

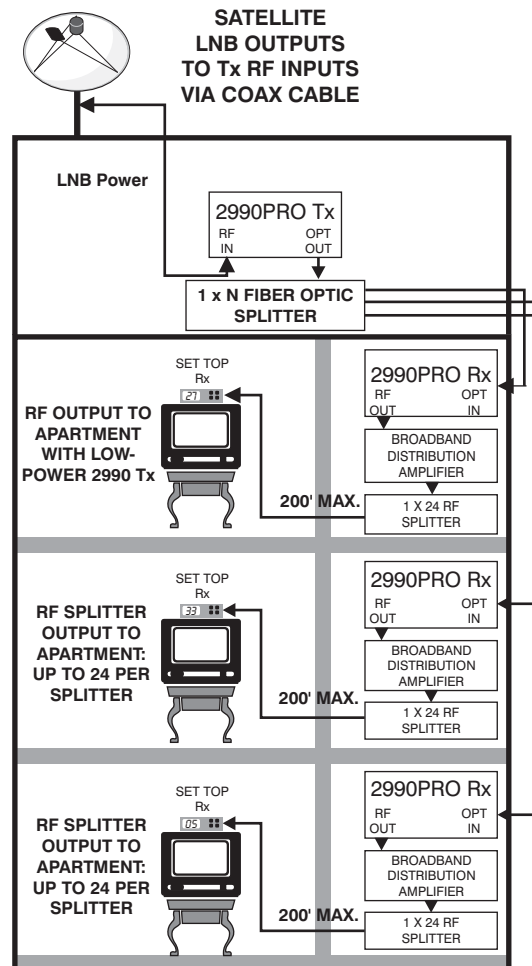
### DBS L-Band Transport

- Model 2990 transports the full L-Band spectrum (950-2200 MHz) as a standard feature.
- LNB power uses current limiting technology. The unit resets itself, eliminating down time due to blown fuses.
- 75 Ohm models are packaged in a rugged stand-alone enclosure.
- System transmits signals in excess of 35 km and increases the system's value for antenna remoting.
- Side panel LNB switch toggles the unit between +13V, Off and +17V.



*Model 2990PRO: Stand-alone Transmitter and Receiver*

The Model 2990PRO L-Band Satellite Transport System provides an economical solution for transporting digital signals for numerous satellite distribution applications, including headend relocation, and distribution of digital broadcast systems (DBS). The system utilizes a cost-effective coax cabling configuration to distribute the RF signals from the dish to the transmitter and from the receiver to the headend. The single-mode optical fiber between the 2990PRO transmitter and receiver allows transmission distances to 35 km at 1310 nm. Furthermore, using LNB power from the transmitter decreases the need for additional equipment at the dish site. RF alarm and indicator LEDs allow for a quick assessment of the link's operational status. The Model 2990PRO L-Band Transport System, whether used in an antenna remoting application or in a satellite distribution role, provides for transmission of the entire DBS spectrum in a simplified, flexible installation environment at one of the lowest costs found in today's market.



**Typical MDU Application**

# Specifications and Ordering Information

## Optical and Performance Characteristics

	Min	Typ	Max	Units
Laser Wavelength		1310		nm
Laser Output Power	+2	+3	+4	dBm
Rx Optical Input Power	-20		+4	dBm
Tx Input RF Return Loss		13	10	dB
Rx RF Output Return Loss		20	15	dB
System Gain (0 dB Opt. Loss)	18	20	22	dB
System Gain variation over temp	-2		2	dB
Amp. Flatness (950-2150 MHz)	+/-1	+/-1.5		dB
Group Delay (950-2150 MHz)		0.5	1	ns
Noise Figure (0 dB opt. loss)		22	24	dB
Noise Figure (9 dB opt. loss)		31	35	dB
Tx RF Input Range	-60		-15	dBm
Input RF Compression Point		-8		dBm
Output RF Compression Point		+11		dBm
Intermodulation Distortion*		-50	-40	dBc

\*Two -25 dBm tones @ 1000,1001 MH

## Electrical Characteristics

	Min	Typ	Max	Units
Supply Voltage	+23	+24	+25	V <sub>oc</sub>
Supply Current (Tx, No LNB)		100		mA
Supply Current (Rx)		100		mA
Max LNB Current Draw	0		300	mA

## Physical Characteristics

	Min	Typ	Max	Units
Weight		12.8		oz.
		363		g
Dimensions	5.25 x 2.56 x 1.25			in.
	133 x 65 x 32			mm

## Environmental Characteristics

	Min	Typ	Max	Units
Operating Temp. Range	-40		+60	°C
Storage Temp. Range	-40		+60	°C
Humidity (RH, non-condensing)	5		95	%



**Model 2990PRO: Stand-alone Receiver and Transmitter**

## Ordering Information

DBS Tx and RX Options	Stand-alone
Tx, LNB Power, SC/APC Connectors	2990P-T-1310-SA
Rx, SC/APC Connector	2990P-R-SA

\*FC/APC connector option available



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