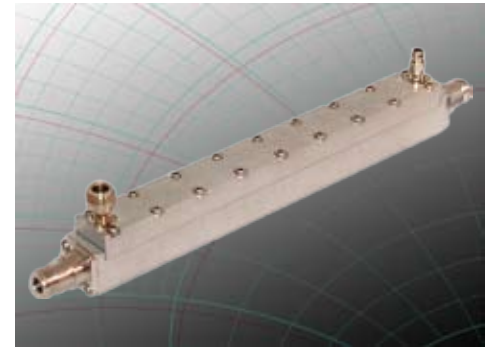




# Single Directional Couplers

C1-A58, 27dB Single Directional Coupler PIM optimized  
Five (5) section, single directional airline (slabline) coupler.

Model	C1-A58	
Frequency range	400 - 2900 MHz	
Coupling Accuracy	27 ± 1.0 dB	
Coupling Flatness (20 MHz)	± 0.05 dB	
Directivity	TYP	MIN
	30 dB	20 dB
Insertion Loss	TYP	MAX
	0.12 dB	0.20 dB
VSWR and (Return Loss) Input and Output Coupled Port	TYP	MAX
	1.07 (30 dB) 1.15 (23 dB)	1.12 (25 dB) 1.3 (17.7 dB)
Impedance	50 Ω	
Intermodulation IM3 (2 x 43 dBm carrier)	160 dBc	
Max. Power	500 W Avg, 5 KW Peak	
Termination Max. Power	3 W Avg	
Connectors	TYPE N Main Line, female TYPE N(f) Coupled Port	
Material:		
Housing	Aluminum, Conversion Coating	
Inner Conductor & Connectors	Brass, Silver Plated	
DC continuity		
Input ↔ Output	RF and DC	
Input ↔ Coupled Port	RF only	
Weight approx	1.2 kg (2.64 lb)	



The Model C1-A58 single directional coupler covers applications in the 400-2900MHz frequency range with high power, low insertion loss, very high directivity, and excellent PIM performance that is inherent with airline design and construction over the full 400-2900MHz frequency. The unit is designed for maximum coupling flatness over the 400-2900MHz range. This five (5) section design single directional coupler is supplied with one termination on the coupled port. The unit is supplied with Type N connectors on the mainline and Type N on the coupled ports. The design may easily be modified to 7-16 DIN type connectors and other coupling values can be provided.

**Made in USA.**

- 500 W average power
- Low VSWR and Loss
- High reliability, Low PIM
- ROHS Compliant

