04-11-2023

# Bachelor of Pharmacy I Semester - End Semester Examination October - 2023 3604

# **Pharmaceutical Inorganic Chemistry**

Instructions to the candidates:

1. Do not write anything on question paper except Roll Number, otherwise it shall be deemed as an act of indulging in unfair means and action shall be taken as per rules.

2. Section-A contains Q-1 and Q-2 with Five (5) questions each. All the Ten very short type questions are compulsory and carry equal marks (10 x 2 = 20).

- 3. Section-B contains Q-3, Q-4 and Q-5. Answer any TWO questions among the three descriptive type questions and carry 10 marks each. (2 x 10=20).
- 4. Section-C contains Q-6 and Q-7 with FIVE (5) and FOUR (4) sub divisions. Answer any FOUR (4) and THREE (3) questions of choice among the short answer type questions and all carry 5 marks each. (7 x 5 = 35)

**Duration: 3 Hours** 

No. of Pages in this Question Paper: 1

Total Marks: 75

#### Section - A

1. Answer the following questions in very short (Maximum 20 words):

 $5 \times 2 = 10$ 

- a) Define Buffers with example.
- b) Define Dentifrices with example.
- c) Define electrolytes used in replacement therapy with example.
- d) Define Antacid with examples.

e) Define Cathartics with examples.

2. Answer the following questions in very short (Maximum 20 Words):

 $5 \times 2 = 10$ 

- a) Define Emetics with example.
- b) Give synthesis of Copper sulphate. c) Give synthesis of Sodium thiosulphate.
- d) Give chemical formulae of chlorinated lime with storage conditions.
- e) Define Astringents with example and two applications.

#### Section - B

Answer (Any Two) of following questions in Long answer:

 $2 \times 10 = 20$ 

- 3. Write a brief note on sources and types of impurities in Pharmaceuticals.
- 4. Define, give mechanism and classify Antimicrobial agents with their suitable examples.
- 5. Define Expectorants. Give synthesis, Assay, properties and uses of Ammonium chloride.

## Section - C

6. Answer (Any Four) of the following questions in Short answer:

 $4 \times 5 = 20$ 

- a) Give principle, reaction and procedure involved in Limit test of Iron.
- b) Write a note on ORS solutions.
- c) Write on Limit test of Arsenic.
- d) Define and classify Dental products with examples.
- e) Write on Assay of Hydrogen peroxide.

7. Answer (Any Three) of the following questions in Short answer:

- a) Write a note on Indian Pharmacopoeia and its history.
- b) Write a brief note on Poison and Aritidotes.
- c) Write briefly on Radiopharmaceuticals including their applications.
- d) Write a note on Assay of Ferrous sulphate.

Roll. NO. -> 82120

28-10-2023

# Bachelor of Pharmacy | Semester - End Semester Examination October- 2023 3601

# HUMAN ANATOMY AND PHYSIOLOGY-I

Instructions to the candidates:

- 1. Do not write anything on question paper except Roll Number, otherwise it shall be deemed as an act of indulging in unfair means and action shall be taken as per rules.
- 2. Section-A contains Q-1 and Q-2 with Five (5) questions each. All the Ten very short type questions are compulsory and carry equal marks (10 x 2 = 20).
- 3. Section-B contains Q-3, Q-4 and Q-5. Answer any TWO questions among the three descriptive type questions and carry 10 marks each. (2 x 10=20).
- 4. Section-C contains Q-6 and Q-7 with FIVE (5) and FOUR (4) sub divisions. Answer any FOUR (4) and THREE (3) questions of choice among the short answer type questions and all carry 5 marks each. (7 x 5 = 35)

**Duration: 3 Hours** 

No. of Pages in this Question Paper: 2 \*\*

Total Marks: 75

#### Section - A

1. Answer the following questions in very short (Maximum 20 words):

 $5 \times 2 = 10$ 

- a) Homeostasis.
- b) Cell junctions.
- c) Neuromuscular junction.
- d) Eye disorders.
- e) Cardiac output.

2. Answer the following questions in very short (Maximum 20 words):

 $5 \times 2 = 10$ 

- · a) Types of bones.
  - b) Cell division.
  - c) Mention lymph organs.
- d) Types of blood vessels.
- e) Ear disorders.

