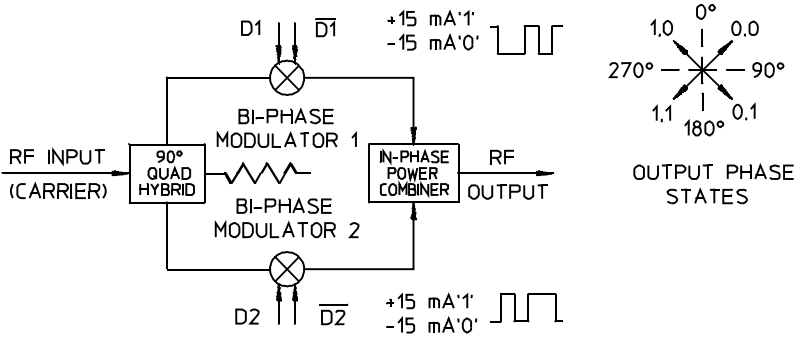


JPF-21F Series QUADRAPHASE MODULATORS

Units to 3 GHz / High Data Bandwidth / Differential ECL/TTL Compatible Drive / Hi-Rel Package



PRINCIPAL SPECIFICATIONS

Model Number	Center Frequency, f_0 , MHz	RF Input Bandwidth	Amplitude Balance at, dB, Max.	Phase Balance at Center, f_0		Phase Balance at 10% Band Limits		Insertion Loss, dB, Max.
				Typ.	Max.	Typ.	Max.	
JPF-21F-***B	1200 - 2500	10% of f_0	1.0	$\pm 2^\circ$	$\pm 5^\circ$	$\pm 2^\circ$	$\pm 5^\circ$	10

For complete Model Number replace *** with desired Center Frequency, f_0 in MHz.

General Notes:

- Units in the JPF-21F series of Quadrature Modulators are composed of two biphasic modulators, a 90° quadrature hybrid and an in-phase power combiner.
- These devices are generally used in systems to generate QPSK coded signals. The units accept two differential data inputs each of which independently biphasic modulates an RF carrier. These are then combined to produce a quadrature output of 0, 90, 180 and 270 degrees. Differential drive allows easy interface with ECL/TTL drivers.
- Units in the JPF-21F series are available from stock with a 1500 and 2500 MHz center frequency and from 1500 to 3000 MHz for special orders.
- Merrimac Quadrature Modulators comply with the relevant sections of MIL-M-28837 and may be supplied screened for compliance with additional specifications for military and space applications requiring the highest reliability.

GENERAL SPECIFICATIONS

Impedance:	50 Ω nom.
VSWR:	1.5:1 max.
RF Input Level:	0 dBm nom
Data Bandwidth:	>100 MHz nom.
Data Signal Levels:	Logic 1: +15 mA nom. Logic 0: -15 mA nom.
Weight, nominal:	0.35 oz (10 g)
Operating Temperature:	-55° to +85°C

F-Size Flatpack

