



### LSI 2227LN Low Noise Preamp (LNA)

The Loma Scientific International (LSI) 2227LN high performance Low Noise Preamp (LNA) ensures very low system noise in MMDS or generic 2GHz receive systems. The LNA can even handle moderate amounts of interference from out of band signals and it can be located near the MMDS origination transmitter site due to its high IP3 (low CTB) performance. For example: as the first active gain stage in a low cost On-channel Repeater (OCR) system the LNA establishes the noise floor. Such a repeater can capture additional subscribers that are blocked or located in distant or shadowed areas, enhancing income by eliminating lost revenue. The LNA can also be used with heterodyne frequency translators or baseband repeaters if the block downconverter (LNB) either has poor noise figure or if the LNB is connected far from the receive antenna with a long coaxial cable. Cumulative noise of any subsequent gain stages or lossy circuits is thus minimized due to the gain of the LNA simply by locating it close to the receive antenna.



#### Features

- Very Low Noise
- Wide Bandwidth including MMDS
- High IP3 (third order intercept)
- Rugged Outdoor NEMA 4X Shielded Enclosure
- AC/DC Power Supply Included

#### Specifications \*

Frequency	2200~2700MHz	2200~2400MHz
Noise Figure	1.6dB Max.	1.4dB Max.
Minimum Gain (Typical Gain)	25dB (30dB)	25dB (30dB)
Gain Flatness	+/-2.3dB Max.	+/-1.0dB Max.
Maximum CW Power		
Output (1dB compression)	+25dBm	
Input (no damage)	+3dBm	
3 <sup>rd</sup> Order Intercept Point	+38dBm Typ.	
RF Output Level per Channel (CTB<-55dBc)		
8 Channels (loading)	+5dBm/Ch Max.	
16 Channels	-1dBm/Ch Max.	
31 Channels	-7dBm/Ch Max.	
VSWR (input/output)	1.25:1/1.15:1	
RF Connectors (input and output)	50-Ohm Type-N Female	
Power Supply Connector	Type-F Female	
DC Power	+18VDC, 325mA Max.	
Operating Temp	-20°C to +50°C	
Size (case only)	4.9 x 3.14 x 2.3	
Weight	2.0lbs.	

\* Specifications are subject to change without notice.