

DR. BABASAHEB AMBEDKAR TECHNOLOGICAL UNIVERSITY, LONERE
Winter Semester Examination – December 2018

Course: B. Pharmacy

Semester: I

Subject with Subject Code: Pharmaceutical Inorganic Chemistry (BP104T)

Date: 24/12/2018

Max Marks: 60

Time: 3 Hrs.

Instructions:

- I. All questions are compulsory.
- II. Candidates should begin the answer to each question on new page.
- III. Illustrate your answers with neat sketches, diagram etc; whichever necessary.

Q. No. 1. Multiple Choice Questions: (20)

(Each of the following questions has four alternatives. Only one of them is correct. Choose the correct answer.)

1. A mixture of weak acid with their salt of strong base is called as -----.
a) Acidic buffer b) Basic buffer c) Buffer d) All of these
2. The shelf life of commercial buffers is ----- years in unopened condition.
a) 1 b) 2 c) 3 d) 0.5
3. A solution having osmotic pressure more than blood plasma is called as ----- solution.
a) Isotonic b) Hypotonic c) Hypertonic d) None of these
4. ----- is the most abundant extracellular cation.
a) Potassium b) Calcium c) Sodium d) Magnesium
5. ----- microorganisms responsible for Dental Caries.
a) Streptococci b) Lactobacilli c) Both a & b d) None of these
6. ----- is clay composed of ash made from volcanos.
a) Kaolin b) Bentonite c) Gypsum d) Boric acid
7. The first edition of the Indian Pharmacopoeia was published in the year 1955 under the Chairmanship of -----.
a) Dr.R.N.Chopra b) Dr.B.N. Ghosh c) Dr.B.Mukherji d) Dr.Nityanand
8. Which method is used to purify the inorganic substances?
a) Washing b) Drying c) Sublimation d) All of them
9. The limit test for iron is based on the formation of pale pink to deep reddish purple color by reaction of iron with ----- acid.
a) Thioglycolic acid b) Nitric acid c) Acetic acid d) Hydrochloric acid
10. A monograph is complete description of a specific pharmaceutical which includes -----.
a) Chemical formula b) Molecular weight c) Solubility d) All of these
11. pH of the blood falls below 7.35 this condition is termed as -----.
a) Acidosis b) Alkalosis c) Achlorhydria d) Hyperchlorhydria
12. Unit of radioactivity is -----.
a) Calorie b) Newton c) Curie d) Joules

13. Synonym of aqueous iodine solution is -----.

- a) Lugol's solution c) Strong iodine solution
b) Tincture iodine d) None of these

14. ----- is not a buffer system of our body.

- a) Borate buffer system c) Carbonic acid-bicarbonate system
b) Phosphate buffer system d) Protein buffer system

15. Ammonium chloride is used as -----.

- a) Expectorant b) Systemic acidifier c) Diuretic d) All of these

16. ----- is only water soluble compound used as effective antacid.

- a) Magnesium trisilicate c) Sodium bicarbonate
b) Milk of magnesia d) Sodium hydroxide

17. Assay of chlorinated lime is done by ----- titration method.

- a) Acid-base b) Complexometry c) Iodometry d) None of these

18. Anti microbial action of anti bacterial agents is due to -----.

- a) Protein precipitation b) Oxidation c) Halogenation d) All of these

19. Milk of magnesia I.P. is an aqueous suspension of hydrated -----.

- a) $MgSO_4$ b) $Mg(OH)_2$ c) $MgCO_3$ d) Mg - trisilicate

20. The substances like..... which emit radioactive radiations are called as radioactive substances.

- a) Uranium b) Thorium c) Radium d) All of them

Q. No. 2. Attempt any TWO of the following: (20)

- i) Define Radioactivity. Explain the properties of Alpha, Beta and Gamma rays. Write short note on storage and handling of radioactive material.
- ii) Write on – a) What are Astringents? Write the monograph of Zinc Sulphate.
b) Oral Rehydration Salt (ORS).
- iii) Define and classify Antacids with examples. Write the ideal properties of Antacids. Write the properties and uses of $NaHCO_3$.

Q. No. 3. Attempt any SEVEN of the following: (35)

- a) What are Impurities? Explain different sources of impurities with examples.
- b) Explain in detail the assay of Ammonium chloride.
- c) Explain the role of fluoride in the treatment of Tooth Decay.
- d) Write the principle and reaction involved in limit test for Arsenic.
- e) Define buffer. Explain mechanism of buffer.
- f) Write in short history of Indian Pharmacopoeia.
- g) Define antimicrobial agents. Write the mechanism of actions of antimicrobials with examples.
- h) Write short note on Haematinics.
- i) Define and classify Antidotes with examples.

*** End ***