



TOWERIQ[™]
A POTTER COMPANY

TQ-GUARDIAN-A

Digital Class A BDA
UL2524 Listed



FEATURES

- Improves coverage for Public Safety Radio Network Frequencies (UL: 799-805, 806-816 & DL: 769-775 851-861)
- Class A, 32 channel independently controlled channels per band with Auto Gain Control (AGC) for each channel
- 90 dB gain, 2-Watt system
- Meets the code for NFPA 72/1221 and IFC 510
- UL 2524 Certified and Labeled
- Ethernet port with built-in TowerIQ Sentry[™] remote monitoring hardware
- Integrated dry contact 9-pin alarming
- UPS port for external battery backup
- Automatic gain control (AGC) and Oscillation Detection with automatic remediation
- Energy-saving operation allows bands to remain dormant when not in use
- A/C 110V or D/C 24- 30 V power option
- Independently adjustable frequency attenuation for uplink and downlink
- (Reduce gain in -1 dBm increments)
- Industry leading 3-year warranty available



Electrical Specifications

Electrical	700 MHz	800 MHz
Frequency Range, Uplink	799 – 805 MHz	806 – 816 MHz
Frequency Range, Downlink	769 – 775 MHz	851 – 861 MHz
Channel Bandwidth	12.5 / 25 / 75 + 10 MHz (LTE, US)	12.5 / 25 / 75 MHz
Number of Channels	32	32
Total Output Power, Uplink	27 dBm	27 dBm
Total Output Power, Downlink	33 dBm	33 dBm
Maximum System Gain	90 dB	90 dB
Gain Adjustment Range (1 dB step)	0-50 dB	0-50 dB
Pass Band Ripple, p-p	≤5 dB	≤5 dB
Uplink Noise Figure	≤5 dB	≤5 dB
System Group Delay	≤35 usec	≤35 usec
Intermodulation	≤-13 dBm	≤-13 dBm
Spurious	9 kHz to 1 GHz	FCC Compliance
	1 GHz to 12.75 GHz	FCC Compliance
Absolute Maximum RF Input Power	-10 dBm	-10 dBm
Impedance	50 Ω	50 Ω

Technical Specifications

Certifications	FCC: ID 2AXVJPSBG-2A Part 90 UL: 2524
Dimensions	21.2 x 17.2 x 8.0 in
Enclosure cooling	Convection
Environmental Class	Type 4
Operating Humidity	95%
Operating Temperature	-27 to +140°F (-33 to +60°C)
Power Consumption	Single band: 60W Dual band: 80W
Power Supply	AC: 100-240/50-60 Hz DC: 24-30 V
RF Connections	N Female
Weight	45.9 lbs (53 lbs shipped)

⚠ WARNING

THIS IS NOT A CONSUMER DEVICE. IT IS DESIGNED FOR INSTALLATION BY FCC LICENSEES AND QUALIFIED INSTALLERS. USERS MUST HAVE AN FCC LICENSE OR THE EXPRESS CONSENT OF AN FCC LICENSEE TO OPERATE THIS DEVICE.

UNAUTHORIZED USE MAY RESULT IN SIGNIFICANT FORFEITURE PENALTIES, INCLUDING PENALTIES IN EXCESS OF \$100,000 FOR EACH CONTINUING VIOLATION.

Part 90 Signal Boosters. THIS IS A 90.219 CLASS A DEVICE.

Ordering Information

Model	Description	Stock No.
TQ-GUARDIAN-A	2W Class A Channelized Public Safety Booster for PS 700/800/FirstNet / 32 Channels / 90dB / UL 2524 NEMA 4 Rated.	3996113