



CSM5T17



WIDE BAND TERMINATION INSENSITIVE MIXER

- LO 50 TO 4800 MHz
- RF 50 TO 4800 MHz
- IF 50 TO 3000 MHz
- LO DRIVE +17 dBm (NOMINAL)
- HIGH INTERCEPT +23 dBm (TYP.)

Specifications (Rev. Date: 2/02)*

Characteristics	Typical	Guaranteed	
		+25°C	-40° to +85°C
SSB Conversion Loss & SSB Noise Figure (max.) f_R 0.05 to 3.4 GHz f_L 0.05 to 3.4 GHz f_I 0.05 to 3.0 GHz f_R 3.4 to 4.8 GHz f_L 3.4 to 4.8 GHz f_I 0.05 to 3.0 GHz	7.8 dB 10.0 dB	8.5 dB 11.5 dB	11.5 dB 12.5 dB
Isolation (min.) L to R $f_L = 0.05$ to 4.8 GHz, L to I $f_L = 0.05$ to 4.8 GHz R to I $f_R = 0.05$ to 2.0 GHz $f_R = 2.0$ to 4.8 GHz	33 dB 37 dB 30 dB 22 dB	23 dB 22 dB	21 dB 20 dB
1 dB Conversion Compression f_L @ +17 dBm	+14 dBm		
Input IP3 (min.) $f_L = 0.5$ to 4.8 GHz & $f_R = 0.5$ to 4.8 GHz $f_I = 0.05$ to 3.0 GHz	+23 dBm		
VSWR R-Port $f_R = 0.05$ to 4.8 GHz L-Port $f_L = 0.05$ to 4.8 GHz I-Port $f_I = 0.05$ to 3.0 GHz	2.0:1 2.0:1 2.0:1		

*Measured in a 50-ohm system with nominal LO drive level and as a downconverter application only, unless otherwise specified.

Absolute Maximum Ratings

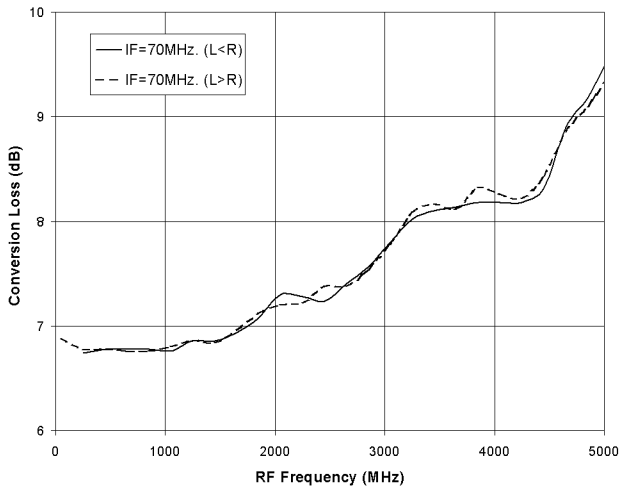
Operating Temperature	-54°C to +85°C
Storage Temperature	-65°C to +100°C
Peak Input Power	+20 dBm max. at +25°C, +17 dBm at +85°C
Peak Input Current	50 mA DC

Outline Drawing(s)

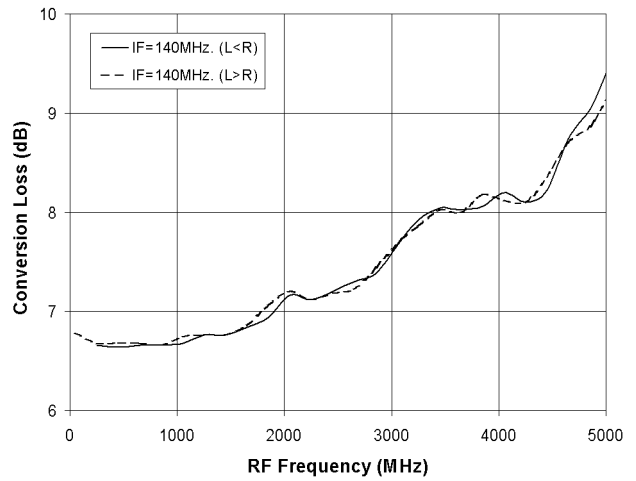
Package	Figure	Model
Surface Mount	CSM5T	AK

Typical Performance at 25°C

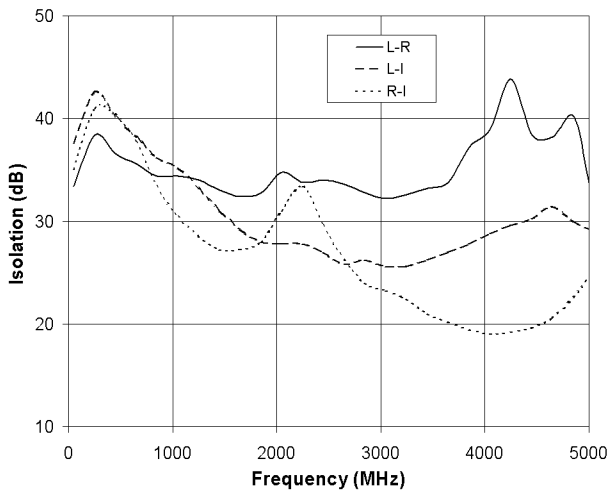
Conversion Loss vs. RF Frequency



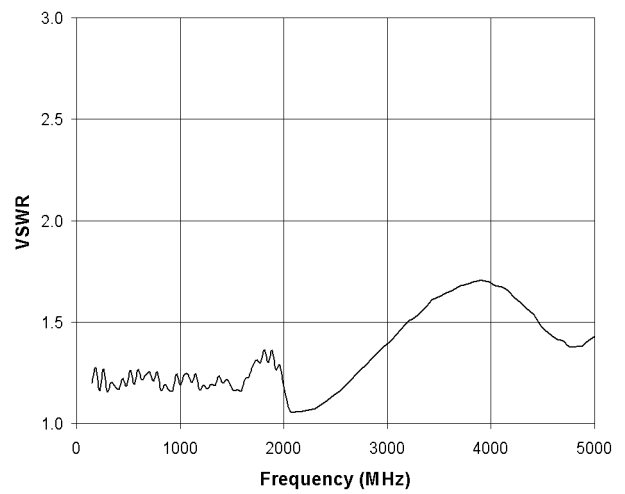
Conversion Loss vs. RF Frequency



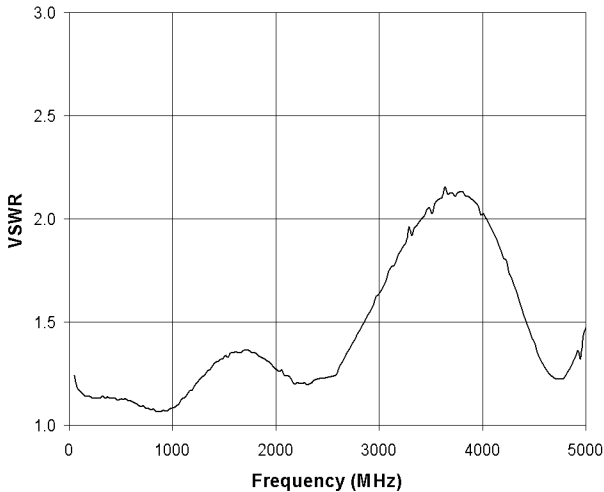
Isolation vs. Frequency



LO-Port VSWR vs. Frequency



RF-Port VSWR vs. Frequency



IF-Port VSWR vs. Frequency

