



**Welcome to my online
course:**

***Technical English and
terminology***



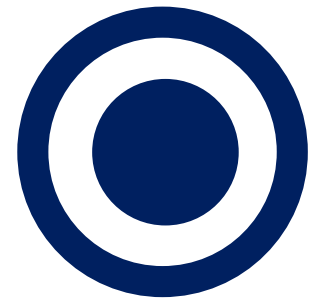
People's Democratic Republic of Algeria

Ministry of Higher Education and Scientific Research

University of August 20, 1955 Skikda

Faculty of Technology

Department of Mechanical Engineering



Technical English and terminology

S2: Written comprehension P1

Level: First year Master Electromechanics



Targeted skills



Build a specialized vocabulary relevant to their field of study.



Enhance analytical skills to interpret and evaluate technical information, identifying key concepts findings in specialized texts.



Apply the information gained from technical texts to solve problems and address challenges specific to their specialty.



Enable students to apply the information gleaned from technical texts to real-world scenarios and projects within their specialty.



Electric network

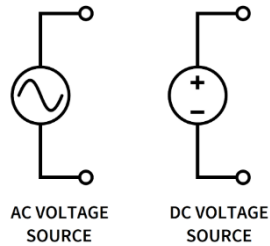
An electrical network is an interconnection of electrical components (e.g., voltage sources, current sources, batteries, resistors, inductors, capacitors, switches, transistors). An electrical circuit is a network consisting of a closed loop, giving a return path for the current. Linear electrical networks, a special type consisting only of sources (voltage or current), linear lumped elements (resistors, capacitors, inductors), and linear distributed elements (transmission lines). (*Source: Wikipedia*)

The main parts of an ideal electric network are:

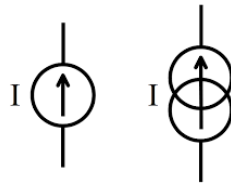
- Electrical sources for delivering electricity to the circuit and are mainly electric generators and batteries;
- Controlling devices for controlling electricity and are mainly switches, circuit breakers and potentiometer, etc.
- Protection devices for protecting the circuit from abnormal conditions and are mainly electric fuses, Circuit Breaker , switchgear systems.
- Conducting path to carry electric current from one point to other in the circuit and these are mainly wires or conductors.
- Electric loads.

Comprehension

An electrical network is an interconnection of electrical components (e.g., voltage sources, current sources, batteries, resistors, inductors, capacitors, switches, transistors ...).



Voltage sources



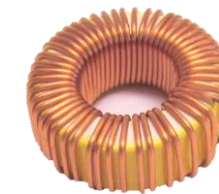
Current sources



Battery



Resistors



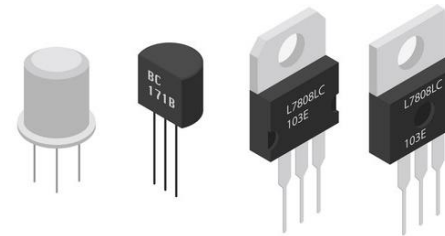
inductor



capacitor



Switches

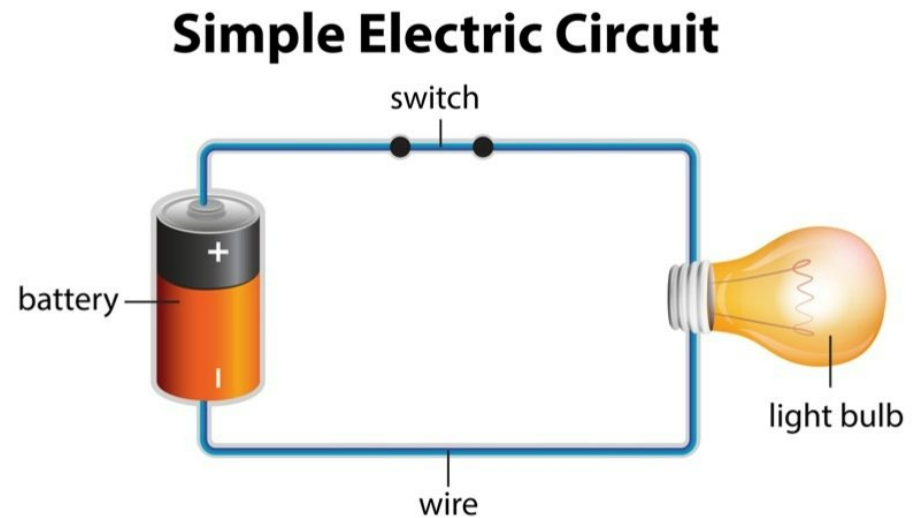


transistors

An electrical circuit is a network consisting of a closed loop, giving a return path for the current.



electrical circuit



closed loop circuit

The main parts of an ideal electric network are:

- Electrical sources for delivering electricity to the circuit and are mainly electric generators and batteries;



Generator



potentiometer

- Controlling devices for controlling electricity and are mainly switches, circuit breakers, and potentiometer, etc.



circuit breakers



potentiometer

- Protection devices for protecting the circuit from abnormal conditions and are mainly electric fuses, Circuit Breaker , switchgear systems.



electric fuses



switchgear systems



Word in English	Translate to French	Translate to Arab
electrical network	Réseau électrique	شبكة كهربائية
electrical circuit	Circuit électrique	دائرة كهربائية
Voltage sources	Sources de tension	مصادر الجهد
Current sources	Sources de courant	مصادر التيار الكهربائي
Switches	Interrupteurs	مفاتيح كهربائية
closed circuit	circuit fermée	دائرة مغلقة
circuit breakers	Disjoncteurs	قواطع دوائر كهربائية
potentiometer	Potentiomètre	مغير فرق الجهد

Word in English	Translate to French	Translate to Arab
electric fuses	Fusibles électriques	الصمامات الكهربائية
switchgear systems	Systèmes de commutation	أنظمة المفاتيح الكهربائية
wires or conductors	Fils ou conducteurs	الأسلاك أو الموصلات
Electric loads.	Charges électriques	الأحمال الكهربائية

Discussions