

- 140.0 MHz IF SAW Filter / 16.32 MHz Bandwidth
- Revision 0: 21. Apr. 2009

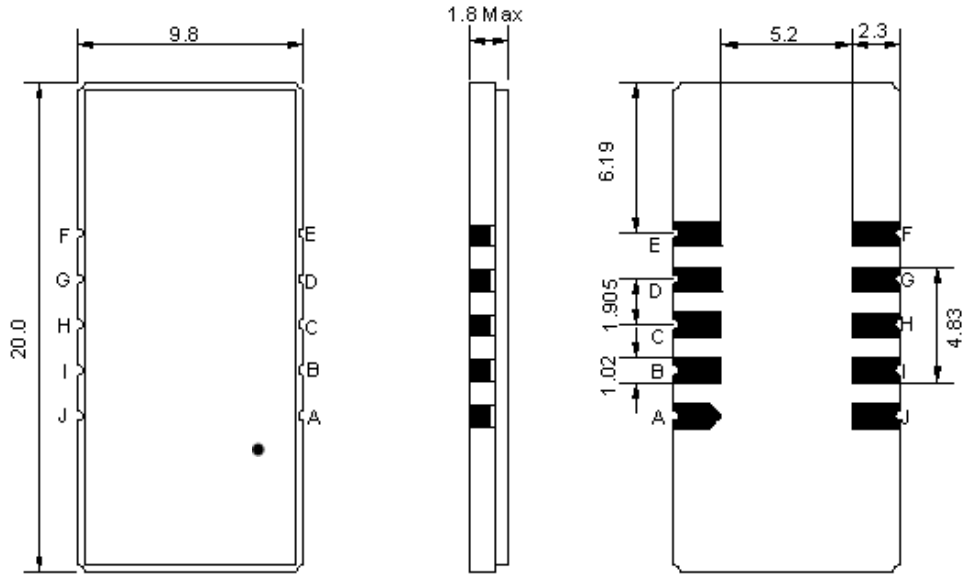
Electrical Characteristics

MAXIMUM RATING				
PARAMETERS DESCRIPTION	UNIT	MINIMUM	TYPICAL	MAXIMUM
Operation Temperature Range	°C	-10	-	70
Storage Temperature Range	°C	-40	-	85
Maximum DC Voltage	V	-	-	10
Maximum Input Power	dBm	-	-	10
Source Impedance (single ended) ⁽¹⁾	Ω	-	50	-
Load Impedance (single ended) ⁽¹⁾	Ω	-	50	-
Package type & size	D1			
Length x Width	mm ²	-	20.0 x 9.8	-
Height	mm	-	-	1.8

ELECTRICAL SPECIFICATION				
PARAMETERS DESCRIPTION	UNIT	MINIMUM	TYPICAL	MAXIMUM
Center Frequency (Fo)	MHz	-	140.0	-
Insertion Loss at Fo	dB	-	22.70	25.00
Group Delay Variation (Fo±7.5MHz)	nsec	-	40	80
Absolute Delay	usec	-	2.29	-
Passband Ripple (Fo±7.5MHz)	dB	-	0.65	0.95
Bandwidth at -1dB	MHz	16.00	16.32	-
Bandwidth at -3dB	MHz	-	16.62	-
Bandwidth at -40dB	MHz	-	17.90	18.10
Bandwidth at -50dB	MHz	-	18.00	-
Ultimate Rejection	dB	50	53	-
Temperature coefficient	ppm/°C	-	-72	-

Notes : (1) With Matching Network (Ref. Testing Environment Circuit as shown below).
Those impedances could be modified with different impedance values and/or structures, if necessary.

