

# Small Signal Feed Through Filters **AFCC** 100, 160, 190 series

Small signal feed through capacitor filters enable a consistently high frequency performance to be combined with compact mechanical enclosures, significant current capability and terminations which suit use in many industrial applications such as Telecommunications, Medical equipment and DC power systems. Under AC use consideration must be given to the leakage current caused by the capacitance value in order to ensure compliance with equipment safety specifications.

The construction is designed so that multiple high frequency resonances are minimised and hence the performance is maintained over the operating frequency range. These products avoid this weakness so often demonstrated in many commercially available products. A wide range of performance is available in various voltage ratings while limiting the case sizes so that these components can be more easily integrated within customers' applications.

The dielectric construction of the capacitor elements means that they have high level voltage withstand capability and can cope with rapid transients.

These products are fully encapsulated in a flame retardant V0 to UL 94 polyurethane resin system.



## Mechanical Specifications

Manufacture: resin sealed metal containers.

Connections: wire or tag terminations.

## Electrical Specifications (AFPI 100 only)

Rated voltage ( $V_R$ ): see relevant product table

Rated current ( $I_R$ ): referred to room temperature = 40°C

Voltage test ( $2s.$ ): see relevant product table

Climatic category: see relevant product table

## Filter Range - AFCC100

(Example pt no. AFCC100215LKW2S)

Code	Max values		C (nF)	Voltage test	Dimensions (mm)					Dia d	Insertion loss graph	
	$I_R$ dc	$V_R$ dc/ac			A	B	C	D	T			
215LKW2S	15	350/-	15	25/085/21	1500Vdc	4.75	15	100	10	M6x0.5	1.2	Plot 2
220UKT8T	15	630/-	20	55/125/56	1000Vdc	4.75	12	30	10	M6x0.75	1.2	Plot 3
250UHW4T	5	630/-	50	55/125/56	1000Vac	4.75	14	30	10	M6x0.75	1.6	Plot 5
250UKT8T	15	630/-	50	55/125/56	1000Vac	4.75	12	27	10	M6x0.75	1.6	Plot 5
322JKW3S	15	250/-	220	55/125/56	400Vdc	4.75	14	30	10	M6x1	0.8	Plot 7
390SKW8T	15	150/-	900	25/085/56	300Vdc	7.95	10	26	10	M6x0.75	1.2	Plot 8
390SKW9T	15	150/-	900	25/085/56	300Vdc	4.75	10	26	10	M6x0.75	1.2	Plot 8
414SRW9S	20	150/-	1400	25/085/21	250Vdc	7.95	19	37	10	M6x0.5	1.2	Plot 9

## Filter Range - AFCC160

(Example pt no. AFCC100215LKW2S)

Code	Max values		C (nF)	Voltage test	Dimensions (mm)					Dia d	Insertion loss graph	
	$I_R$ dc	$V_R$ dc/ac			A	B	C	D	T			
125VMW2N	16	250/-	2.5	25/085/21	3950Vdc	16	24	120	16	M10x0.75	1	Plot 1
218VMW6N	16	250/-	18	25/085/21	2700Vdc	6	14	50	16	M10x0.75	1.2	Plot 2
222VMW1N	16	250/-	22	25/085/21	3750Vdc	16	38	135	16	M10x0.75	1	Plot 3
235VLLW3N	25	250/-	35	25/085/21	3750Vdc	16	34	135	16	M10x0.75	1.6	Plot 4
250MMW1N	16	250/-	50	25/085/21	3750Vdc	16	25	121	16	M10x0.75	1.2	Plot 5
510DMW1N	16	100/-	10000	25/085/21	250Vdc	16	25	121	16	M10x0.75	1.2	Plot 10

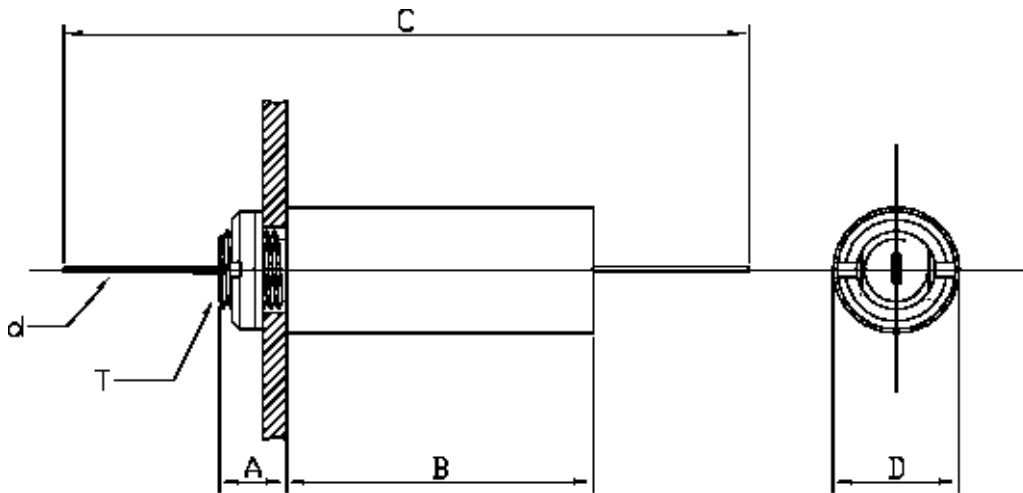
# Small Signal Feed Through Filters **AFCC** 100, 160, 190 series

## Filter Range - AFCC190

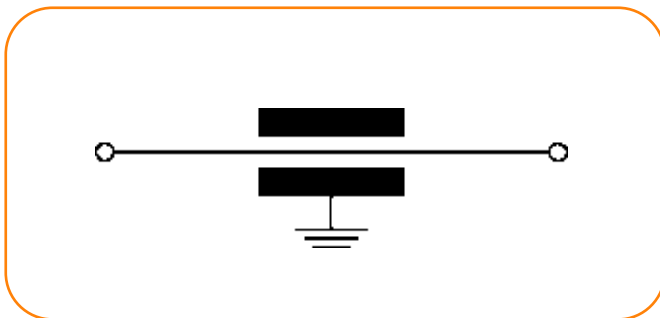
(Example pt no. AFCC190218W6W9N)

Code	Max values		C (nF)	Voltage test		Dimensions (mm)					Dia d	Insertion loss graph
	I <sub>r</sub> dc	V <sub>r</sub> dc/ac				A	B	C	D	T		
▲ 218W6W9N	63	-/130	18	25/085/21	1420Vdc	12	16	70	19	M12x0.75	M6	Plot 2
233VJW4S	10	-/250	33	25/085/21	2700Vdc	17	38	96	19	M12x0.75	1.2	Plot 4
310PKW4N	15	1000/-	100	25/085/21	2250Vdc	17	40	97	19	M12x0.75	1.2	Plot 6
322T3W9N	30	400/-	220	25/085/21	800Vdc	14	18	65	19	M16x1	M6	Plot 7

## Dimensions (mm) and connections



## Circuit diagram



Approvals



Where indicated

# Small Signal Feed Through Filters **AFCC** 100,160,190 series

## Typical Insertion Loss Characteristics

