



FDPL4020AQ4-1C

ShareLite™ PCS / AWS, WCS, BRS Diplexer, All DC Pass, Quad configuration, Side by Side, 4.3-10 Connectors

The FDPL Series of ShareLite diplexers are the smallest, most compact packaging of diplexers with the best performance available. This diplexer is ideal for use in small cell applications. Dual and quad configurations in stacked/clamshell or side by side are available with all the same robust performance.

These diplexers enable feeder sharing between systems in the PCS and AWS (AWS-1, AWS-3, and upper AWS-4), WCS, BRS, EBS and LTE2.6 frequency bands. The RFS innovative cavity filter design has a very low insertion loss while keeping the product extremely compact and lightweight. The usage of highly selective filters guarantees a high isolation level of 40dB between ports, ensuring an interference-free environment for any technology deployed. The filter design has built-in lightning protection for additional reliability. Able to withstand the most severe outdoor environments, it features an IP67 class protection with a vented enclosure to avoid any possible effects of condensation and pressure instability delivering a long lasting, extremely reliable solution for any network.



FEATURES / BENEFITS

- Designed for use with all USA mid band frequencies: PCS, AWS-1, -3, -4(U), WCS, BRS, and EBS
- Quad unit for 4X4 MIMO use
- Low insertion loss - maximizes performance
- High level of rejection between bands - Protects against interferences
- Compact design - Eases installation and reduces tower loading
- In-line connector placement - flexible installation positioning
- 4.3-10 connectors - Reduce tower loading with connectors that are 40% smaller and lighter than 7/16 DIN connectors
- IP67 Class protection - exceptional reliability and environmental protection
- All DC Pass

Technical features

GENERAL SPECIFICATIONS

Product Type		Diplexer/Cross Band Combiner
Application		PCS, AWS-1, AWS-3, AWS-4(U), WCS, BRS, EBS, LTE2.6
Configuration		ShareLite Dual diplexer, side by side, outdoor/indoor, No DC Pass (DC Ground)

ELECTRICAL SPECIFICATIONS

Branch		1, 2	
Frequency Range	MHz	1850-1915 1930-1995	1695-1780 2110-2700
Impedance	Ohms	50, 50	
Frequency Band		PCS, AWS, WCS, BRS, EBS, LTE2.6	
DC Pass		No, No	
Insertion Loss	dB	.25 typ., .20 typ.	
Return Loss	dB	22 (20 Min), 20 (18 Min)	
Power Handling Continuous, Max.	W	200, 200	
Rejection between bands	dB	40, 40	
3rd Order PIM	dBm (dBc)	-118 (-161) @ 2x43 max., -118 (-161) @ 2x43 max.	



PRODUCT DATASHEET
FDPL4020AQ4-1C

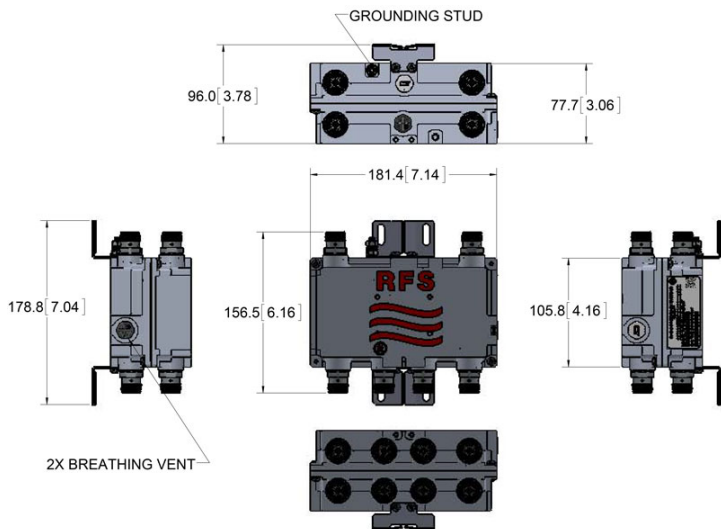
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TESTING AND ENVIRONMENTAL

Temperature Range	°C (°F)	-40 to 65 (-40 to 149)
Ingress Protection		IP 67
Environmental		ETSI 300-019-2-4 Class 4.1E
Lightning Protection		IEC61000-4-5 Level 4 / 5kA, 8/20us

MECHANICAL SPECIFICATIONS

RF Connectors		4.3-10 Female; 8 ports in, 4 ports out
Shipping Weight	kg (lb)	2.7 (6)
Dimensions, H x W x D	mm (in)	181 x 106 x 78 (7.1 x 4.2 x 3.1)
Shipping Dimensions, H x W x D	mm (in)	181 x 106 x 78 (7.1 x 4.2 x 3.1)
Volume	L	1.49
Mounting		Wall Mounting: With 4 screws (maximum 6mm diameter) Pole Mounting: With included clamp set 40-110mm (1.57-4.33)
Housing		Aluminum



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