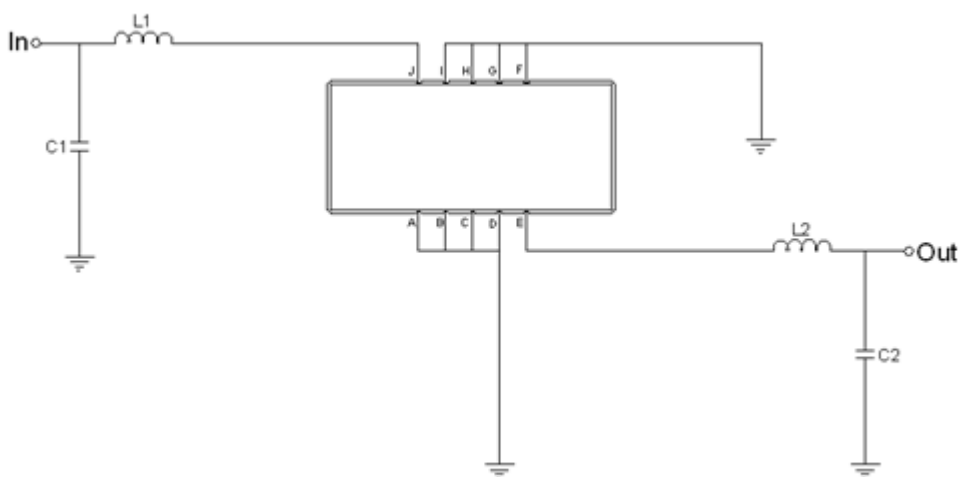
Package Dimensions



- ① **TRANSKO:** Brand
- ② **TA14016A:** Model Name
- ③ **X :** Date Code (Year)
- ④ **Y :** Date Code (Month)
- ⑤ **Z :** Date Code (Date)
- : Index Dot

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

Testing Environment



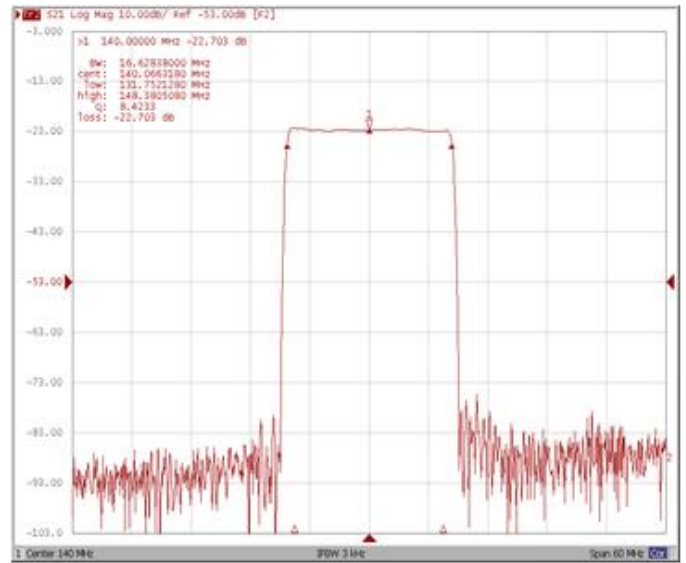
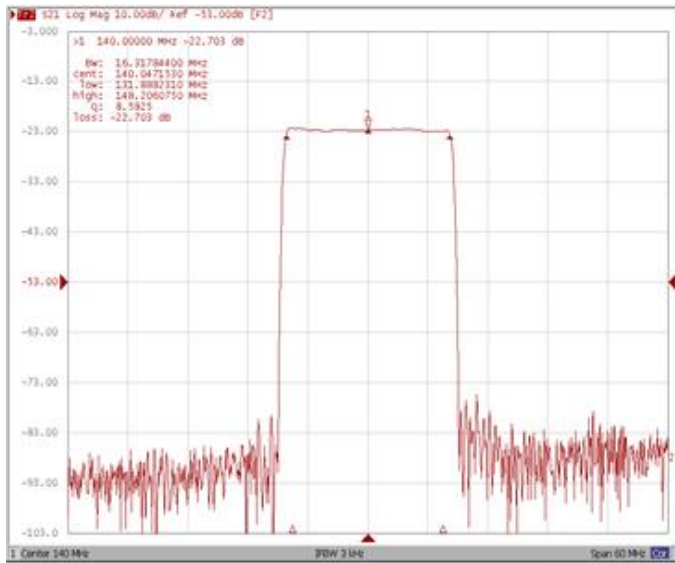
Test Fixture & Values	
Input	L1=33nH, C1=24pF
Output	L2=33nH, C2=13pF
Source/Load Impedance	50 Ω

