

## HA SERIES HDTV FILTERS

## LOW COST, MINIATURE FILTERS

This range of low cost filters offers near SMPTE 274M performance in a miniature space saving package, suitable for single pass and HDTV monitor output applications.

- Near SMPTE 274M performance
- pin SIL package
- Ideal for analogue monitor outputs
- Aqueously washable
- Pre and Post Luminance and Chrominance filters
- Integer N° of clock delays between Luma and Chroma filters

Type Number	HA7425FP*	HA7425SP*	HA3712FP*	HA3712SP*
Impedance (ohms)	75	75	75	75
Filter Shape	Lowpass	Lowpass	Lowpass	Lowpass
Passband Shape	Flat	Sinx/x	Flat	Sinx/x
Sampling Frequency (S.F)	74.25 MHz	74.25 MHz	37.125 MHz	37.125 MHz
Insertion loss at 100 kHz	< 1.2 dB	< 5.5 dB	< 1.0  dB	< 5.0 dB
End of Passband	30.0 MHz	30.0 MHz	15.0 MHz	15.0 MHz
Amplitude ripple	< 0.2 dB	$< 0.2 dB^1$	< 0.25 dB	$< 0.25 \text{ dB}^2$
Insertion delay at 200 kHz	$53 \text{ ns} \pm 2 \text{ ns}$	$53 \text{ ns} \pm 2 \text{ ns}$	$107 \text{ ns} \pm 3 \text{ ns}$	$100 \text{ ns} \pm 3 \text{ ns}$
Group delay ripple Attenuation at $\frac{1}{2}$ S.F (wrt loss at 100 kHz)	<3 ns to 27.0 MHz > 12 dB	<3  ns to  27.0  MHz > 12 dB <sup>1</sup>	<14 ns to 14.5 MHz > 6 dB	<14  ns to  14.5  MHz > 6 dB <sup>2</sup>
Start of stopband	43.50 MHz	43.50 MHz	22.275 MHz	22.275 MHz
Stopband attenuation (wrt loss at end of passband)	> 40 dB	> 40 dB	> 40 dB	> 40 dB

	Part nur	nbering	HA	 	г ¬	г -	т	Package Drg No
Sampling Frequency	SF - 7425 SF - 3712		-					A - DR00005A D - DR00170A F - DR00069B G - DR00172A
Passband Shape	S - Sin/x F - Flat							Realisation P - Passive

Example part number HA7425SPA is a passive, luminance sinx/x corrected for a s.f. of 74.25 MHz packaged in a 11 pin SIL package as DR00005A.

Other sampling frequencies are available on request.

© Faraday Technology. As part of continual product improvement the specifications, details and dimensions shown in this publication are subject to change without notice

<sup>&</sup>lt;sup>1</sup> Measured against sinx/x roll off for a sampling frequency of 74.25 MHz

<sup>&</sup>lt;sup>2</sup> Measured against sinx/x roll off for a sampling frequency of 37.125 MHz

## PACKAGE DETAIL

