AFCL 060 Small Signal Feed-Through Filters



Overview

Feed-through filter range using film capacitor technology to achieve good temperature stability. The units are housed in robust, sealed metal cases of threaded construction, and offer a range of terminal finishes.

- Capacitive values from 1,500 pF 47 nF
- Self healing capacitors
- · Wide choice of performance options
- · Superior pulse current capability
- · Excellent temperature stability
- · Wire or tag termination options

Applications

Specifically designed for military, industrial, telecoms and medical applications and especially suitable for use where fast rising transients are expected.



Technical Specifications

Parameters/ Characteristics	
125 - 150 VAC 100 - 630 VDC	
400 Hz	
10 A	
6 mΩ	
40°C	
-55°C to 125°C	
55/125/56	
160 - 1,000 VDC	

Typical Electrical Schematic





Technical Specifications cont.

Part Number	Rated Voltage (VDC/VAC)	C (pF)	Pulse Capability (V/µs)
AFCL060115NJ(1)1(2)	630/125	1,500	2,000
AFCL060150LJ(1)1(2)	350/125	5,000	1,200
AFCL060210JJ(1)1(2)	250/-	10,000	1,200
AFCL060227DJ(1)1(2)	100/-	27,000	1,200
AFCL060115NJ(1)2(2)	630/150	1,500	2,000
AFCL060130NJ(1)2(2)	630/150	3,000	2,000
AFCL060210LJ(1)2(2)	350/125	10,000	720
AFCL060227JJ(1)2(2)	250/-	27,000	720
AFCL060247DJ(1)2(2)	100/-	47,000	720

(1) Termination:

W = Wire T = Tag (2) Case finish:

T = Tin plated

S = Silver plated

G = Gold plated

Environmental Compliance

KEMET EMI filters are RoHS Compliant.

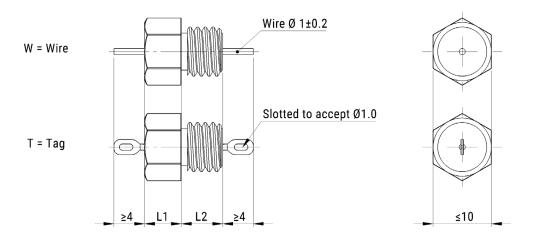


Typical Insertion Loss

Part Number	1 MHz (dB)	10 MHz (dB)	30 MHz (dB)	100 MHz (dB)	400 MHz (dB)
AFCL060115NJ-1-	-	8	18	27	43
AFCL060150LJ-1-	-	16	28	38	53
AFCL060210JJ-1-	-	20	30	40	58
AFCL060227DJ-1-	10	30	40	47	63
AFCL060115NJ-2-	-	8	18	27	43
AFCL060130NJ-2-	-	13	25	35	53
AFCL060210LJ-2-	-	20	30	40	58
AFCL060227JJ-2-	10	28	36	45	63
AFCL060247DJ-2-	16	37	47	51	68



Mechanical Dimensions - Millimeters



Part Number	Dimensions (mm)			
	L1 Maximum	L2 Maximum	Thread	
AFCL060115NJ-1-	6.1	8	5/16-24 UNF	
AFCL060150LJ-1-	6.1	8	5/16-24 UNF	
AFCL060210JJ-1-	6.1	8	5/16-24 UNF	
AFCL060227DJ-1-	6.1	8	5/16-24 UNF	
AFCL060115NJ-2-	6.1	12	5/16-24 UNF	
AFCL060130NJ-2-	6.1	12	5/16-24 UNF	
AFCL060210LJ-2-	6.1	12	5/16-24 UNF	
AFCL060227JJ-2-	6.1	12	5/16-24 UNF	
AFCL060247DJ-2-	6.1	12	5/16-24 UNF	



KEMET Electronics Corporation Sales Offices

For a complete list of our global sales offices, please visit www.kemet.com/sales.

Disclaimer

YAGEO Corporation and its affiliates do not recommend the use of commercial or automotive grade products for high reliability applications or manned space flight.

All product specifications, statements, information and data (collectively, the "Information") in this datasheet are subject to change. The customer is responsible for checking and verifying the extent to which the Information contained in this publication is applicable to an order at the time the order is placed. All Information given herein is believed to be accurate and reliable, but it is presented without guarantee, warranty, or responsibility of any kind, expressed or implied.

Statements of suitability for certain applications are based on KEMET Electronics Corporation's ("KEMET") knowledge of typical operating conditions for such applications, but are not intended to constitute – and KEMET specifically disclaims – any warranty concerning suitability for a specific customer application or use. The Information is intended for use only by customers who have the requisite experience and capability to determine the correct products for their application. Any technical advice inferred from this Information or otherwise provided by KEMET with reference to the use of KEMET's products is given gratis, and KEMET assumes no obligation or liability for the advice given or results obtained.

Although KEMET designs and manufactures its products to the most stringent quality and safety standards, given the current state of the art, isolated component failures may still occur. Accordingly, customer applications which require a high degree of reliability or safety should employ suitable designs or other safeguards (such as installation of protective circuitry or redundancies) in order to ensure that the failure of an electrical component does not result in a risk of personal injury or property damage.

Although all product-related warnings, cautions and notes must be observed, the customer should not assume that all safety measures are indicated or that other measures may not be required.