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WHAT IS ACTION POTENTIAL?

An action potential (AP) is the mode through which a neuron transports electrical signals. It is defined as a brief change in voltage across the membrane due to the flow of certain ions into and out of the neuron.

Origin of Action Potential :-

An action potential begins at the axon hillock as a result of depolarisation. During depolarisation voltage gated sodium ion channels open due to an electrical stimulus. As the sodium rushes back into the cell the positive sodium ions raises the charge and it flow from negative to positive.

In physiology, an action potential (AP) occurs when the membrane potential of a specific cell location rapidly rises and falls.

Electrical Cell Membranes :-

Electrical currents flow across cell membranes. They produce a charge that extends the entire length of the cell membrane ~~to~~ by using ions from both the extracellular and intracellular sides of the cell. It is said that the cell membrane has a resting potential when not much is happening.