

# Q-SERIES®

Fiber Optic Products



## QFON Fiber Nodes:

### Features:

- ▶ 1-way, 1RU fiber node
- ▶ Available in gains up to 48 dBmV output
- ▶ Variable gain & tilt controls
- ▶ Available in GaAs power-doubled output
- ▶ Utilizes external Class II, 120 to 26 VAC, 60 Hz UL power transformer
- ▶ Additional DC powering ports (+24 VDC) provided for applications requiring alternate or backup power
- ▶ UL transformer & +24 VDC powering

### QFON 350 MHz Version

- ▶ 5-350 MHz version available in push-pull silicon technology
- ▶ Offers RF output levels suitable for a limited number of devices typically used for reverse path signals
- ▶ Unit uses a 20 dB variable output level control
- ▶ Equalization or slope not provided

### QFON 870 MHz Version

- ▶ 54-870 MHz version available in silicon push-pull, silicon power-doubled, or GaAs power-doubled RF output technology
- ▶ Offers RF output levels up to 48 dBmV
- ▶ A lower gain 24 dBmV output version is available for driving limited number of distribution ports
- ▶ All units have variable gain & slope output RF controls



## QFON Fiber Nodes:

### QFON Specifications

SPECIFICATIONS	5 to 350 MHz		54 to 870 MHz	
	FREQUENCY RESPONSE	+/- 0.5 dB		+/- 0.5 dB
CHANNEL LOADING	22		77	
GAIN CONTROL RANGE	20 dB		10 dB	
SLOPE CONTROL RANGE	n/a		10 dB	
RF GAIN	n/a		n/a	
TECHNOLOGY	Si PP	Si PP	Si PD	GP
RF OUTPUT LEVELS <sup>(1)</sup>	26	24	40	48
OPTICAL INPUT LEVEL RANGE	-4 to +3 dBm			
COMP. TR. BT. (-dB)	115	94	72	82
COMP. 2nd ORD. (-dB)	91	84	70	77
CARRIER-TO-NOISE RATIO	53 dB	53 dB	53 dB	53 dB
RETURN LOSS (Worst Case)	14 dB	14 dB	14 dB	14 dB
DC AMPERES @ 24 VDC	.22	.22	.66	.66
POWER DISSIPATION (Watts) <sup>(2)</sup>	9	9	27	27

**NOTES:**  
 All node specifications are based on 1 mW (0 dBm) optical power input with 3.7% OMI per channel.  
 (1) Output levels of 48 are recommended to use a 9 dB sloped output referenced from 54 MHz to 870 MHz.  
 (2) Power dissipation is measured at 120 VAC.

### Ordering Information

**Example Part Number: QFON870 A - 48 GP 1W**  
 1 2 3 4 5

1: Bandwidth: 870 = 870 MHz  
 350 = 350 MHz

2: A = SCAPC (Green)  
 F = SCUPC (Blue)  
 Other Connectors Available

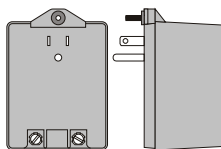
3: Gain (See Specifications Table)

4: Output Technology: PP = Push-Pull  
 P = Power-Doubled  
 Q = Quadra-Power  
 GP = GaAs-Doubled

5: One-way (1W) only for the QFON

Part Number	Description
<b>Options &amp; Spares</b>	
#951	120 Volts to 26 Volts, 60 Hz AC Power Transformer, 50 VA Rating

#951 Transformer



**Shipping Weight** 7 lbs (3.18 kg)  
**Dimensions** 3.5"H x 19.0"W x 3.4"D (8.89H x 48.26W x 8.64D cm)

Specifications subject to change without notice.

