

Test Procedures

Product description: The 86017 produces baseband audio and video outputs from received streaming data. The received data is achieved with an internal direct sequence spread spectrum transceiver operating in the 2.4 Ghz frequency band.

Powerline conducted interference: The AC powerline conducted emissions measurements were made in accordance with ANSI C64.3 2003.

Band Edge: The Spurious RF conducted emissions at the edges of the authorized band were measured with the EUT set to low, medium and high transmit frequencies. The data rate of the radio was varied to determine the level that produced the worst case. The measurements were made using a direct connection between the RF output of the EUT and the spectrum analyzer. The channels closest to the band edges were selected. The spectrum was scanned across each band edge from 25 MHz below the band edge to 25 MHz above the band edge.

Power Output: The peak output power was measured with the EUT set to low, medium and high transmit frequencies. The EUT was transmitting at its maximum output power. The data rate of the radio was varied to determine the level that produced the highest output power. The measurements were made using a direct connection between the RF output of the EUT and the spectrum analyzer. The results were verified with an RF power meter.

Power Spectral Density: The peak power spectral density measurements were measured with the EUT set to low, medium and high transmit frequencies. The data rate of the radio was varied to determine the level that produced the worst case. The measurements were made using a direct connection between the RF output of the EUT and the spectrum analyzer.

Occupied Bandwidth: The occupied bandwidth was measured with the EUT set to low, medium and high transmit frequencies. The data rate of the radio was varied to determine the level that produced the worst case. The measurements were made using a direct connection between the RF output of the EUT and the spectrum analyzer.

Conducted Spurious Emissions: The spurious RF conducted emissions were measured with the EUT set to low, medium and high transmit frequencies. The data rate of the radio was varied to determine the level that produced the worst case. The measurements were made using a direct connection between the RF output of the EUT and the spectrum analyzer. All emissions up to 25 Ghz were investigated.

Radiated Spurious Emissions: The radiated spurious emissions measurements were measured with the EUT set to low, medium and high transmit frequencies. The data rate of the radio was varied to determine the level that produced the worst case. The measurements were made using our open area test site. All emissions up to 25 Ghz were investigated and those falling into restricted bands were measured for compliance.