EVERWIN MATRIC. HR. SEC. SCHOOL

09.08.19   T.T Chemistry   Time: 45 Mins

STD: XI (C,D)   Marks: 30

I. Choose the best answer: 5x1=5

1. The element with positive electron gain enthalpy is

    a) Hydrogen b) Sodium   c) Argon   d) Fluorine

2. Which of the following pairs of elements exhibit diagonal relationship?

    a) Be and Mg b) Li and Be c) Be and B d) Be and Al

3. In a given shell the order of screening effect is

    a) s>p>d>f   b) s>p>f>d   c) f>d>p>s   d) f>p>s>d

4. What would be the IUPAC name for an element with atomic number 222?

    a) bibibiium b) bididium c) didibium d) bibibium

5. The group of elements in which the differentiating electron enters the anti penultimate shell of atoms are called

    a) p-block elements   b) d-block elements

    c) s-block elements d   d) f-block elements

II. Answer any 5 of the following questions: 5x2=10

6. Write temporary name of the elements for given atomic number

    a) 108   b) 126

7. Define periodicity.

8. Give expression for Moseley's work.

9. Define modern periodic law.

10. Write the name and deduce the atomic number in the group

    a) Third alkali metal   b) second noble gas

11. Write Dobrenier classification of elements.

III. Answer any 5 of the following questions: 5x3=15

12. Write Lavoisier classification of elements.

13. Write Chancourtois classification of elements.

14. Explain Newland law of octaves.

15. Write permanent name of the elements with atomic number (105-110).

16. A sample of gas at 15c at 1atm has a volume of $2.58dm^3$ when the temperature is raised to 38^0c at 1atm does the volume of the gas increase? If so, calculate the final volume.

17. Of two samples of nitrogen gas, Sample A contains 1.5 moles of nitrogen in a vessel of volume of $37.6dm^3$ at 298K and the Sample B is in a vessel of volume $16.5dm^3$ at 298K. Calculate the number of moles in Sample B.

18. State Mendeleev's Law. Mention his prediction in the periodic table.

09.08.19   T.T Physics   Time: 45 Mins

STD: XI (A,B)   Marks: 30

I. Choose the best answer: 5x1=5

1. When a car takes a sudden left turn in the curved road, passengers are pushed towards the right due to _____.
   - a) inertia of direction
   - b) inertia of motion
   - c) inertia of rest
   - d) absence of inertia

2. Two masses m_1 and m_2 are experiencing the same force where $m_1 < m_2$. The ratio of their acceleraton $\frac{a_1}{a_2}$ is _____.
   - a) 1
   - b) less than 1
   - c) greater than 1
   - d) all the three cases

3. Force acting on the particle moving with constant speed is
   - a) always zero
   - b) need not be zero
   - c) always non-zero
   - d) cannot be concluded

4. The coefficient of static friction value for steel is _____.
   - a) 1
   - b) 0.1
   - c) 0.75
   - d) 0.6

5. The SI unit of Impulse is _____.
   - a) Joules
   - b) NS
   - c) N
   - d) $\frac{J}{S}$

II. Answer any 3 of the following questions: 3x2=6

6. Define Impulse.

7. What is kinetic friction?

8. Consider an object of mass 2kg resting on the floor. The coefficient of static friction between the object and the floor is μ_s=0.8 what force must be applied on the object to move it?

9. What is concurrent force?

III. Answer any 3 of the following questions: 3x3=9

10. Explain Lami's theorem.

11. Explain angle of repose.

12. A block of mass(m) slides down the plane inclined at an angle 60^0 with an acceleration $\frac{g}{2}$. Find the coefficient of kinetic friction?

13. Difference between static friction and kinetic friction.

IV. Answer the following in detail: 2x5=10

14. a) Explain the motion of blocks connected by a string in vertical motion.   (or)
    b) Explain the motion of blocks conected by a string in vertical motion.

15. Using free body diagram, show that it is easy to pull an object than push it.

09.08.19   T.T Commerce   Time: 45 Mins

STD: XI (E,H,I)   Marks: 25

I. Choose the correct answer: 5x1=5

1. The Central Bank of India is _____.
   - a) SBI
   - b) ICICI
   - c) RBI

2. The RBI commenced its operations from April 1,
   - a) 1935
   - b) 1936
   - c) 1953

3. Which bank has the power to issue bank notes?
   - a) Central bank
   - b) Commercial bank
   - c) Foreign bank

4. Bankers are not only dealers of money but also leaders in
   - a) Economic Development
   - b) Trade Development
   - c) Industry Development

5. Which of the following is not a function of Central Bank?
   - a) Deal with general public
   - b) Acts essentially as government banker
   - c) Maintains deposit account of all other banks

II. Answer the following: 2x2=4

6. Write the meaning of Bank.

7. What are the services included in service business?

III. Answer the following: 2x3=6

8. Explain the origin of RBI.

9. Who are the persons involved in RBI?

IV. Answer in detail: 1x10=10

10. Classify various functions of RBI.

09.08.19   T.T Economics   Time: 45 Mins

STD: XI (F,G)   Marks: 30

I. Choose the best answer: 10x1=10

1. Mention the economics reaped from inside the firm.

     a) Financial   b) Technical   c) Managerial   d) All the above

2. Modern economists have propounded the law of

     a) increasing returns   b) decreasing returns

     c) constant returns   d) variable proportions

3. The man-made physical goods used to produce other goods

   and services are referred to as

     a) Land   b) Labour   c) Capital   d) Organization

4. Which factor is called the changing agent of the society?

     a) Labourer   b) Land   c) Organizer   d) Capital

5. The long run production function explained by

     a) Law of demand   b) Law of supply   c) Returns to scale

     d) Law of variables proportions

6. The relationship between the price of a commodity and the

   supply of commodity is

     a) negative   b) positive   c) zero   d) increase

7. If average product is decreasing then marginal product,

     a) must be greater than average product

     b) must be less than average product

     c) must be increasing   d) both a and c

8. An Iso-quant (curve) is also known as

     a) Inelastic Supply curve   b) Inelastic Demand curve

     c) Equi-Marginal Utility   d) Equal product curve

9. Product obtained from additional factors of production is

   termed as

     a) Marginal product   b) Total product

     c) Average product   d) Annual product

10. The primary factors of production are

     a) Labour and organisation   b) Labour and capital

     c) Land and capital   d) Land and labour

II. Answer the following: 5x3=15

11. Define labour.

12. Define Marginal product of a factor.

13. What are the reasons for upward sloping supply curve?

14. What is Iso-cost line?

15. Classify the factors of production.

16. State the production function.

III. Answer in detail: 1x5=5

17. Examine the Law of variable proportions with the help of a

   diagram.