

CUSTOMER 客户.

规格书编号

**SPEC NO:** 

# 产品规格书 SPECIFICATION

PRODUCT 产品:	SAW FILTER					
MODEL NO 型 号:	HDF402A F11					
PREPARED 编 制:	CHECKED 审 核:					
APPROVED 批准:	<b>DATE</b> 日 期	用:2006-5-11				
客户确认 CUSTOMER RECEIVED:						
审核 CHECKED	批准 APPROVED	日期 DATE				

无锡市好达电子有限公司 Shoulder Electronics Limited



# 更改历史记录 History Record

更改日期 Date	规格书编号 Spec. No.	产品型号 Part No.	客户产品型号 Customer No.	更改内容描述 Modify Content	备注 Remark



### 1. SCOPE

**SAW FILTER** 

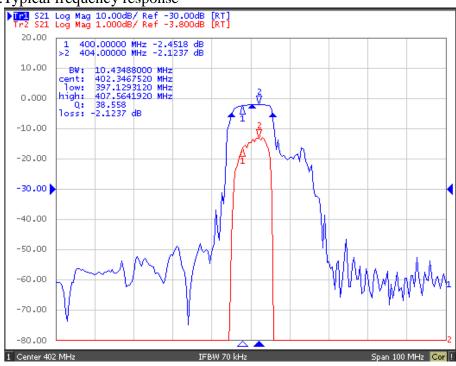
This specification shall cover the characteristics of SAW filter With F402A used for the page system.

#### 2. ELECTRICAL SPECIFICATION

DC Voltage VDC	10V		
AC Voltage Vpp	10V50Hz/60Hz		
Operation temperature	-40°C to +85°C		
Storage temperature	-45°C to +85°C		
RF Power Dissipation	0dBm		

#### **Electronic Characteristics**

#### 2-1. Typical frequency response

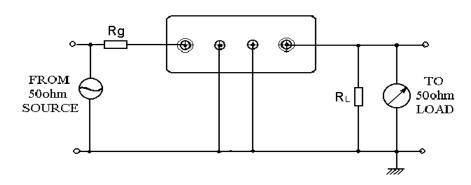


#### 2-2. Electrical characteristics

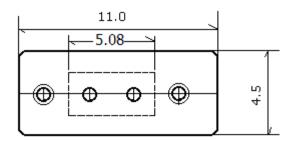
Part number	F402A	Unit
Nominal center frequency (Fo)	402	MHz
Insertion Loss		
1.fo-45.8~fo-39.8 MHz	50min.	dB
$2.\text{fo}\pm3.0\text{MHz}$	4.0max.	
3.fo +39.8~ fo +45.8MHz	45min.	
Ripple (with Fo $\pm 3.0$ MHz)	2.0max	dB
Input/Output Impedance(Nominal)	50//0	Ω/pF

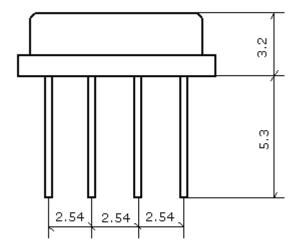


# 3. TEST CIRCUIT



## 4. DIMENSION









**SAW FILTER** 

#### 5. ENVIRONMENTAL CHARACTERISTICS

#### 5-1 High temperature exposure

Subject the device to  $+85^{\circ}$ C for 16 hours. Then release the filter into the room conditions for 24 hours prior to the measurement. It shall fulfill the specifications in 2-2.

#### 5-2 Low temperature exposure

Subject the device to  $-40^{\circ}$ C for 16 hours. Then release the device into the room conditions for 24 hours prior to the measurement. It shall fulfill the specifications in 2-2.

#### 5-3 Temperature cycling

Subject the device to a low temperature of  $-40^{\circ}$ C for 30 minutes. Following by a high temperature of  $+85^{\circ}$ C for 30 Minutes. Then release the device into the room conditions for 24 hours prior to the measurement. It shall meet the specifications in 2-2.

#### 5-4 Resistance to solder heat

Dip the device terminals no closer than 1.5mm into the solder bath at  $260^{\circ}$ C  $\pm 10^{\circ}$ C for  $10\pm 1$  sec. Then release the device into the room conditions for 4 hours. The device shall meet the specifications in 2-2.

#### 5-5 Solderability

Subject the device terminals into the solder bath at  $245^{\circ}$ C  $\pm 5^{\circ}$ C for 5s, More than 95% area of the terminals must be covered with new solder. It shall meet the specifications in 2-2.

#### 5-6 Mechanical shock

Drop the device randomly onto the concrete floor from the height of 1m 3 times. the device shall fulfill the specifications in 2-2.

#### 5-7 Vibration

Subject the device to the vibration for 1 hour each in x,y and z axes with the amplitude of 1.5 mm at 10 to 55 Hz. The device shall fulfill the specifications in 2-2.

#### 6. REMARK

#### 6.1 Static voltage

Static voltage between signal load & ground may cause deterioration &destruction of the component. Please avoid static voltage.

#### 6.2 Ultrasonic cleaning

Ultrasonic vibration may cause deterioration & destruction of the component. Please avoid ultrasonic cleaning

#### 6.3 Soldering

Only leads of component may be soldered. Please avoid soldering another part of component.