42-36C-05 Series Receive Multicouplers



DS030326-1 6/17/2024

TX RX Systems Receive Multicouplers are a key component in an efficient received-signal distribution system. The Receive Multicouplers amplify signals and then split them to the requisite number of output ports. The design has been optimized to handle strong signals without overloading, while maintaining a good noise figure.



Product Features

- Quadrature coupled low noise amplifier that provides multiple levels of redundancy to ensure continuous operation
- A test port is located on the front panel for easy access to allow for non-intrusive testing and benchmarking
- Expandable from 8 to 16 ports. Contact TX RX Systems for custom configurations beyond 16 ports
- Amplifier current fault monitoring is provided and is annunciated through a form-C output alarm contact that can be integrated into an external alarm system
- Gain is easily adjustable in increments of 1dB through an electronic attenuator
- Additional filtering can be provided externally by connecting to the preselector input and output ports that are provided
- Complies with R56 grounding requirements

Model Numbers	42-36C-05-08B	42-36C-05-08B-48
# of Ports	8	8
System Gain (MAX)*	15 dB	15dB
Power Requirements	85-264 VAC	-48 VDC
Receive Connectors	BNC	BNC
Dimensions	1RU x 19" x 9.5"	1RU x 19" x 9.5"

^{*}Electronic Attenuator (0 \sim 15 dB range) in each unit can be used to reduce system gain for optimal performance.

Specifications			
Frequency Range	135-175 MHz		
System Gain	See Model Matrix		
Amplifier Type	Quadrature Coupled		
Amplifier Noise Figure	< 1.5 dB		
Amplifier OIP3	>+40dBm		
Number of Output Ports	See Model Matrix		
RF Port Return Loss	> 14 dB		
Test Port Coupling	-30dB		
Antenna Connector	N-female		
Receiver Connector	See Model Matrix		
Test Port Connector	BNC-female		
Rx-Rx Port Isolation (Min)	>20 dB		
Total Power Dissipation	5 Watts		
Attenuator Setting	15 dB in 1 dB steps		
Alarm Contacts	Form-C Contacts		
Power Requirements	See Model Matrix		
Operating Temperature	0°-50°C		
Enclosure	Standard EIA 19" Rack		
Dimensions (HWD)	See Model Matrix		
Net Weight	6.4 lbs		

Expansion Kits

Model Numbers	Description	Receive Connectors	
75-05-05	8 to 16 Port Expansion Kit, BNC	BNC	

TX RX Systems, 8625 Industrial Pkwy, Angola, NY. 14006 Ph: 716.549.4700; Web: www.txrx.com; Email: sales@txrx.com