



Volt (V): Unit of electric potential or how much the charge is "pushed"

Ampere (Amp): Unit of electric current or how many electrons go past a given point in a second

Direct Current (DC): An electric current that regularly reverses direction.

Resistance: The opposition against the free transfer of electrons in a conductor.

load resistance: the cumulative **resistance** of a circuit, as seen by the voltage, current, or power source driving that circuit. ... A **load** resistor is a resistor that has the sole function of increasing the **load resistance** of the circuit to a specific level

Source resistance: **Source resistance** is a measure of how much the **source** opposes the load from drawing current from it. it is a kind of opposition

Impedance Matching: A technique used to match a load resistance to a source resistance in order to achieve maximum transfer of power

Load: An element connected across the output terminals of a circuit that draws current from the circuit.

Power: The rate of energy usage equal to the voltage times the current.

Maximum Power Transfer: A transfer of maximum power from a source to a load when the load resistance equals the internal source resistance.

Compass: A navigational instrument that measures directions using a free floating magnetic and the Earth's magnetic field to point towards the Magnetic North Pole

Watts: The SI unit of power, equivalent to one joule per second, corresponding to the power in an electric circuit in which the potential difference is one volt and the current one ampere.

Ohm: Unit of electric resistance which is equal to the ratio of voltage to amperage.

Kirchhoff's Laws: Two equalities that deal with the current and potential difference in the lumped element model of electrical circuits.

Nikola Tesla: Invented the Alternating Current (AC current) for electricity.

Thomas Edison: American inventor best known for inventing the electric light bulb, also created Direct Current (DC).

Inductor:

Has an ability to store a charge in a magnetic field (whereas a capacitor stores it in an electric field) and has the ability to maintain a constant current in a circuit (whereas a capacitor can maintain a constant voltage). This means that an inductor can easily conduct DC (whereas a capacitor can easily conduct AC), however if AC is put through an inductor, the magnetic field will grow and collapse with the rise and fall of current, which tends to oppose the flow of AC through an inductor.

Capacitor: A device that stores a charge.