

规格书编号

SPEC NO :

# 产品规格书

# SPECIFICATION

CUSTOMER 客户: \_\_\_\_\_  
PRODUCT 产品: \_\_\_\_\_ SAW FILTER \_\_\_\_\_  
MODEL NO 型号: \_\_\_\_\_ HDF137.5A SMD-21 \_\_\_\_\_  
PREPARED 编制: \_\_\_\_\_ CHECKED 审核: \_\_\_\_\_  
APPROVED 批准: \_\_\_\_\_ D A T E 日期: \_\_\_\_\_ 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

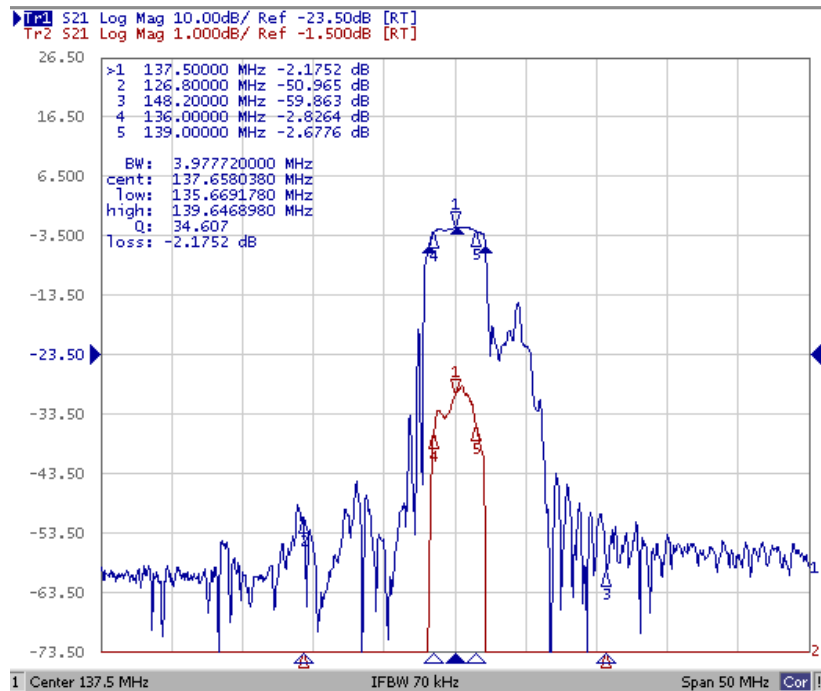
This specification shall cover the characteristics of SAW filter With F137.5A used for the page system.

