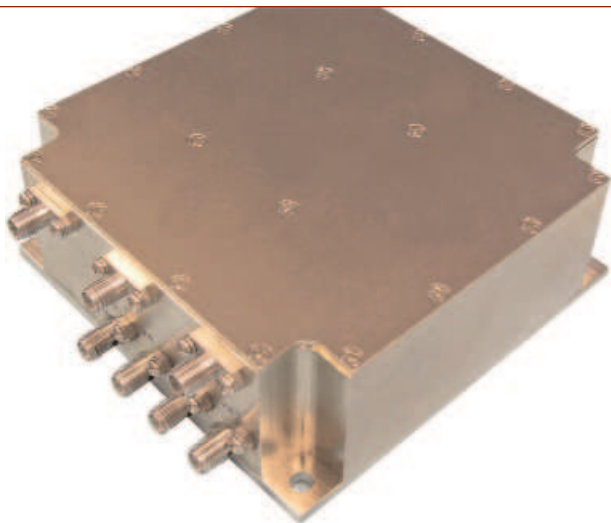


Frequency Multiplier (x4, x8)

Model BXMF1006 (250 - 300 MHz)



Features

- Low Additive Phase Noise:
-146 dBc/Hz @ 1 kHz Offset (x8)
- Excellent Harmonic Performance: -50 dBc
- Low Discrete Spurious: -75 dBc
- High Reliability: 200,000 Hr MTBF
- Low Harmonic & Sub-Harmonic Content:
-60 dBc

Description

Spectrum Microwave offers a line of low noise frequency multipliers based on multiple passive doubler/amplifier combinations. This series of multipliers cover input frequency ranges of 250 to 300 MHz with output frequencies from 1000 to 2400 MHz. Additive phase noise testing ensures low phase noise/jitter performance. All internal amplifiers and doublers are contained in rugged TO-8 hermetic packages for excellent performance over military environmental conditions.

Optional Features

- Output Filtering
- Digital ECL Outputs (Single or Differential)
- Built-in Test Power Detectors
- Internal Voltage Regulators

Applications

- Synthesizer Building Block
- SIGINT
- ELINT
- EW

Typical Specifications

| | |
|------------------------|-----------------------|
| Input Frequency | 250 to 300 MHz |
| Input Level | +10 dBm |
| Output Frequency x4 | 1000 to 1200 MHz |
| Output Frequency x8 | 2000 to 2400 MHz |
| Power Input | +10 dBm |
| Output Level | +3 dBm |
| Bandwidth | 1% |
| Switching Speed | 90 nsec |
| Harmonics | -50 dBc |
| Sub-Harminics | -70 dBc |
| ECL Differential Delay | 100 psec |
| Phase Noise | -146 dBc/Hz @ 1 kHz |
| (Ref. to input) | -158 dBc/Hz @ 10 kHz |
| | -158 dBc/Hz @ 100 kHz |
| DC Power | +15 V @ 250 mA |
| | +5 V @ 60 mA |
| Temp Range | 0°C to +70°C |

All specifications above typical, measured at 25 °C

Dimensions and Connections

4.5" L x 4.5" W x 1.5" H

Revision: 7/5/2012