

BZ5MXD1V
Application for FCC Certification
1 Watt Digital Television Translator

Power Measurements

The translator's power meter circuit uses a detected sample from a coupler on the output. An averaging detector circuit provides the DC level to drive the translator's output level meter.

The translator was connected to a test load through a calibrated directional coupler. The spectrum analyzer's "Channel Power" function was used to measure the average power level of the signal as sampled through the directional coupler. (see Fig.) .

Measured power: 0.0dBm
Coupling/cabling loss: 14.0 dB
Attenuator @ i/p to spectrum analyzer 16dB
Power: 30.0dBm
Power = 1.0 Watt

