22223 3 Hours / 80 Marks



0806 Seat No.

- Instructions -
- (1) All Questions are *Compulsory*.
 - (2) Answer each next main Question on a new page.
 - (3) Illustrate your answers with neat sketches wherever necessary.
 - (4) Figures to the right indicate full marks.
 - (5) Assume suitable data, if necessary.
 - (6) Use of Non-programmable Electronic Pocket Calculator is permissible.
 - (7) Mobile Phone, Pager and any other Electronic Communication devices are not permissible in Examination Hall.

Marks

20

1. Attempt any FIVE of the following:

- a) Define acid and base as per Arrhenious theory and write Advantages and disadvantages of it.
- b) Define and classify Antacids with examples.
- c) State the meaning of 'Quality Control'. Give its significance in Pharmacy.
- d) Define Topical agents and classify with examples.
- e) Discuss uses and storage condition for
 - i) Oxygen ii) Carbondioxide
- f) Define Antioxidants with examples. Write selection criteria for inorganic Antioxidants.
- g) Define and classify Dental Products with examples.
- h) Write synonym, chemical formula, properties and uses of Muriatic acid.

2. Attempt any <u>FOUR</u> of the following:

- a) Define and classify Laxatives with examples.
- b) Discuss the role of oxygen in biological system.
- c) Explain Electrolyte replacement therapy. Give official preparations of sodium chloride.
- d) Give the properties of alpha and beta radiations.
- e) Mention four official preparations of
 - i) Calcium ii) Iron
- f) Write principle and reaction involved in limit test for iron.

3. Attempt any <u>THREE</u> of the following:

- a) Explain the biological effects of raditions on human body.
- b) Give the synonym and use of
 - i) Sodium Hydroxide ii) Calcium Hydroxide
- c) Define Antidote and classify with suitable examples.
- d) State the precautions to be taken while handling and storage of Radio pharmaceuticals.
- e) Write properties and uses of
 - i) Kaolin ii) Calamine P.T.O.

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4. Attempt any THREE of the following:

- a) State synonym, molecular formula, properties and uses of sodium metabisulphite.
- b) Define Respiratory Stimulants. Given molecular formula, properties and uses of Ammonium carbonate.
- c) Define Expectorants and Classify them. Give uses of potassium iodide.
- d) What are Anticaires agents? Discuss the role of fluoride as anticaries.
- e) Enlist different sources of impurities in pharmaceuticals. Explain any two.

5. Attempt any <u>THREE</u> of the following:

- a) Define the terms with examples.
 - i) Achlorhydria
 - ii) Astringent
 - iii) Protectives
 - iv) Emetics
- b) What is 'Shadow meal'? Give its properties, uses and molecular formula.
- c) Define the term 'Radioisotope'. Draw well labelled diagram of G.M. counter and explain construction and working.
- d) Define buffers and classify buffers. Give ideal properties of it.
- e) Draw well labelled diagram of Gutzeit apparatus and explain the principle of limit test for Arsenic.

6. Attempt any <u>THREE</u> of the following:

- a) Give any two identification tests for
 - i) Acetates
 - ii) Chlorides
- b) Explain metabolic acidosis and metabolic alkalosis. Give name of compounds used for their treatment.
- c) Explain various applications of Radioisotoper.
- d) What are ORS mixtures? Give it's composition recommended by WHO and UNICEF.
- e) Explain the role of iron in human body.