## 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

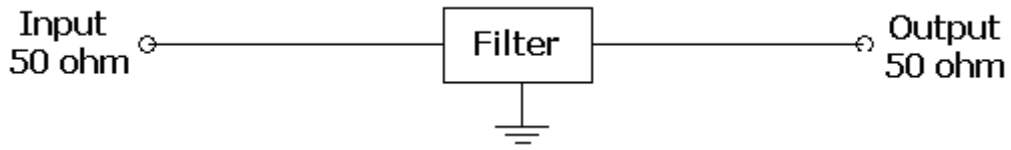
#### 2-1. Typical frequency response



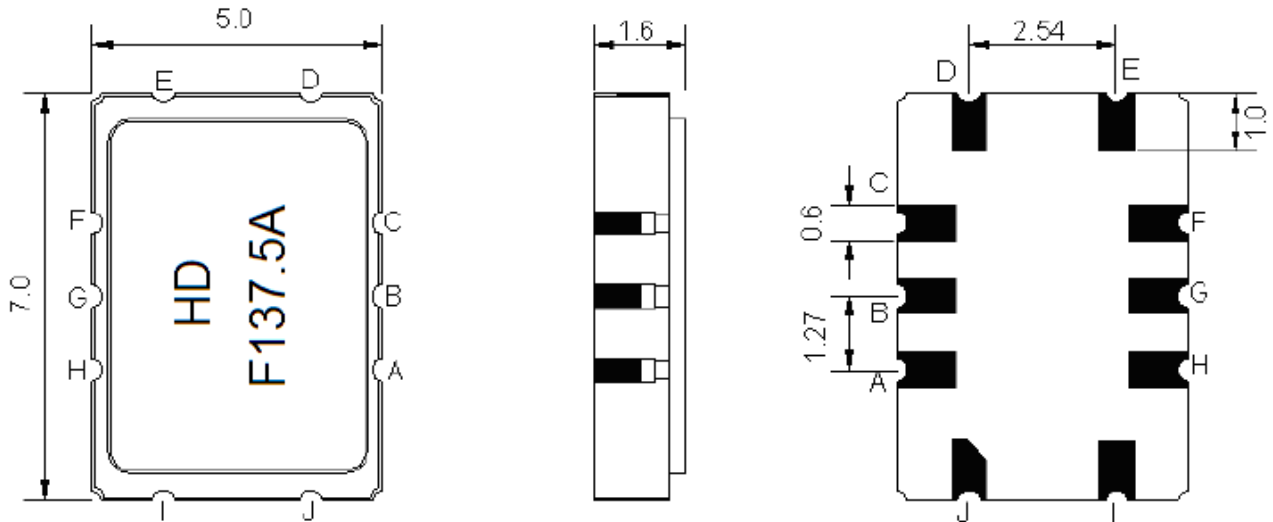
#### 2-2. Electrical characteristics

Part Number	F137.5A	Unit
Nominal center frequency(Fo)	137.5	MHz
Insertion (Fo)		
1. DC.~Fo-10.7MHz	40 min	dB
2. Fo	4.5 max	
3. Fo+10.7MHz~100MHz	40 min	
Passband width	± 1.5 min	MHz
Ripple(within passband)	2.0 min	dB
Input/Output impedance(Nominal)	50//0	Ω //pF

**3. TEST CIRCUIT**



**4. DIMENSION**



Pin Description	
A,B,C,F,G,H	Ground
I	Input
J	Ground
D	Output
E	Ground

**5. ENVIRONMENTAL CHARACTERISTICS**

5-1 High temperature exposure

Subject the filter to +85°C for 96 hours. Then release the filter into the room conditions for 1 to 2 hours prior to the measurement. It shall fulfill the specifications in 2-2.

5-2 Moisture

Keep the filter at 40°C and 95% rh for 96 hours. Then release the filter into the room conditions for 1 to 2 hours prior to the measurement. It shall fulfill the specifications in 2-2.

5-3 Low temperature exposure

Subject the filter to -40°C for 96 hours. Then release the filter into the room

conditions for 1 to 2 hours prior to the measurement. It shall fulfill the specifications in 2-2.

#### 5-4 Temperature cycling

Subject the filter to a low temperature of  $-55^{\circ}\text{C}$  for 30 minutes. Following by a high temperature of  $+85^{\circ}\text{C}$  for 30 Minutes. Then release the filter into the room conditions for 1 to 2 hours prior to the measurement. It shall meet the specifications in 2-2.

#### 5-5 Resistance to solder heat

Dip the filter terminals no closer than 1.5mm into the solder bath at  $270^{\circ}\text{C} \pm 10^{\circ}\text{C}$  for  $10 \pm 1$  sec. Then release the Filter into the room conditions for 1 to 2 hours. The Filter shall meet the specifications in 2-2.

#### 5-6 Mechanical shock

Drop the filter randomly onto the concrete floor from the height of 30cm 3 times. the filter shall fulfill the specifications in 2-2.

#### 5-7 Vibration

Subject the filter 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 filter 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.

## 7. Packing

### 7.1 Dimensions

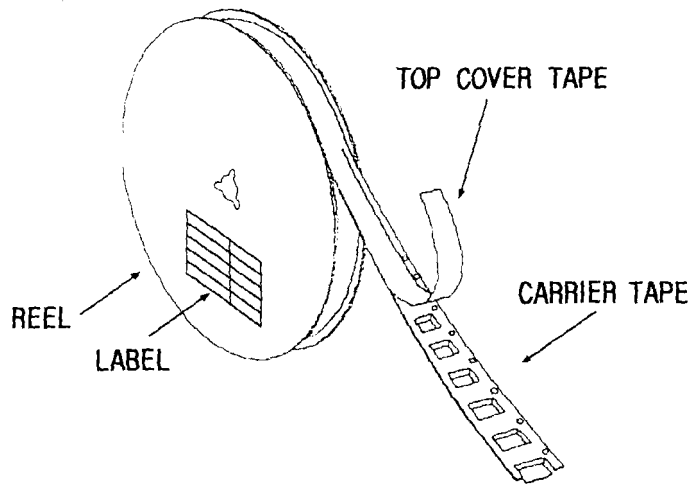
- (1) Carrier Tape: Figure 1
- (2) Reel: Figure 2
- (3) The product shall be packed properly not to be damaged during transportation and storage.

### 7.2 Reeling Quantity

1000 pcs/reel 7''  
3000 pcs/reel 13''

### 7.3 Taping Structure

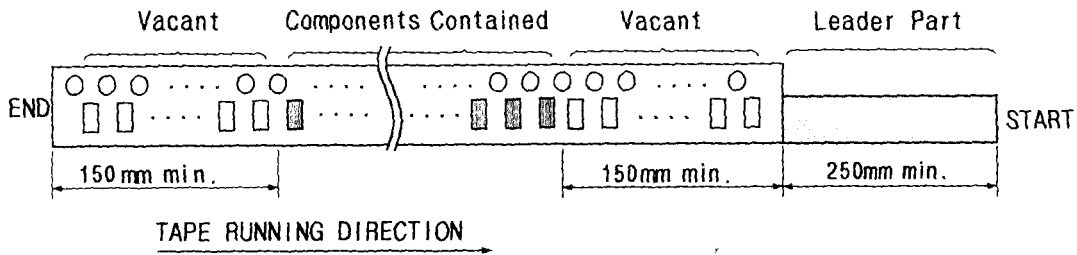
- (1) The tape shall be wound around the reel in the direction shown below.



