Technical Description

The Equipment Under Test (EUT) is a 2.4GHz Transceiver (Car Unit) controlled by controller operating at the frequency range of 2410-2475 MHz with a channel spacing of 1MHz. The EUT is powered by 7.2V rechargeable battery. After switch on the EUT and paired with the controller, the caterpillar (wheel) on the left/right can be controlled to roll forward and backward separately by the controller.

Antenna Type: Internal integral antenna

Antenna Gain: 0dBi

Nominal rated field strength: 90.0dBµV/m at 3m

Maximum allowed field strength of production tolerance: +/- 3dB

The brief circuit description is listed as below:

- 1) U1 and the associated circuit act as a RX MCU.
- 2) U4 acts as the motor drivers.
- 3) U2 acts as the DC convertor.
- 4) Y2 acts as the crystal oscillator for U1
- 5) K1 acts as the power switch
- 6) L1, C16 and R1 act as the filter.