UHF Bandpass filter, convection / liquid cooled

8.7 / 15 kW rms, 8 Pole, Standard

PRODUCT FEATURES

- Convection & Liquid cooled versions
- Retunable
- Compacte design
- Low insertion loss
- Temperature compensated

DIMENSIONS AND WEIGHT

DIMENSIONS

STANDARD FRAME

OPTIONAL FRAME

L x W x H

WEIGHT

COLOUR

193

391 МΑХ

SPECIFICATIONS	270 mm Series				
	Convection cooled	Liquid cooled			
FREQUENCY	470 - 700 MHz				
BANDWIDTH	6 - 8 MHz				
STANDARD ORDER	8 Poles with single cross coupling				
OPTIONAL ORDER	8 Poles with double cross coupling or without				
ATV	Spurious supress				
DVB	Critical mask				
ATSC	Stringent mask				
ISDB	Critical mask				
IMPEDANCE	50 Ohm				
VSWR	>26 dB (<1.11)				
TEMPERATURE STABILITY	< 2 kHz / °C				
MAX PRODUCT TEMPERATURE	70 °C				
ENVIROMENTAL CONDITION	-5 to 70 °C IP40				
STANDARD CONNECTION	3 1/8″ unflange				
OPTIONAL CONNECTIONS	4 1/2" unflange, NAX120 unflange				
COOLING LIQUID CONNECTION	-	Ø10 mm (other upon request)			
LIQUID FLOW	-	10 l/min (2.5 gal liq./min) Cooling capacity >900W			
COOLING LIQUID TEMPERATURE	-	<=50°C (<=122°F)			

1160 x 561 x 250-391 mm

(45.7 x 22.1 x 9.8-15.4 in)

1113

61 kg (134 lb)

Custom frame

Frosted black

198 -

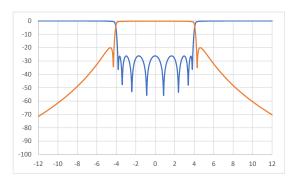
6

275

561

Stand alone





ARTICLE: BPF48C27C-1P33

BPF	=	Filter type
4	=	Frequency band
8	=	Number of poles
С	=	Cavity based
27	=	Cavity size
С	=	Version
1	=	Number of cross coupling
0 = wit	hout	1 = single, 2 = double
Ρ	=	Coating and cooling
V = bla	ackp	ainted, liquid cooled
P = blo	ackp	ainted, convection cooled
3 3= 3 1		Input connection unflange, 4 = 4 1/2" unflange,
2 = N/	AX 12	0 unflange
3	=	Output connection
31/8	″ unf	ange $4 = 4 \frac{1}{2}''$ unflange

2 = NAX 120 unflange

TYPICAL DATA*	8 MHz DVB-T2		6 MHz ISDB-T		6 MHz ATSC					
ARTICLE NO	BPF48C27C-1Pxx		BPF48C27C-1Pxx		BPF48C27C-1Pxx					
INSERTION LOSS		470 MHz	700 MHz		470 MHz	700 MHz	Ì	470 MHz	700 MHz	
Avg. signal bandwidth		<0.31 dB	<0.40 dB		<0.40 dB	<0.51 dB		<0.30 dB	<0.39 dB	
Centre frequency		<0.24 dB	<0.30 dB		<0.32 dB	<0.40 dB		<0.28 dB	<0.35 dB	
Signal band edge	± 3.88 MHz	<0.75 dB	<0.95 dB	± 2.79 MHz	<0.59 dB	<0.76 dB	\pm 2.69 MHz	<0.13 dB	<0.16 dB	
Rejection Δ -f0	± 4.2 MHz	>14 dB typical >15.6 dB	>14 dB typical >15.8 dB	± 3.15 MHz	>15 dB typical >20 dB	>15 dB typical >20 dB	± 3.5 MHz	- typical >0.6 dB	- typical >0.7 dB	
Rejection Δ -f0	± 6.0 MHz	>26 dB typical >31 dB	<26 dB typical >31 dB	± 4.5 MHz	>31 dB typical >32 dB	>31 dB typical >32 dB	± 6.0 MHz	> 29 dB typical >42 dB	>29 dB typical >42 dB	
Rejection Δ -f0	± 12.0 MHz	>51 dB typical >69 dB	<51 dB typical >69 dB	± 9.0 MHz	>61 dB typical >70 dB	>61 dB typical >70 dB	± 9.0 MHz	>63 dB typical >64 dB	>63 dB typical >64 dB	
GROUP DELAY	<600 ns		<510 ns			<110 ns				
MAX INPUT POWER RATING,		15 kW	15 kW		15 kW	15 kW		15 kW	15 kW	
LIQUID COOLING**	@ 13 dB (crest factor)				@ 13 dB (crest factor)			@ 11 dB (crest factor)		
MAX INPUT POWER RATING,		11.0 kW	8.7 kW		8.6 kW	6.8 kW		11.2 kW	8.8 kW	
CONVECTION COOLING***	@ 13 dB (crest factor)			@ 13 dB (crest factor)			11 dB (crest factor)			
TEMERATURE RISE		<4.5 °C/ kW	<5.7 °C/ kW		<5.8 °C/ kW	<7.3 °C/ kW		<4.4 °C/ kW	<5.6 °C/ kW	
MASK COMPLIANT	Critical mask			Critical mask			Stringent mask			

* Data in table is typical/indicative data. To fulfil mask, transmitter shoulder level must be >36.2 dB. The filter can be tuned for other specifications or bandwidth. Please contact us for a designed specification. *** Max input power with above cooling liquid flow and temperature. Change in the liquid flow and temperature can also change the actual power rating. *** Max input power at <50 °C temp. rise and <20 °C ambient temperature. The unit must be positioned so that there are no obstructions to free air flow. Data are subjected to change without prior notice.

