

Q: 1

(A) Give answer of following questions. (Any two)

4

1. Define: Viscosity. What is the important of viscosity in pharmacy?
2. Explain principle of stalagnometer or Ostwald viscometer.
3. Note on polarimeter.

(B) Define:

1

1. Parachor
2. Specific Optical Rotation

Q: 2

(A) Attempt any four.

8

1. Give details of any two detectors used for the measurement of intensity of transmitted light.
2. What is mean by quantum yield? Give causes of low quantum yield with illustration.
3. Distinguish between physical adsorption & chemical adsorption.
4. Derive Langmuir adsorption isotherm.
5. Give application of adsorption.

(B) Explain Beer's law.

1

Q: 3

A. Any two.

4

- 1) Explain effect of temperature on conductance.
- 2) Discuss factors affecting on solubility of gas in liquid.
- 3) Give statement of Raoult's law and explain deviations of Raoult's law.

B. Calculate following problems.

2

1. A solution containing 2.2 g. of solid a non-volatile, non-electrolyte in 50 g. of water boils at 100.12°C . calculate molecular wt. of substance. ($k_b = 0.51$)
2. Calculate osmotic pressure of a 5% solution of glucose at 18°C . (Molecular wt. of glucose = 180, $R = 0.0821$)

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SMT.N.M.PADALIA PHARMACY COLLEGE

B.Pharm Semester-II April-2009

Mid semester Exam

Sub: Pharmaceutics-II (220002)

Date: 07/04/09, Tuesday

Time: 11:00 to 12:00

Max.Marks:20

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

Q: 1 Give the comments on following. **2 Marks**

1. Size reduction in ball mill is impact only.
2. Occasional shaking is required during maceration method of extraction.

Q: 2 Answer the following questions. (Any two) **4 Marks**

1. Give the standards of powder.
2. Give the difficulties associated with extraction of crude drug.
3. Write the factors affecting the size reduction of solid drug.

Q: 3 Write a note on. (Any two) **8 Marks**

1. Ball mill
2. Size separation by centrifugal force with its equipments.
3. Discuss various methods used for continuous extraction along with its advantages and disadvantages.

Q: 4 Any one. **2 Marks**

1. Why vortex formation is avoided in liquid – liquid mixing process? How it is avoided?
2. Discuss factors affecting solid – solid mixing.

Q: 5 Write a note on following. (Any one) **4 Marks**

1. Ribbon blender
2. Sigma blade mixer
3. Silverson Homogenizer

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SMT.N.M.PADALIA PHARMACY COLLEGE

B.Pharm Semester-II April-2009

Mid semester Exam

Sub: Physical Pharmacy (220006)

Date: 08/04/09, Wednesday

Time:11:00 to 12:00

Max.Marks:20

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

Q: 1 Define followings. (Any three)

3 Marks

1. Buffer Index
2. Polymorphism
3. Critical temperature
4. Surface active agent

Q: 2 Any two.

4 Marks

1. Write a note on Aerosol.
2. Explain the methods of achieving liquefaction.
3. Describe various crystal forms of solids giving suitable examples.

Q: 3 Any one.

3 Marks

1. Discuss the methods of adjusting tonicity and PH.
2. Write a note on Pharmaceutical buffers.

Q: 4 Any two.

4 Marks

1. Write a note on spreading co-efficient.
2. Discuss the electric properties of interfaces.
3. Write a note on surface active agents.

Q: 5 Any three.

6 Marks

1. Explain working of coulter counter with labeled diagram.
2. Discuss flow properties of powders in details.
3. Enlist the derived properties of powders and discuss any one in brief.
4. Write application of micromeritics in pharmacy.

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SMT.N.M.PADALIA PHARMACY COLLEGE**B.Pharm Semester-II April-2009****Mid semester Exam****Sub: Applied Mathematics (Biostatistics) (220001)****Date: 09/04/09, Thursday****Time: 11:00 to 12:00****Max.Marks:20**

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

Q: 1 Attempt any three.**12**

1. Define sample. Write down method of sampling and explain one of them.
2. A die is thrown 150 times and the following result are obtained.

| | | | | | | |
|------------------|----|----|----|----|----|----|
| Number turned up | 1 | 2 | 3 | 4 | 5 | 6 |
| Frequency | 19 | 23 | 28 | 17 | 32 | 31 |

Test the hypothesis that the die is unbiased at 5% level of significance.

3. Find the coefficient of correlation between given data.

| | | | | | | | | | | |
|---|-----|-----|-----|-----|-----|----|-----|----|----|----|
| X | 105 | 104 | 102 | 101 | 100 | 99 | 98 | 96 | 93 | 92 |
| Y | 101 | 103 | 100 | 98 | 95 | 96 | 104 | 92 | 97 | 94 |

4. Obtain the line of regression of Y on X for the following data.

| | | | | | | | | | | |
|---------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| Age (Years) X | 66 | 38 | 56 | 42 | 72 | 36 | 63 | 57 | 55 | 45 |
| B.P Y | 145 | 124 | 147 | 125 | 160 | 118 | 149 | 128 | 150 | 124 |

Q: 2 Attempt any four.**8**

1. Give types of correlation and explain one of them.
2. Define: (i) Parameters
(ii) Degree of freedom.
3. If $b_{xy} = 0.6$ and $r = 0.8485$ then find b_{yx} .
4. Ten competitors in a musical contest were ranked by the two judge A & B

| | | | | | | | | | | |
|---|---|---|---|----|---|----|---|---|---|---|
| A | 1 | 6 | 5 | 10 | 3 | 2 | 4 | 9 | 7 | 8 |
| B | 3 | 5 | 8 | 4 | 7 | 10 | 2 | 1 | 6 | 9 |

Using the rank correlation method find r.

5. A new drug is applied over 200 persons for particular disease.

| | | |
|--------|---------|-------------|
| Detail | Recover | Not Recover |
| Men | 75 | 25 |
| Women | 65 | 35 |

Use χ^2 - test and comment on the effectiveness of the drug.**BEST OF LUCK**

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SMT.N.M.PADALIA PHARMACY COLLEGE

B.Pharm Semester-II April-2009

Mid semester Exam

Sub: Anatomy Physiology & Health Education (APHE-II) (220004)

Date:13/04/09,Monday

Time:11:00 to 12:00

Max.Marks:20

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

- Q-1 Define following (Any two) 1**
- Vital Capacity
 - Pleura
 - Asthma
- Q-2 Attempt any two 6**
- Describe the physiology of Cardiac Cycle
 - Write a note on the ECG
 - What is Blood Pressure? Give Importance & regulation of Blood pressure
- Q-3 Attempt any two 6**
- Write the distribution and functions of Sympathetic and Parasympathetic stimulation.
 - Enumerate the different parts of the brain and give the function of Cerebrum & Hypothalamus.
 - Explain the reflex action and types of reflexes in the spinal cord.
- Q-4 Attempt any one 3**
- Describe how exchange the gases take place at the cellular level & pulmonary Level.
 - Write a note on internal respiration.
- Q-5 Draw & label following 4**
- Sectional view of Heart with blood circulation
 - Segittal section of the brain

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SMT.N.M.PADALIA PHARMACY COLLEGE

B.Pharm Semester-II April-2009

Mid semester Exam

Sub: Pharmacognosy-I (220005)

Date: 15/04/09, Wednesday

Time: 11:00 to 12:00

Max.Marks:20

Note:

- All the questions are compulsory.
- Draw neat figure wherever require.
- Do not write anything on question paper.
- Figure on the right side indicate marks.

Q: 1 Attempt any three

6 Marks

1. Scope of Pharmacognosy.
2. Application of plant tissue culture.
3. Describe chemical tests for alkaloids.
4. Describe Aestivation of corolla.

Q: 2 Explain in detail the following (Any two)

6 Marks

1. Stipules
2. Hybridization
3. Creeping

Q: 3 Write the answer of any two.

8 Marks

1. Define Bark. Draw & describe different shapes & outer surface characters of it giving suitable example.
2. What is venation? Describe various types of venation in plants with suitable examples.
3. Define active constituent with examples. Explain any two active constituents in details.

Smt. N.M. Padalia Pharmacy College

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