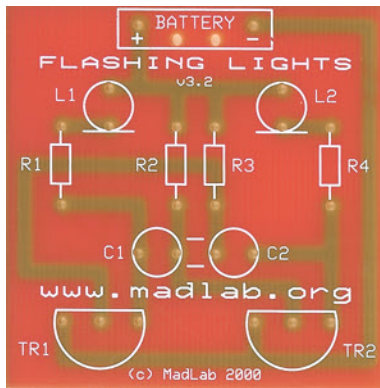
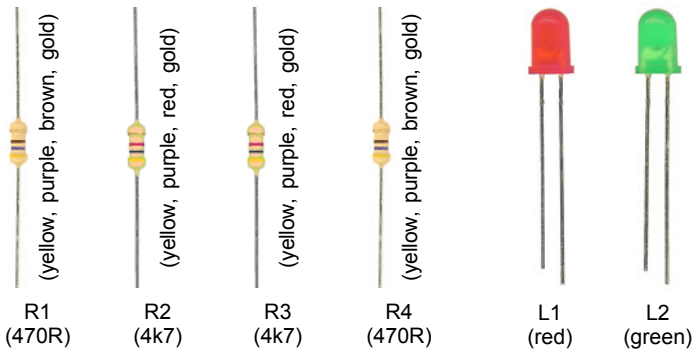
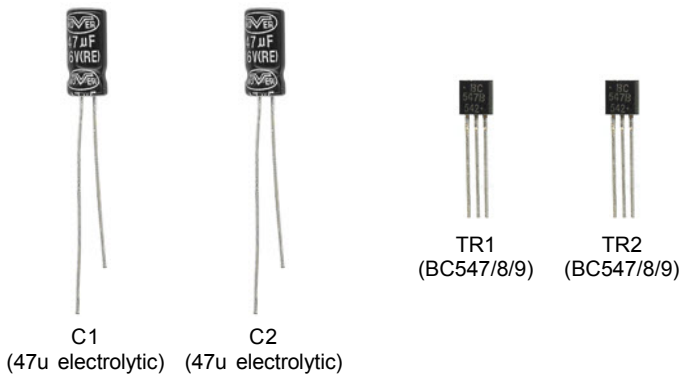


FLASHING LIGHTS

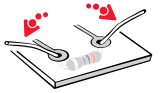
a learn-to-solder kit for beginners



Circuit board



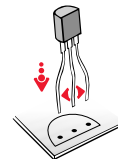
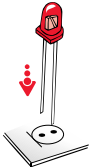
- 1 Identify the different components using the spotter chart.
- 2 Find the resistors (R1, R2, R3 and R4) telling them apart by the coloured bands around their bodies. Bend the legs into a U-shape then fit them flat onto the picture side of the circuit board. Bend the legs outwards into a V-shape to hold them in place. They can be fitted either way around.



- 3 Fit the capacitors (C1 and C2) to the board putting the shorter leg into the hole with the - sign. The shorter leg also has a stripe on the side of the body. Bend the legs outwards a little to hold them in place.



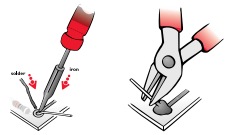
- 4 Fit the lights (L1 and L2) to the board putting the shorter leg into the hole with the line. The shorter leg also has a flattened edge on the rim. Bend the legs away from each other.



- 5 Open the legs of the transistors (TR1 and TR2) a little and fit them to the board matching the half-circle shape of the transistor to the half-circle shape on the board. Push the transistors half way down and bend their legs.



- 6 Solder the legs of all the components to the metal side of the board then clip the legs close to each solder joint.



- 7 Push the battery snap leads up through the larger holes in the board from the metal side of the board. Fit the metal tip of the red lead into the BATTERY + hole and the metal tip of the black lead into the BATTERY - hole. Solder the metal tips to the tracks on the board then pull the wire loops back.

- 8 Connect a battery **(9V PP3)** to the battery snap. The red and green lights should flash a few times each second.