

SPECIFICATION

COMMERCIALY AVAILABLE

ITEM: MONOLITHIC CRYSTAL FILTER
PART NUMBER: M21JAD

ISSUED / REVISION	ENGINEER APPROVED	DOCUMENT CHECKED	DRAFTSMAN
2/19/13 DS	03/01/2013 TFG	03/01/2013 TFG	03/01/2013 GL

FILTRONETICS Inc

1. Part Number: M21JAD

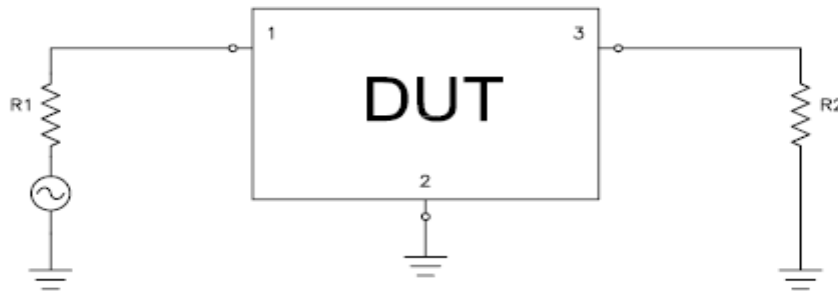
2. Electrical Specifications:

Center Frequency (Fo)		21.4MHz
3 dB Band Width:		±15KHz Min
Insertion Loss:		1.5dB Max
Pass Band Ripple:		1 dB Max (±10KHz BW)
Fo ±45KHz		15 dB Min
Ultimate Attenuation:	Fo ±45KHz	15dB Min
	Fo ±75KHz	20dB Min
	Fo ±300KHz to ±1MHz	35 dB Min
Spurious:		10 dB Typical, 8 dB Max
Impedance:		1500Ω//1.0pf (R/C) *
Operating Temperature:		-40°C to +85°C
Storage Temperature:		-40°C to 105°C
Poles:		2

*See Figure 1 & Figure 2

MATCHING CIRCUIT

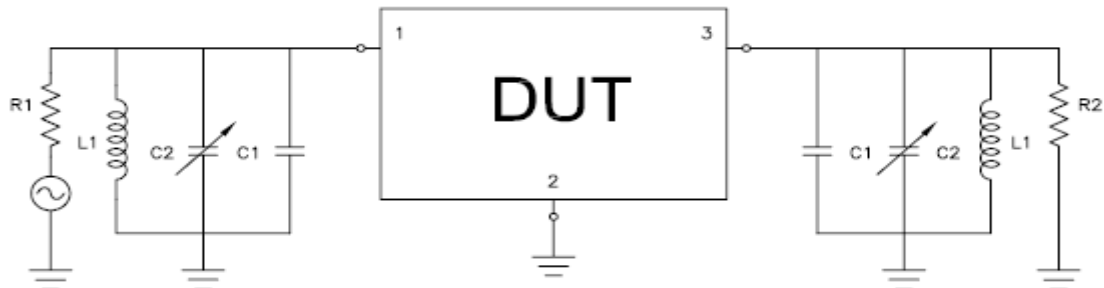
FIGURE 1



R1 & R2 = 1500 Ohms

NO EXTERNAL MATCHING REQUIRED
IF STRAY CAPACITANCE AT IN & OUT PORTS < 1 pF,
IF STRAY CAPACITANCE AT IN & OUT PORTS > 1 pF, SEE FIGURE 2.

FIGURE 2.



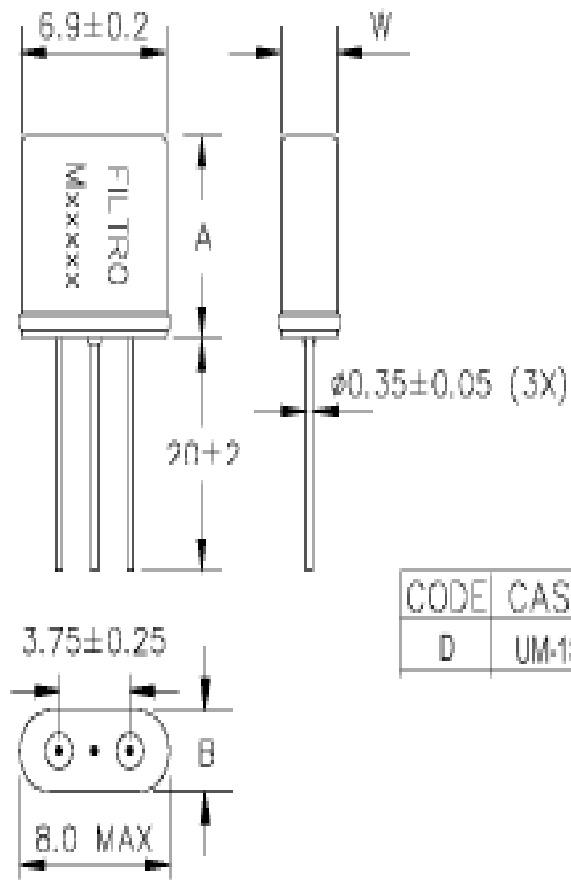
R1 & R2 = 1500 Ohms

SUGGESTED VALUES:
C1 = 10 pF
C2 = VARIABLE 6 pF
L1 = 3.9 µH

EXTERNAL MATCHING MAY BE REQUIRED
IF STRAY CAPACITANCE AT IN & OUT PORTS > 1 pF.

3. Mechanical Package Style: UM-D

Marking:
M21JAD



		DIMENSIONS (mm)		
CODE	CASE	A	B	W
D	UM-1S	8.0 MAX	2.5 ± 0.2	1.8 ± 0.2