

WARRANTY

All fiber optic transmission systems, products and accessories manufactured by Liteway, Inc. and its subsidiaries are fully tested prior to shipment and are warranted against defective materials and workmanship for a period of five full years from the date of the original shipment. Should a problem occur, a Return Material Authorization Number (RMA) must be obtained from Liteway Inc. at (516) 931-2800 and the item returned to Liteway, Inc. 166 Haverford Road, Hicksville, NY 11801, USA, prepaid. Liteway Inc. will then, at its option repair or replaces the defective item.

Liteway, Inc. maximum liability under this warranty is limited to the cost of the defective item only. No contingent liabilities of any kind are either assumed or implied.

Any items returned to Liteway, Inc. that have been misused, abused, damaged, modified, connected or adjusted in any way contrary to the instructions furnished by Liteway, Inc. or repaired by unauthorized personnel will not be covered by this warranty. Any non-warranty repairs required will be quoted at the current rate for such services.



Important Notices



CAUTION ! AVOID DIRECT EXPOSURE TO BEAM.

All -7,-8, and -9 Models use laser diodes. These solid-state laser diodes are located in the optical ports of these units. Laser diodes produce invisible radiation that may be harmful to human eyes. Never look directly into the optical port of any fiber optic unit designed to operate with single-mode optical fiber.

NOT FOR LIFE SUPPORT SYSTEMS

Liteway, Inc. does not authorize or warrant any of its products or accessories for use in critical life support systems or applications of any kind.

OPERATING INSTRUCTIONS

LuxLink® Fiber Optic Analog Transmission System

Models INST-1101 / INSR-1101



The **LuxLink®** INST/INSR-1101 system consists of the INST-1101 transmitter and INSR-1101 receiver and will transmit low noise analog signals for laboratory and instrumentation applications.

Technical Specifications

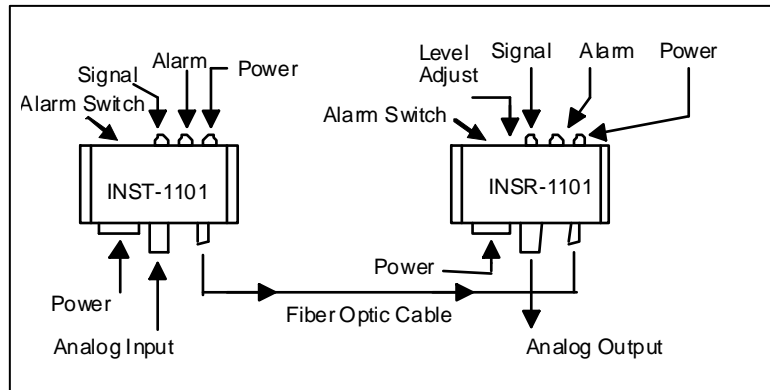
Bandwidth	20 Hz to 20 KHz (+0,-3dB)
Input / Out Impedance	600 ohms
Input Signal Level	1 volt peak-to-peak
Output Signal Level	1 volt peak-to-peak, (2 Vpp if 10K load)
Noise Level	1 millivolt pp typical
Linearity	3.0% maximum
Phase Shift	3.0° maximum
Rise / Fall time	35 ns minimum
Operating Wavelength	850(-1), or 1300 (-3,-7), or 1550 (-9)
Optical Loss Budget	0 – 10 dB (multimode or single-mode)
Fibers Accommodated	1 multi-mode (-1,-3), 1 single-mode (-7,-9)
Temperature Range	-35° to +75°C
Humidity	<95% non condensing
Power Requirements	11-24 VAC/DC @150 mA
Physical Size (mm)	5.0"(127)L x 3.0"(76)D x 1.0" (25.4)W

All specifications measured with 1Km of 62.5u multimode fiber.

All specifications are subject to change without prior notice.

Installation Instructions

The diagram below shows the typical installation of the INST-1101 and INSR-1101 fiber optic analog transmission units. Both should be connected as shown. To compensate for the unique fiber optic losses of your installation there is a level adjustment on the INSR-1101. A 1 volt pp 1 KHz test sine-wave signal should be applied to the transmitter and the receiver level adjustment should then be set for a 1 volt peak to peak output signal. The range of the receiver level control is adequate to allow the full 0 - 10dB optical path loss range to be accommodated.



Indicator Lights

Indicator	Lights when
Pwr (green)	Proper power is present.
Alm (red)	The loss of signal alarm is activated and there is no analog signal present. This feature may also not operate properly with all types of signals.
Tx or Rx (green)	A continuous analog signal of 1 volt peak-to-peak or greater is present. This indicator may not trigger on all signals

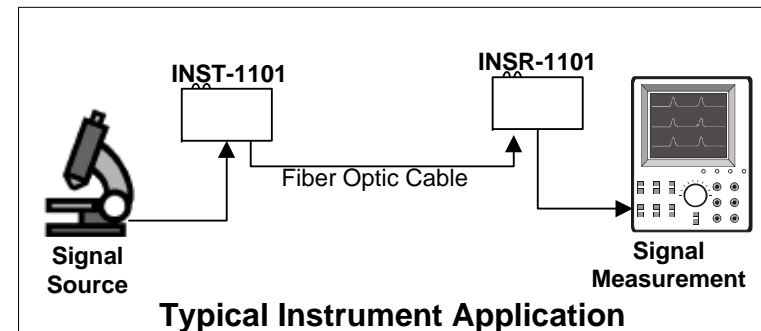
The **Alarm** switch is used to turn the alarm function on and off.

Power Terminal Block Connections

Pin	Function
1	Alarm output for use with optional Alarm Sensing Unit ALM-1000. No other connections should be made to this terminal
2	+11 to 24 DC or AC Volts input
3	AC or DC return (Common to Housing)

Be certain to check all connections, settings and voltages before applying power

These units may be used stand-alone, DIN rail mounted with an accessory DIN-1000 adapter or in an RMP-series rack mounting plate.



Typical Instrument Application