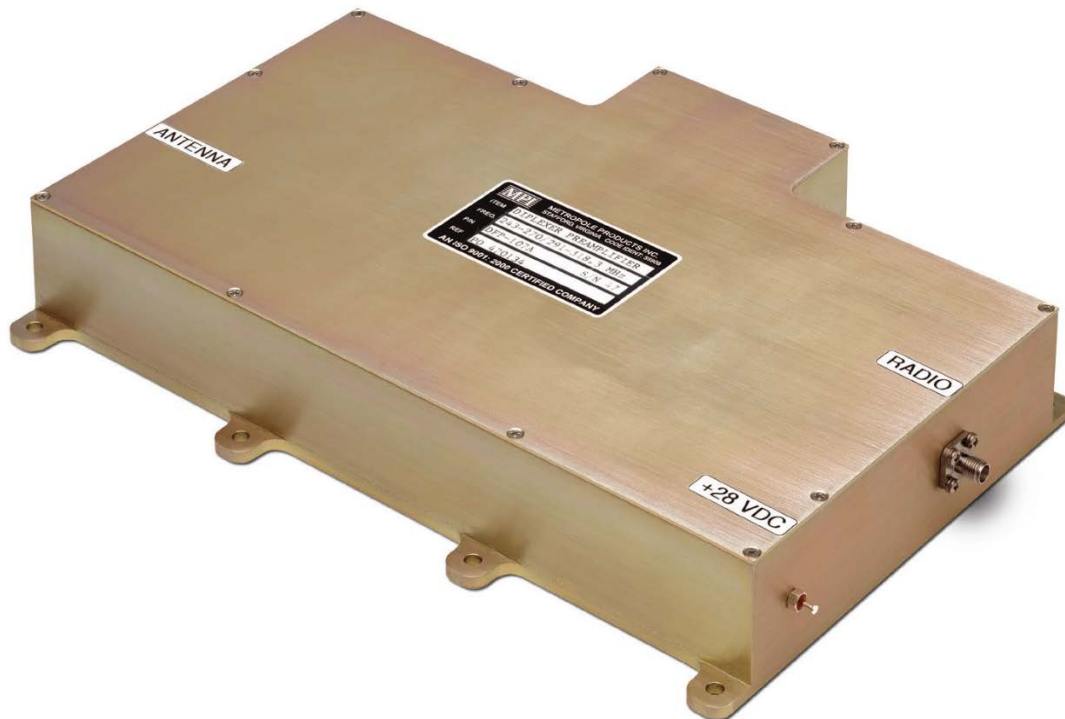




DFP-107A

UHF SATCOM Diplexer/LNA

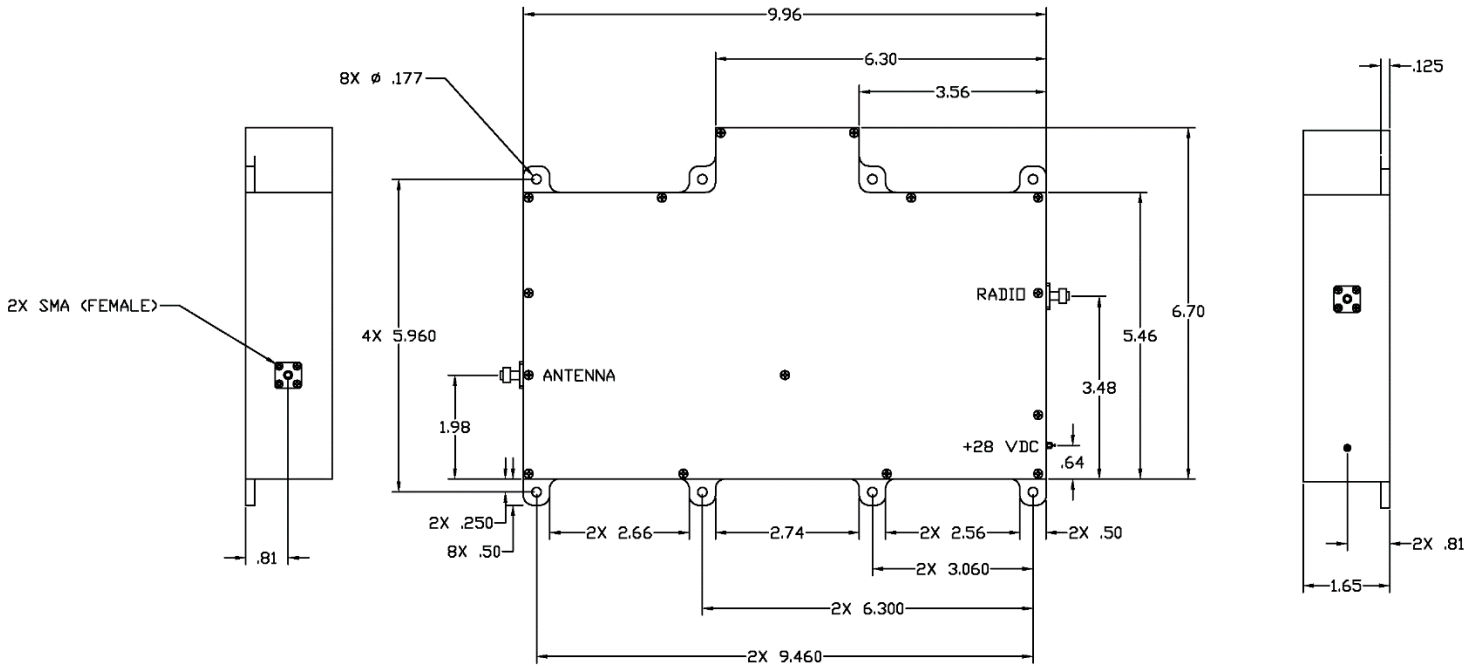


DESCRIPTION

A high performance UHF SATCOM (DAMA) Antenna Diplexer/LNA. Receive channel isolation sufficient for full duplex operation, with 2.5 dB max. noise figure.

FEATURES

High level (20 dB nominal) protection of the ancillary transmitter from other co-site UHF SATCOM transmitter signals, providing < 1.3 dB forward loss.



ELECTRICAL SPECIFICATIONS

RECEIVE CHANNEL

Bandwidth @ -1.5 dB max	243-270 MHz
VSWR, ANT, 243-270 MHz	1.5:1 max.
Rejection	
0-225 MHz	90 dB min.
285-340 MHz	50 dB min.
340-370 MHz	65 dB min.
370-1000 MHz	80 dB min.
Gain, 243-270 MHz	30 dB min.
Noise Figure	2.5 dB max.
Input @ 1 dB gain compression	-18 dBm min.
