

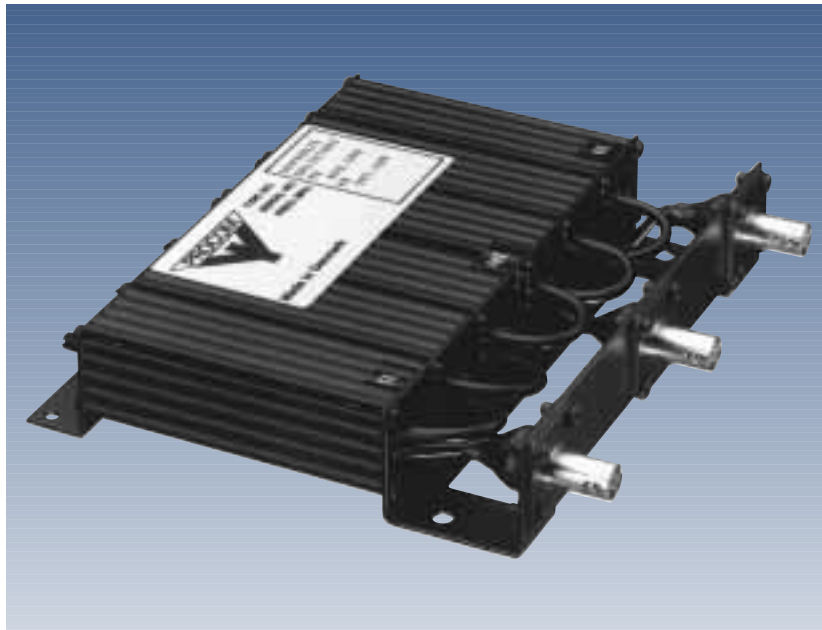
# DPF 900/6

## 6-Cavity Duplexer for the 900 MHz Band



### DESCRIPTION:

- ★ The DPF 900/6 is a 6-cavity duplex filter for duplex radiotelephones operating in the 900 MHz band.
- ★ The DPF 900/6 can be tuned within the 820-960 MHz band with a nominal duplex separation of 45 MHz. The duplexer can, however, be especially delivered to work with duplex separations down to 10 MHz.
- ★ The DPF 900/6 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 filter uses full-length  $1/4 \lambda$  cavities in a compact, extruded aluminium housing. The chassis is made of passivated steel, and teflon insulation has been applied in the rigid coaxial cables and in the connectors.
- ★ The filter is black vinyl coated to prevent corrosion.



### SPECIFICATIONS:

| ELECTRICAL  |                        |
|---|------------------------|
| TX/RX FREQUENCY   | 820-960 MHz            |
| MAX. INPUT POWER  | 50 watt                |
| INSERTION LOSS<br>TX-ANT AND ANT-RX<br>(at 45 MHz duplex spacing) |                        |
| Single-channel tuned  | ≤ 1.0 dB (typ. 0.8 dB) |
| Multi-channel tuned, 5 MHz BW                                     | ≤ 1.0 dB (typ. 0.8 dB) |
| TX NOISE SUPPRESSION<br>ON RX-FREQUENCY                           |                        |
| Single-channel tuned  | > 85 dB                |
| Multi-channel tuned, 5 MHz BW                                     | > 65 dB                |
| RX ISOLATION ON<br>TX-FREQUENCY                                   |                        |
| Single-channel tuned  | > 85 dB                |
| Multi-channel tuned, 5 MHz BW                                     | > 65 dB                |
| DUPLEX SPACING  | 45 MHz (norm.)         |
| IMPEDANCE   | Nom. 50 Ω              |
| SWR   | ≤ 1.5                  |
| MECHANICAL  |                        |
| TEMP. RANGE   | -30° C i +60° C        |
| FREQ. STABILITY   | Approx. 4.5 ppm/° C    |
| CONNECTORS  | BNC-female             |
| DIMENSIONS (L x W x H)  | 158 x 154 x 33 mm      |
| WEIGHT  | Approx. 850 g          |

TYPICAL RESPONSE CURVES @ 45 MHz DUPLEX SPACING:

