

4-Cavity Duplexer for the 450 MHz Band

DESCRIPTION

- The DPF 70/4... is a 4-cavity duplex filter for duplex radiotelephones.
- The DPF 70/4... can be adjusted within the complete 406 - 470 MHz band. The duplexer can be delivered in four different versions according to required duplex spacing. See also "Ordering information" below.
- The DPF 70/4... is primarily intended for equipment, where the Tx and Rx operate on single frequencies, but it can also, however with slightly reduced data, be used where the Tx and Rx operate on several channels, i.e. within a certain port bandwidth. In the last case, factory tuning is recommended.
- The filter uses full-length ¼ cavities in a compact, extruded aluminium housing. The chassis is made of passivated steel, and teflon insulation has been applied in the coaxial cables and in the connectors.
- The filter is black vinyl coated to prevent corrosion.



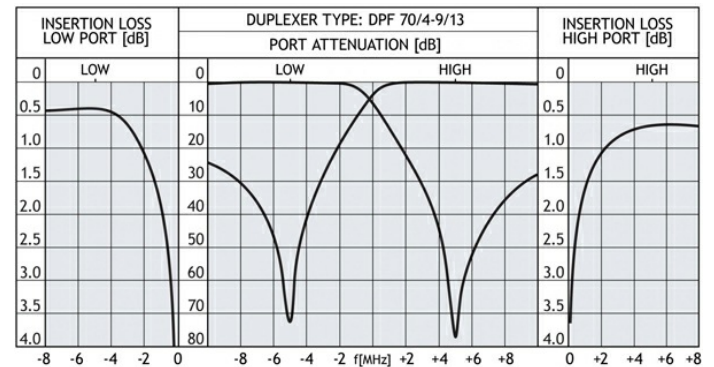
SPECIFICATIONS

Electrical		
Model	DPF 70/4...	
Frequency	406 - 470 MHz	
Max. Input Power	50 W	
Special spec. info	Single-channel tuned:	Multi-channel tuned, BW = 2 MHz:
Insertion Loss Tx-Ant and Ant-Rx	< 1.0 dB (typ. 0.8 dB)	< 1.2 dB (typ. 1.0 dB)
Tx Noise Suppression on Rx Frequency	> 65 dB	> 45 dB
Isolation Rx on Frequency Tx	> 65 dB	> 45 dB
Impedance	50 Ω	
VSWR	< 1.5:1	
Mechanical		
Connection(s)	BNC(f)	
Dimensions	226 x 104 x 33 mm / 8.9 x 4.1 x 1.3 in.	
Weight	Approx. 0.69 kg / 1.52 lb.	
Environmental		
Operating temperature range	-30 °C to +60 °C	
Frequency Stability	Approx. 4.5 ppm / °C	

ORDERING

Model	Product No.	Frequency
DPF 70/4 - 5/7	200000299	5 - 7 MHz
DPF 70/4 - 7/9	200000303	7 - 9 MHz
DPF 70/4 - 9/13	200000306	9 - 13 MHz
DPF 70/4 - 13/16	200000293	13 - 16 MHz

TYPICAL RESPONSE CURVE



PLEASE NOTE

Special configurations of this filter type may be quoted on request. For instance, the filter can be delivered with other connector types, or with flying leads (RG 316 coaxial cable) terminated with connectors or for soldering-connection.

ORDERING INFORMATION

When ordering, please use the table above to select the appropriate ordering designation for the desired filter type. If duplex Tx and Rx frequencies are stated when ordering, the duplexers are delivered factory adjusted. If Tx and Rx frequencies are not stated, the filters are delivered non-adjusted.