

Technical Description

The Equipment Under Test (EUT), is a portable toy house with a 2.4 GHz Transceiver. The sample supplied operated on 3 channels, normally at 2420MHz, 2435MHz and 2465MHz.

The EUT is powered by 3 x 1.5V AAA batteries. After switching on the EUT, the EUT can be paired with another toy house and interact with it. When the button of the EUT is pressed, it will emit light and sound, then the other toy house will emit light and sound to response.

Antenna Type: Internal, Integral antenna

Antenna Gain: 0dBi

Nominal rated field strength is 94.3dB μ V/m at 3m (Peak), 81.7dB μ V/m at 3m (Average)

Maximum allowed production tolerance: +/- 3dB

The brief circuit description is listed as follows:

1. U1 (GPCE500A) acts as MCU
2. U4 (PAN1026) acts as RF IC
3. Y1 acts as 16MHz Oscillator
4. C8, C19, C22 and L1 act as antenna matching circuit
5. U3 (XM25QH64D) acts as flash memory
6. U2 (BX6205) acts as voltage regulator