# **VOLTAGE CONTROLLED SAW OSCILLATOR**



## **GENERAL DESCRIPTION**

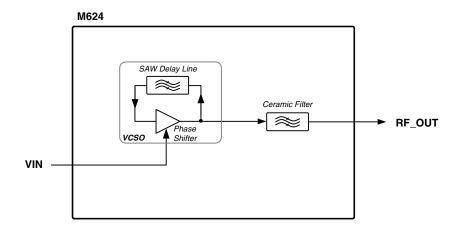
The M624 is a VCSO (Voltage Controlled SAW Oscillator) frequency source specifically designed for high-speed SONET/SDH applications for rates up to OC-768. Its integrated SAW (surface acoustic wave) delay line provides excellent phase noise performance and spectral purity, while requiring a low supply voltage (+3.3V). An extremely linear tuning range makes the M624 especially suited for phase-locked loop applications, which are extensively used in timing circuits and clock and data recovery in fiber-linked data systems. The SMT VCSO's small size and minimal power requirements make it ideal for the miniturization applications that are emerging, without sacrificing performance.

#### **FEATURES**

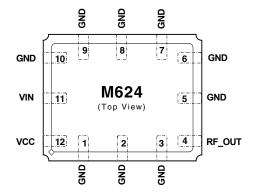
- VCSO center frequency from 500 to 625MHz
- Low phase noise -100dBc/Hz @ 1kHz offset
- Superior SAW jitter performance and aging; jitter 0.015ps rms typical (12kHz-20MHz)
- Excellent frequency stability and tuning linearity
- Low power consumption (300 mW)
- Single 3.3V power supply
- Small 0.6 x 0.8 inch SMT (surface mount) package

## **BLOCK DIAGRAM**

Downloaded from Elcodis.com electronic components distributor



## PIN ASSIGNMENT (0.6 x 0.8 inch SMT)



M624 PB Rev 2.2

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