



THE *scout* ASSOCIATION  
OF MALTA

**Xghajra Scout Group**

[xghajrascouts.org](http://xghajrascouts.org)

## 6.02. Engineering

- (a) What is Engineering? Learn about different types of engineers (mechanical, electrical, civil, etc.). Choose one and explain what they do through a drawing, model, or short talk.
- (b) Explore simple machines such as levers, pulleys, and wheels & axles. Build a working example, like a seesaw (lever) or a pulley system to lift a small object.
- (c) Build a basic circuit using a battery, wires, and a small light bulb or buzzer. Learn how electricity flows and experiment with an on/off switch.
- (d) Use household materials (e.g. cardboard, tape, straws) to create a small engineering project. Ideas include a bridge that holds weight, a wind-powered car, or a catapult.
- (e) Fix It! – Learn about different tools and their uses. Safely try using a screwdriver, wrench, or pliers to fix or build something (under supervision).