

BPF9001F1V1-1

BANDPASS FILTER, GSMR900

This GSM-R filter is a two port unit with the ability to simultaneously pass both uplink and downlink GSM-R signals

FEATURES

- Designed for GSM-R cab radio use
- Suitable for indoor applications
- Narrow guard band to EGSM downlink signals



TECHNICAL SPECIFICATIONS

BAND NAME	DOWNLINK (TX)	UPLINK (RX)
Passband	918 - 924.9MHz	873 - 880MHz
Bandwidth	6.9MHz	7MHz
Insertion loss	918-924.8MHz- 2dB maximum, 1dB typical 924.8-924.9MHz- 3dB maximum, 2.5dB typical	2.0dB maximum, 1dB typical
Return loss	918-924.8MHz- 15dB minimum 924.8-924.9MHz- 12dB minimum	15dB minimum
Maximum input power	10W unterminated	10W

REJECTION CHARACTERISTIC (PORT 1 TO PORT 2)

925.4 - 926MHz	15dB minimum
926 - 960MHz	30dB minimum

ELECTRICAL

Impedance	50ohms
Intermodulation products	< -150dBc (in uplink band, 2x 5 W carriers)

ENVIRONMENTAL

For further details of environmental compliance, please contact Kaelus.

Temperature range	-25°C to +70°C -13°F to +158°F, EN 50155, 4.1.2, T3
Ingress protection	IP54
Altitude	1,400m 4,600ft, EN 50125.1 sub clause 2, Class AX.
MTBF	>1,000,000 hours
Compliance	EN 50155 4.1.3 shock and vibration EN 50155 4.1.4 relative humidity EN 50121-3-2 EMC rolling stock EN 45545 Fire Protection on Railway Vehicles ETSI 300-019-2-1 Storage and Transport Environmental RoHS

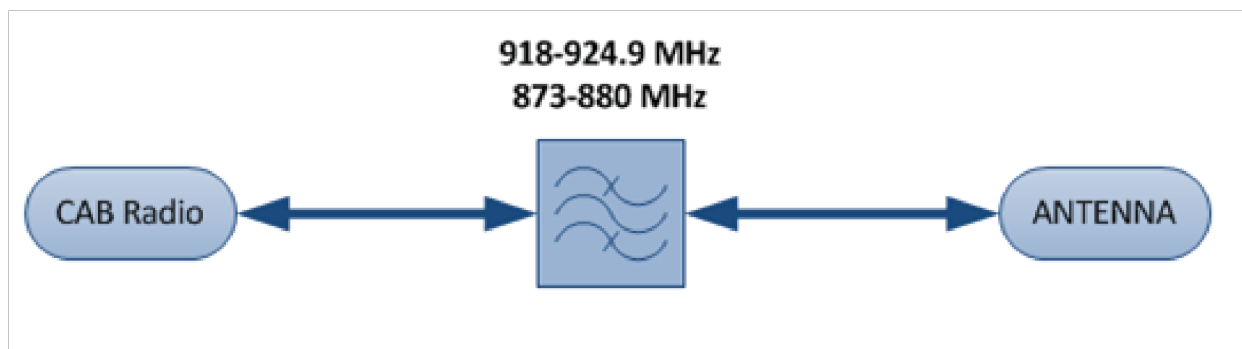
MECHANICAL

Dimensions H x D x W	298 x 200 x 91mm 11.73 x 7.87 x 3.58in (excluding brackets)
Weight	5.0kg 11.02lbs maximum (excludes brackets)
Connectors	N-type (F) x 2
Mounting	Customer specific, includes grounding post

ORDERING INFORMATION

PART NUMBER	DESCRIPTION
BPF9001F1V1-1	GSMR900 Band pass filter
DCI9002F1V1-1	DC Injector
SWT9002F1V1-1	Switch assembly for BPF9001F1V1-1
GSR0002F1V1-1	System including BPF9001F1V1-1and SWT9002F1V1-1

ELECTRICAL BLOCK DIAGRAM



MECHANICAL BLOCK DIAGRAM