#### Section - B

Answer (Any Two) of following questions in Long answer:

 $2 \times 10 = 20$ 

- 3. Discuss composition and function of blood in detail. Also describe blood disorders.
- 4. Discuss axial and appendicular skeletal system in detail.
- 5. Discuss anatomy of heart and blood circulation. Also discuss disorders of heart.

# Section - C

6. Answer (Any Four) of the following in short answer:

 $4 \times 5 = 20$ 

- a) Differentiate between parasympathetic and sympathetic nervous system.
- b) Discuss spinal nerves.
- c) Discuss different types of joints.
- d) Discuss structure and function of eye.
- e) Discuss blood transfusion.
- 7. Answer (Any Three) of the following questions in short answer:

- a) Discuss structure and function of cell.
- b) Discuss muscular tissue.
- c) Discuss cardiac cycle.
- d) Discuss lymph circulation and functions of lymphatic system.

02-11-2023

# Bachelor of Pharmacy I Semester- End Semester Examination October - 2023 3603

## PHARMACEUTICS-I

Instructions to the candidates:

- 1. Do not write anything on question paper except Roll Number, otherwise it shall be deemed as an act of indulging in unfair means and action shall be taken as per rules.
- 2. Section-A contains Q-1 and Q-2 with Five (5) questions each. All the Ten very short type questions are compulsory and carry equal marks (10 x 2 = 20).
- 3. Section-B contains Q-3, Q-4 and Q-5. Answer any TWO questions among the three descriptive type questions and carry 10 marks each. (2  $\times$  10=20).
- 4. Section-C contains Q-6 and Q-7 with FIVE (5) and FOUR (4) sub divisions. Answer any FOUR (4) and THREE (3) questions of choice among the short answer type questions and all carry 5 marks each. (7  $\times$  5 = 35) **Total Marks: 75**

**Duration: 3 Hours** 

No. of Pages in this Question Paper: 2

#### Section - A

1. Answer the following questions in very short (Maximum 20 words):

 $5 \times 2 = 10$ 

- a) What are the basic ingredients of effervescent powders?
- b) Define eutectic mixtures.
- c) Define emulsions.
- d) What are simple powders?
- e) What do you understand by therapeutic incompatibility?
- 2. Answer the following questions in very short (Maximum 20 Words):

 $5 \times 2 = 10$ 

- a) Differentiate liniments from lotions.
- b) Differentiate flocculated and deflocculated suspensions.
- c) Define enemas.
- d) Differentiate pastes from creams.
- e) Define displacement value.

#### Section - B

Answer (Any Two) of following questions in Long answer:

 $2 \times 10 = 20$ 

- 3. Discuss the bases used in formulation of suppositories with their advantages and disadvantages.
- 4. Explain the methods adopted for formulation of emulsions. Write the tests to identify the type of emulsions. Explain the term cracking and how can this be overcome.
- 5. What do you understand by Pharmaceutical incompatibility? Classify the incompatibilities. Explain the physical incompatibilities encountered during formulation with examples and methods to overcome.

# Section - C

6. Answer (Any Four) of the following questions in Short answer:

 $4 \times 5 = 20$ 

- a) Discuss the factors effecting posology.
- b) Explain the factors influencing dermal penetration of drug.
- c) What are the stability problems encountered during formulation of emulsion?
- d) What are the basic requirements of an eye drop?
- e) Define a prescription. What are the errors that usually occur in handling a prescription?
- 7. Answer (Any Three) of the following questions in Short answer:

- a) Define the terms: elixirs; proof sprit; dusting powders; ointments; throat paints.
- b) Write the methods of evaluation of creams.
- c) Write a short note on pharmacy as a career.
- d) Discuss the advantages and disadvantages of liquid dosage form.

# Bachelor of Pharmacy I Semester- End Semester Examination October - 2023

# PHARMACEUTICAL ANALYSIS-I

Instructions to the candidates:

- Do not write anything on question paper except Roll Number, otherwise it shall be deemed as an act
  of indulging in unfair means and action shall be taken as per rules.
- Section-A contains Q-1 and Q-2 with Five (5) questions each. All the Ten very short type questions are compulsory and carry equal marks (10 x 2 = 20).
- 3. Section-B contains Q-3, Q-4 and Q-5. Answer any TWO questions among the three descriptive type questions and carry 10 marks each. (2 x 10=20).
- 4. Section-C contains Q-6 and Q-7 with FIVE (5) and FOUR (4) sub divisions. Answer any FOUR (4) and THREE (3) questions of choice among the short answer type questions and all carry 5 marks each. (7 x 5 = 35)

