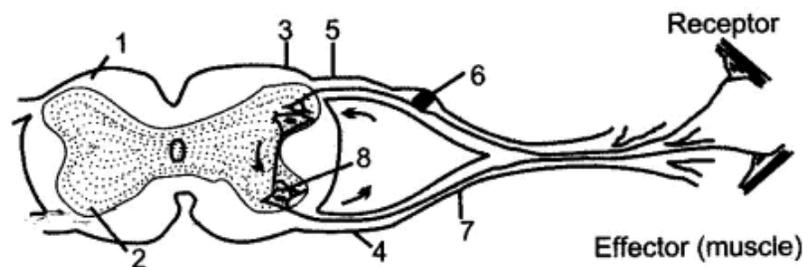


**Board – ICSE****Class – 10****Topic – Nervous system and Sense Organ**

1. Fill in the blanks:
  - (i) A nerve chain between a receptor and an effector organ is called \_\_\_\_\_.
  - (ii) Optic nerve is a type \_\_\_\_\_ nerve, whereas spinal nerves are \_\_\_\_\_ nerves.
  - (iii) Cerebrum is the site of \_\_\_\_\_.
  - (iv) \_\_\_\_\_ is the largest part of the brain.
2. True & False:
  - (i) A nerve impulse passes from one neuron to another across a synapse.
  - (ii) Reflex action is a unit of nervous action.
  - (iii) Cranium is portion of the brain.
  - (iv) Spinal nerves are twelve pair.
  - (v) Reflex action involves brain.
  - (vi) A reflex action is a spontaneous response to a stimulus.
3. Multiple Choice Questions:
  - (i) Cerebellum is the part of the brain which is responsible for:
    - a) Interpreting sensations.
    - b) Conducting reflexes in the body
    - c) Maintaining posture and equilibrium.
    - d) Controlling thinking, memory and reasoning.
  - (ii) A reflex arc in man is best described as movement of stimuli from:
    - a) Receptor cell, sensory neuron, relaying neuron, effector muscles
    - b) Receptor cell, efferent nerve, relaying neuron, muscles of the body
    - c) Receptor cell, spinal cord, motor neuron, relaying neuron
    - d) Receptor cell, synapse, motor neuron, relaying neuron
  - (iii) The ventral root ganglion of the spinal cord contains cell bodies of the:
    - a) Motor neuron
    - b) Intermediate neuron
    - c) synapsis
    - d) sensory
  - (iv) The function of nervous system is to:
    - a) Receive stimuli

- b) Irritability.
  - c) Conduction of enzymes
  - d) To prepare the body against reactions during emergency
- (ii) If the cerebellum is injured:
- a) Movement becomes shaky and speech become defective
  - b) Movement becomes unbalanced, walk uncontrolled and speech defective
  - c) Movement becomes jerky, walk controlled
  - d) There is no effect as the actions are under the control of will.
- (iii) The control of reflex action is through:
- a) Central nervous system
  - b) Peripheral nervous system.
  - c) Autonomic nervous system.
  - d) None of the above.
4. Give Technical Terms:
- (i) The chemical messenger by which the nerve impulse travels from one neuron to the other.
  - (ii) The fluid which fills the central canal of the spinal cord.
  - (iii) The part of human brain that controls body temperature.
  - (iv) The fine cytoplasmic processes of the cell body of a neuron.
  - (v) Response to a stimulus without the intervention of the will of an animal.
5. State the Location:
- (i) Nodes of Ranvier
  - (ii) Cerebellum
6. Choose the Odd One Out: Cyton, Photon, Axon, Dendron.
7. Explain the Terms: A Mixed nerve
8. Write the functional activity of the following structures:
- (i) Myelin sheath
9. The diagram given below represents the spinal cord of a mammal, seen in a transverse section together with the nerves. Study the diagram and then answer the questions given below:



10. Differentiate between Cerebrum and Spinal cord (arrangement of neurons).
11. A person after consuming alcohol walks clumsily. Give Reasons?
12. (i) What is meant by 'reflex action'?
- (ii) State whether the following are simple reflexes, conditioned reflexes, or neither of the two:
  1. Sneezing.
  2. Blushing.
  3. Constriction of pupil.
  4. Lifting up a book.
  5. Knitting without looking.
  6. Sudden application of brakes without thinking.
  7. Blinking
  8. Cleaning
  9. Playing on the Keyboard
  10. Salivation when food is put in the mouth.