



**DS INSTRUMENTS**

WWW.DSINSTRUMENTS.COM

PRELIMINARY

**MX6000PRO – 6GHz HIGH-PERFORMANCE MICROWAVE MIXER WITH LO GENERATOR**



Up-or-down-converting, or general-purpose wideband mixer with programmable harmonic-filtered LO.

**- MX6000PRO Specifications -**

- Integrated **1.7–7.0GHz** Local Oscillator
- Mixer RF frequency range: **1.7-8GHz**
- Mixer IF frequency range: **1-2500MHz**
- Typical LO to RF isolation: 25-30dB
- Typical LO to IF isolation: > 20dB
- Phase noise, 6GHz @ 10KHz: < **98 dBc**
- LO frequency step size: 2Hz
- Low conversion loss: < 8dB typical
- Return loss: >12 dB
- Typical IP3: 10-15dBm
- Input P1dB: +3dBm
- LO Harmonic level: < -35dBc
- Reference frequency: 10MHz

**- Wideband Mixer Features -**

- Extremely low LO phase-noise
- Up and down-converting
- Tiny frequency step size
- Internal 280ppb TCXO reference source
- USB Type-C powered
- Bright and efficient OLED display
- Adjustable LO power
- Standard **Ethernet** connection
- Industry-standard Virtual COM Port
- 50-Ohm gold SMA ports
- External MCX reference input (10MHz)
- High-performance LO harmonic-filtering



**- PRO Performance Vs. Standard MX6000C -**

- **LO phase-noise more than 20dB lower**
- **Frequency step size 1000x smaller**
- **Internal reference source 10x more stable**
- **Less LO harmonics and spurious content**
- **Wider frequency range**

Visit us for control software and tech support:

<https://www.dsinstruments.com/downloads/>

*Thanks for your business!*

