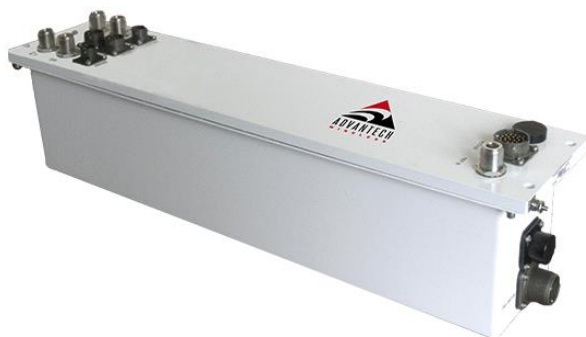


Test Loop Translator Outdoor Series AWLT-S100 model



Advantages

- Converts S-band 2025 –2120 MHz to 2200-2295 MHz
- Emulates 221/240 ratio from coherent transponder
- 10MHz high stability internal reference, with external switchover
- Full remote control via RS485

Operating Bands

Basic Model number	RF Output MHz	RF Input MHz
AWLT- S100	2200 - 2295	2025-2120

Overview

The Advantech Wireless Test Loop Translator AWLT-S100 model is intended for outdoor application. This translator is designed for testing satellite communications links in S band, where loopback is a coherent conversion with ratio 221/240. It provides extended attenuation range to generate various operation scenarios and to easily adapt to any loopback setup. A single band AWLT unit works with 2025-2120 MHz operating frequency band, translating it to 2200-2295 MHz, ready to be processed by the demodulator. Other frequency bands are also available. Please consult factory.

The flexible and comprehensive monitor and control features on the AWLT-S100 ensure that it will fit into any network management system architecture. The RS485 remote interface will provide full set-up and fault monitoring facilities.

The translator unit is housed in a weatherproof package. It is designed to meet the phase noise and frequency stability requirements of the satellite communications industry.

Options

- Ethernet SNMP or Transparent Packet mode over TCP/IP Monitoring and Control
- Other operating bands, please consult factory

Test Loop Translator Outdoor Series

AWLT-S100 model

Product Features & Specifications			
RF Input		RF Output	
Frequency range	2025-2120 MHz	Frequency range	2200-2295 MHz
Input level	0 dBm max	Translation adjustment	174-183MHz, with 1kHz step
	+10 dBm no damage	Output impedance	50 Ω
Input impedance	50 Ω	Output Connector	N-type (female)
Input Connector	N-type (female)	Output VSWR	1.2:1
Input VSWR	1.2:1		
Conversion Parameters		Controls & Indicators	
Conversion Gain	-20 dB, +/- 3dB at 0dB attenuation		LO frequency
Gain adjustment	45 dB		Attenuator control
Attenuator step size	0.1 dB		Local/Remote
Gain flatness	4.0 dB p-p max. over full band		Mute/Un-mute
	0.5 dB p-p max. over any 40 MHz		
Gain stability	± 0.05 dB/ $^{\circ}$ C max. -30 $^{\circ}$ to +55 $^{\circ}$ C		
Input/Output Isolation	-60 dBc	Mechanical	
In-band Spurious	-40 dBc at 0dBm input	Dimensions	Width 4.5" (114 mm)
	-50dBm signal independent		Height 5" (127 mm)
			Length 21" (533 mm)
Harmonics	-60 dBc	Power Supply	
		Voltage	90 – 265 VAC (47 – 63 Hz)
Phase noise	10 Hz -65 dBc	Power	40W
	100 Hz -80 dBc	Connector	MS3102R16-10P (3 pins)
	1000Hz -90 dBc	Monitor and Control	
	10 kHz -95 dBc	RS 485	MS3112E10-6P
	100 kHz -105 dBc	RS232	MS3112E10-6P
	1 MHz -115 dBc	Ethernet (optional)	MS3112E12-10P
Reference		Environmental	
External Reference	10 MHz	Operational	-30 $^{\circ}$ C to +50 $^{\circ}$ C standard
External ref. input level	0 dBm \pm 5 dB	Storage	-55 $^{\circ}$ C to +85 $^{\circ}$ C
Internal reference stability	$\pm 5 \times 10^{-8}$, over -30 $^{\circ}$ to 50 $^{\circ}$ C	Humidity	Non-condensing
Aging	$\pm 5 \times 10^{-8}$ / year	Altitude	3,000m AMSL
	$\pm 1 \times 10^{-9}$ / day		

Ref.: PB- AWLT-S100-18318

NORTH AMERICA

USA
info.usa@advantechwireless.com

CANADA
Info.canada@advantechwireless.com

EUROPE

UNITED KINGDOM
info.uk@advantechwireless.com

RUSSIA & CIS
info.russia@advantechwireless.com

SOUTH AMERICA

info.latam@advantechwireless.com

BRAZIL
info.brazil@advantechwireless.com

ASIA

info.asia@advantechwireless.com

INDIA
info.india@advantechwireless.com