

# 6-Resonator Mini-Duplexer for the 160 MHz band

# DESCRIPTION

- The MPX 2/6 is a 6-resonator miniaturized duplex filter for duplex transceivers. This compact "miniplexer" meets the demand for a modern space saving, high performance filter type.
- Model MPX 2/6 L can be tuned within the band 138-156 MHz and model MPX 2/6 H within the band 152 - 175 MHz, both with duplex spacing between 4 and 15 MHz.
- The MPX 2/6 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 miniaturization of the filter has been realized by using special high-Q, temperature compensated helical resonators with discrete-component interconnections.
- The housing is made of extruded aluminium, and the connectors are provided with teflon insulation.
- > The filter is coated with black vinyl to prevent corrosion.



### SPECIFICATIONS

Electrical			
Model	MPX 2/6		
Frequency	MPX 2/6 L : 138 - 156 MHz MPX 2/6 H : 152 - 175 MHz		
Max. Input Power	50 W		
Special spec. info	Single-channel tuned :	Multi-channel tuned, BW = 1.5 MHz :	
Insertion Loss	< 1.5 dB	< 1.5 dB	
Isolation Rx on Frequency Tx	> 90 dB	> 60 dB	
Impedance	50 Ω		
Duplex Spacing	4 - 15 MHz (see table)		
Tx Noise Suppression on Rx-Freq. / Rx Isolation on Tx- Freq.	> 90 dB	> 60 dB	
VSWR	< 1.4:1		

Connection(s)	N(f) (BNC(f), TNC(f) on request)
Dimensions	118.5 x 154 x 33 mm / 4.65 x 6.06 x 1.30 in.
Weight	Approx. 0.66 kg / 1.46 lb.

Environmental	
Operating temperature range	-30 °C to +60 °C

ORDERING

Model	Product No.	Description	Frequency
MPX 2/6 L-4/6-N(f)	200001669	Spacing: 4 - 6 MHz	138 - 156 MHz
MPX 2/6 L-6/15-N(f)	200001632	Spacing: 6 - 15 MHz	138 - 156 MHz
MPX 2/6 H-4/6-N(f)	200001619	Spacing: 4 - 6 MHz	152 - 175 MHz
MPX 2/6 H-6/15-N(f)	200001733	Spacing: 6 - 15 MHz	152 - 175 MHz
MPX 2/6 L-4/6-BNC(f)	200001607	Spacing: 4 - 6 MHz	138 - 156 MHz
MPX 2/6 L-6/15-BNC(f)	200001637	Spacing: 6 - 15 MHz	138 - 156 MHz
MPX 2/6 H-4/6-BNC(f)	200001608	Spacing: 4 - 6 MHz	152 - 175 MHz
MPX 2/6 H-6/15-BNC(f)	200001614	Spacing: 6 - 15 MHz	152 - 175 MHz
Accessories			
Mounting Kit for HYTERA RD 625	200002515		
19" MPX Mounting Kit	210002291		



## TYPICAL RESPONSE CURVE @ 5 MHZ DUPLEX SPACING



### MOUNTING DETAILS



All dimensions are given in mm.

#### 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.

