

T-09E

6. Which of having the highest ionisation energy in the following groups? Why?

(1, 5, 17, 18)

7. Explain why the 'd' block elements show different oxidation state?

8, 9 questions. 3 score each

8. The Atomic number of an element is 13.

a. Write the subshell electronic configuration?

b. Write the group and period of this element?

9. Electronic configuration of an element "X" is given below

2, 8, 13, 1

a) Write the sub shell electronic configuration of this element using suitable noble gas configuration

b) Write the block of the periodic table in which this element belongs to.

10. The subshell electronic configuration of 'A³⁺' ion is given below (symbol is not real)

$1s^2 2s^2 2p^6 3s^2 3p^6 3d^3$

a. Find the Atomic number of 'A'

b. Write the subshell electronic configuration of A? 4

STEP

Chapter Based Evaluation

KP

Chemistry

Time : 45 Mnts

Std. 10

(Periodic table and electronic configuration)

Score : 20

Instructions :

- The first 7 minutes cool - off time
- This time is to be spent for reading the questions paper
- You are not supposed to write anything during the cool - off time
- Read the instructions carefully and attempt the questions

(From 1 to 4 questions 1 score each)

1. Identify the relation and fill in the blank .

${}_{20}\text{Ca} : 2, 8, 8, 2$

${}_{22}\text{Ti} : \text{—————}$

2. Which of the following is a colourless compound

($\text{K}_2\text{Cr}_2\text{O}_7$, KMnO_4 , KClO_3 , CuSO_4)

3. Which of the following is a common subshell for all shells

(s, p, d, f)

4. Find out the oxidation state of Fe in FeO

Hint:- electronic configuration of oxygen is $1s^2 2s^2$

$2p^4$

From 5 to 7 questions 2 score each

5. a) In which block of the periodic table alkali metals are included?

b) Write two examples of alkali metals

(P.T.O)