

# 2806 77 Channel CATV Limited Distance Solution (LDS)



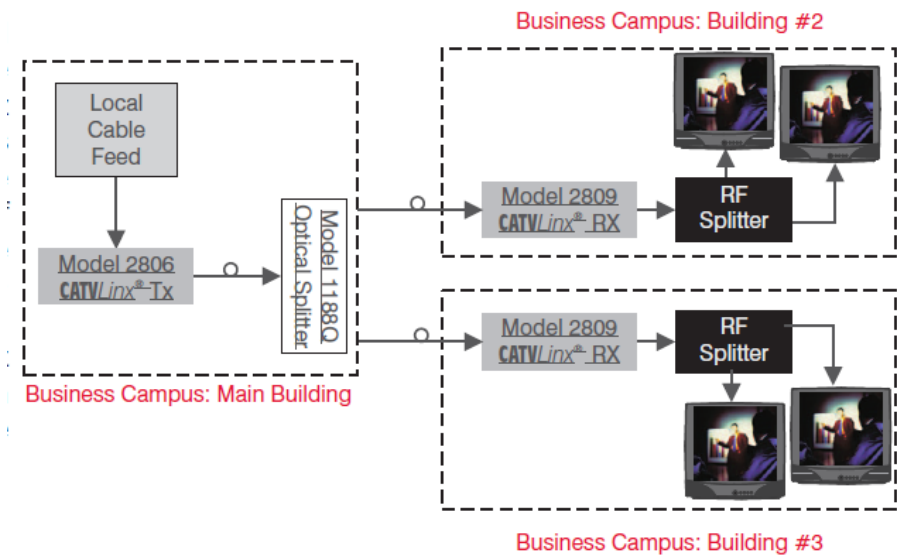
## Features

- Transmits Up to 77 Channels Over One Singlemode Fiber
- VSB/AM Transmission Ensures Compatibility with Standard CATV Modulators, Processors, etc
- Designed for Distances up to 10 km, Offers an Optical Output Power of +4.5 dBm
- Convenient Compact (3" x 8.5") Enclosure is One of the Smallest in the CATV Industry
- Built-In, Universal AC Power Supply Frees System User from Bulky Wall-Mount AC Adapters
- Excellent for Low Budget Structured In-Building Premise Wiring Video Applications

The 2806 77 Channel CATV LDS transmitter is part of a low cost system for transporting up to 77 Channels of VSB/AM modulated signals over a singlemode optical fiber. The system provides 40-870 MHz of usable bandwidth for video signals stacked at 6 MHz intervals. A low loss singlemode fiber allows full channel loading to beyond 10 km while maintaining a good carrier-to-noise ratio. Because of its relatively small size, the 2806 can be mounted almost anywhere and it is a true plug-and-play system when used with 2808 or 2809 receivers. Together, this link provides excellent performance for many demanding applications such as broadband LANs, distance learning, and multiple data services.

## 77 Channel Transmitter Part Numbers

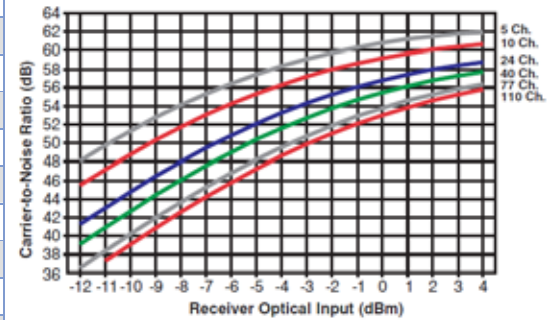
Description	Part Number
Flange Mount Transmitter, +4.5 dBm Optical Output Power, SC/APC Optical Connector	2806T-SCSP
Flange Mount Transmitter, +4.5 dBm Optical Output Power, FC/APC Optical Connector	2806T-SCAP



## RF & Optical Characteristics

Parameter	Min	Typ	Max	Units
Channel Loading	-	-	77	ch
Operating Wavelength	1290	1310	1330	nm
Optical Output Power	-	+4.5	-	dBm
Bandwidth	40	-	870	MHz
Input/Output RF Impedance	-	75	-	Ohms
Side Mode Suppression Ratio	30	40	-	dB
Backreflection Tolerance	-	-	-50	dB
Required Fiber Bandwidth	2,000	-	-	MHz
Composite Second Order (CSO)	-	-57	-	dBc
Composite Triple Beat (CTB)	-	-65	-	dBc
Carrier-to-Noise Ratio		See Graph		dB

Carrier-to-Noise Performance



System performance specifications indicated for use with 9/125  $\mu$ m singlemode fiber.

## Electrical Characteristics

Parameter	Min	Typ	Max	Units
Power Supply Voltage	-	120	240	V <sub>AC</sub>
Power Supply Frequency	50	60	-	Hz
Power Supply Current	-	75	-	mA

## Physical Characteristics

Parameter	Min	Typ	Max	Units
Weight	-	1.0	-	lb
		0.45		kg
Dimensions	-	8.45 x 2.95 x 1.12	-	in
		215 x 75 x 29		mm

## Environmental Characteristics

Parameter	Min	Typ	Max	Units
Operating Temperature Range	0	-	+45	°C
Storage Temperature Range	-20	-	+70	°C
Relative Humidity	0	-	90	%