(2) Label

Device Name	
User Product Name	
Quantity	
Lot No.	

(3) Leader part and vacant position specifications.



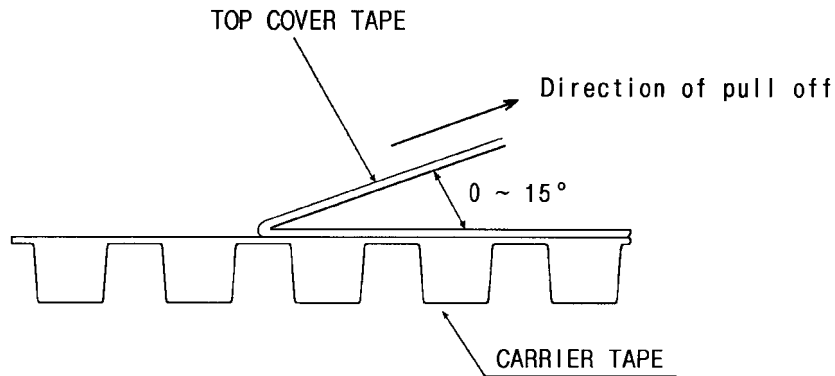
## 8. TAPE SPECIFICATIONS

8.1 Tensile Strength of Carrier Tape: 4.4N/mm width

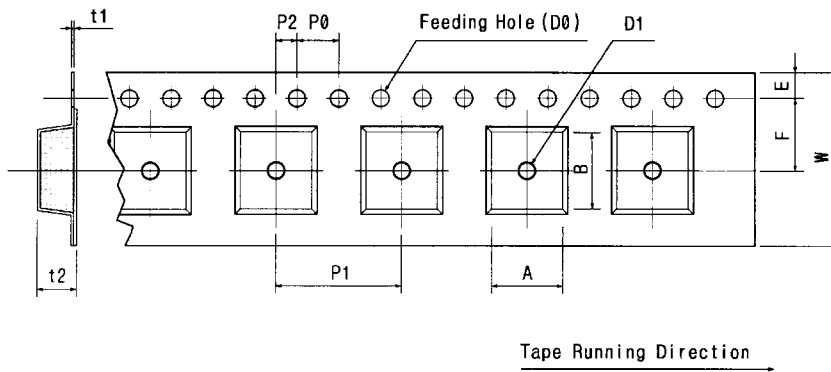
8.2 Top Cover Tape Adhesion (See the below figure)

- (1) pull off angle: 0~15°
- (2) speed: 300mm/min.

(3) force: 20~70g



[Figure 1] Carrier Tape Dimensions

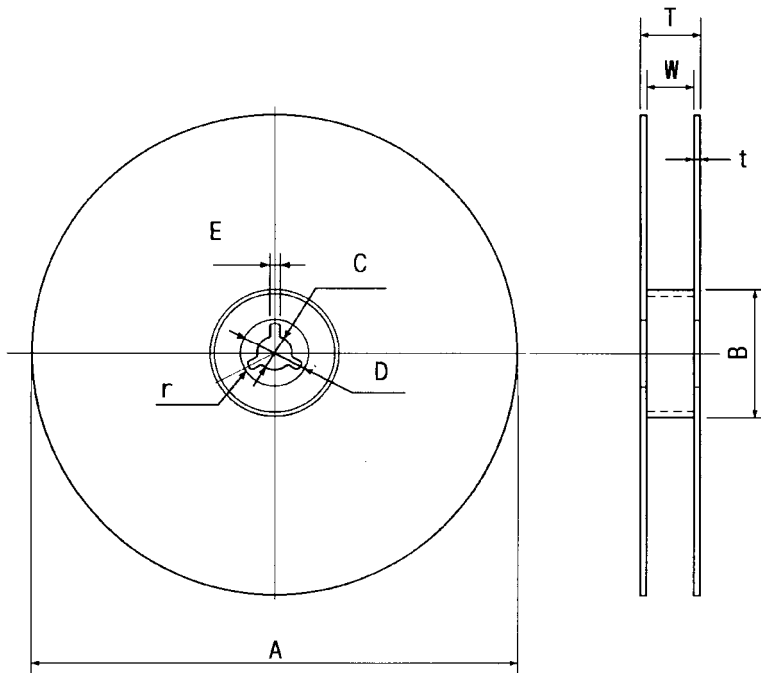


[Unit:mm]

W	F	E	P0	P1	P2	D0	D1	t1	t2	A	B
12.00	7.50	1.75	4.00	8.00	2.00	Ø1.50	Ø1.5	0.25	2.20	5.80	7.30
±0.30	±0.10	±0.10	±0.10	±0.10	±0.10		±0.25	±0.05	±0.10	±0.10	±0.10

[Figure 2]

[Unit:mm]



A	B	C	D	E	W	t	r
Ø330	Ø100	Ø13	Ø21	2	16.8	3	1.0
±1.0	±0.5	±0.5	±0.8	±0.5	±0.3	max.	max.