Input signal protection (243-270 MHz)	1 W max.
Intercept point, third order	+23 dBm nom.
Reverse Isolation 0-270 MHz	50 dB min.
Preamp Current (24-32 VDC)	0.1A max.

TRANSMIT CHANNEL

Passband	
291-294 MHz	1.3 dB max.
294-315 MHz	1.0 dB max.
315-318.3 MHz	1.1 dB max.
Rejection	
0-230 MHz	80 dB min.
243-265 MHz	55 dB min.
265-270 MHz	50 dB min.
375-400 MHz	50 dB min.
410-1000 MHz	80 dB min.
VSWR, 291-318.3 MHz	1.4:1 max.
Reverse Isolation, 291-318.3 MHz	16 dB min., 20 dB nom.
Reverse VSWR, 291-318.3 MHz	1.5:1 max.

Measurement Tolerance:

LOSS	0-1.5 dB, ±.05 dB
	1.6 dB to 40 dB, ±0.1 dB
	Above 40 dB, ± 2.0 dB

GENERAL CHARACTERISTICS

Size, excluding connectors	9.96" x 7.20" x 1.65"
Weight	5.4 lbs. max.
Connectors	
RF Antenna and Radio	SMA (Female)
Power IN (+28VDC)	Solder Terminal

REV: 8/25/17