**Duration: 3 Hours** 

No. of Pages in this Question Paper: 1

Total Marks: 75

### Section - A

- 1. Answer the following questions in very short (Maximum 20 words):
- $5 \times 2 = 10$

- a) Difference between iodometry and iodimetry.
- b) Define Co-ordination number with example. c) Differentiate accuracy and precision.
- d) Give Henderson-Hasselbalch equation.
- e) Define term 'Significant figures'.
- 2. Answer the following questions in very short (Maximum 20 Words):

 $5 \times 2 = 10$ 

- a) Enumerate different analytical techniques used in pharmaceutical analysis.
- b) Define determinate errors. How they can be eliminated?
- c) Define Indicator electrode and working electrode.
- d) Define Normality and Mole fraction. e) Define specific conductance? Give its units.

#### Section -- B

Answer (Any Two) of following questions in long answer:

 $2 \times 10 = 20$ 

- 3. Write notes on the followings:
  - a) Fajan's method of precipitation titration b) Theory of acid base indicators.
- 4. How will you prepare and standardize 0.1 M Sodium EDTA solutions?
- 5. Discuss construction and working of DME. Give applications of Polarography.

## Section - C

6. Answer (Any Four) of the following questions in Short answer:

 $4 \times 5 = 20$ 

- a) How will you prepare and standardize 1 liter of 0.1N Na<sub>2</sub>CO<sub>3</sub>.
- b) Describe co-precipitation and post precipitation giving suitable examples.
- c) Discuss Principle and methodology of diazotization titrations.
- d) Write a note on theory of redox indicators.
- e) Write a note on the solvents used in non-aqueous titrations.

7. Answer (Any Three) of the following questions in Short answer:

- a) Different methods of expressing concentration of a solution.
- b) What are different types of complexometric titration? Define masking and demasking agents.
- c) Write a note on the standard hydrogen electrode.
- d) What are the sources of impurities in medicinal agents?

Name				Roll N	0
Rajasthan University University End Semester T	of Health S	Scie inat	nce ion	s, Jaip Main (	ur 2023)
	acy Semester				
Subject Name: Reme			es (T	Theory)	
Subject Code:					
Time- 1.5 Hour					Max marks- 35
	PART I				$(1 \times 10 = 10)$
Note: Attempt any one of the following-		2			(1 X 10 10)
1. (a) Explain function and type of function	n.				
or	Janes A				
(b) Define matrix and type of matrix.				s 1 m	
2. write all the minor's and cofactors of the				· 1	
		1	4	-1	
A	A ==	5	2	3	
		7	1	2	
	PART II				
Note: Attempt any five questions. All quest	tions carry e	qual	ma	rlis.	$(5 \times 5 = 25)$
1 Expand the following expression:	(a) (4x+	$-y_{1}^{3}$			
2. factorize the following polynomial					
$x^3-2x^2-9x+18$					
3. Find the distance between the point	t (7,2) and (4	,6).			
4. Differentiate $y = e^x + 2x - 4x + \sin^4 x$					
	1 6				
5 Evaluate the determinant: $A = \begin{pmatrix} 2 \\ 3 \\ 1 \end{pmatrix}$	4 2 -2 -1				
6. Solve the following equations:					
1/4 + 1/X = 2/3					

7. find the mid point of the line joining (3,6) and (-7,0).

# Rajasthan University of Health Sciences, Jaipur, Rajasthan Non-university B. Pharmacy I Semester -End Semester Exam Oct 2023

Subject Name: Communication Skills (Theory)

Paper-V Subject Code: 3605

Time-1.5 Hours	Max.Marks-35
Part- A Long Answers (Answer 1 out of 2)	$(01 \times 10 = 10)$
1. Elaborate advantages and disadvantages of interviews . 2. What are the steps of communication process? describe i	n detail. (10)
Part -B Short Answers (Answer 5 out of 7)	$(05 \times 05 = 25)$
<ol> <li>What point makes your presentation effective?</li> <li>Write a short note on group discussion.</li> <li>Highlight the importance of listening in daily interaction.</li> <li>What are the barriers to communication.</li> <li>What are the points one must keep in mind in order to wr</li> <li>What are the common factors affecting the writing skills.</li> <li>Explain difference between Verbal and Non -Verbal Com</li> </ol>	ite effectively (5)