Frequency Characteristics

Frequency Response

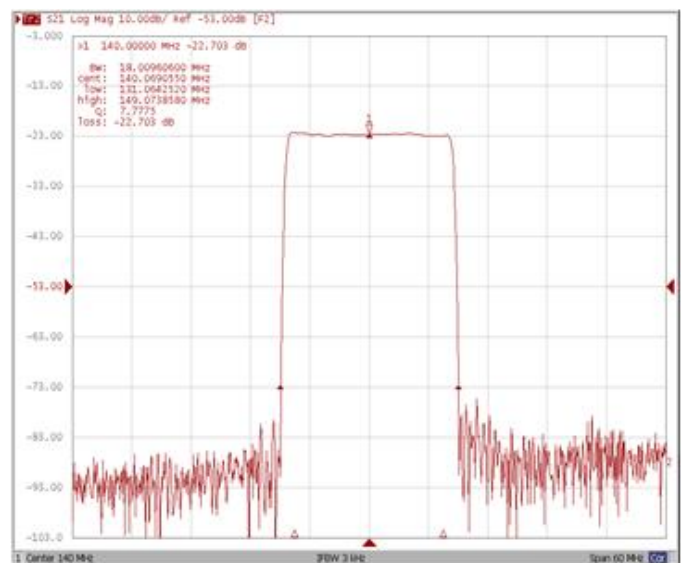
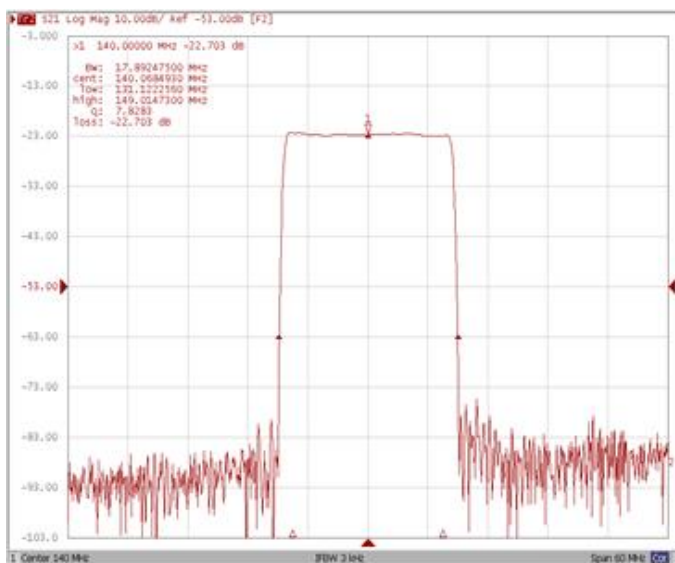
Bandwidth at -1.0 dB

Bandwidth at -3.0 dB



Bandwidth at -40.0 dB

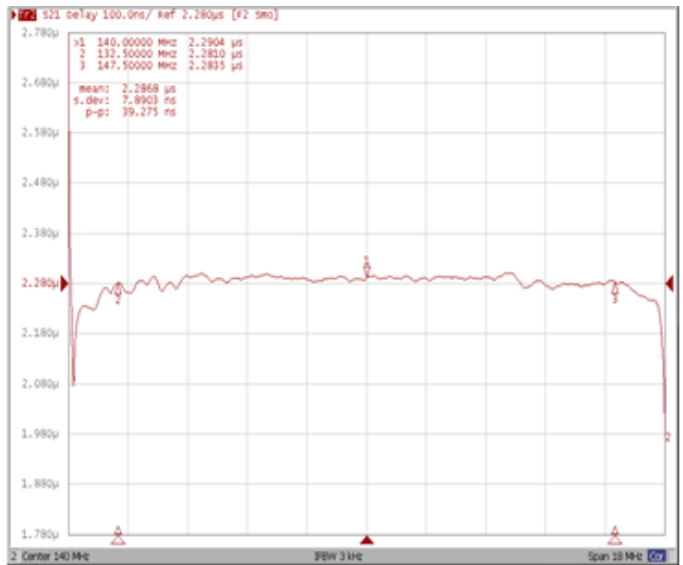
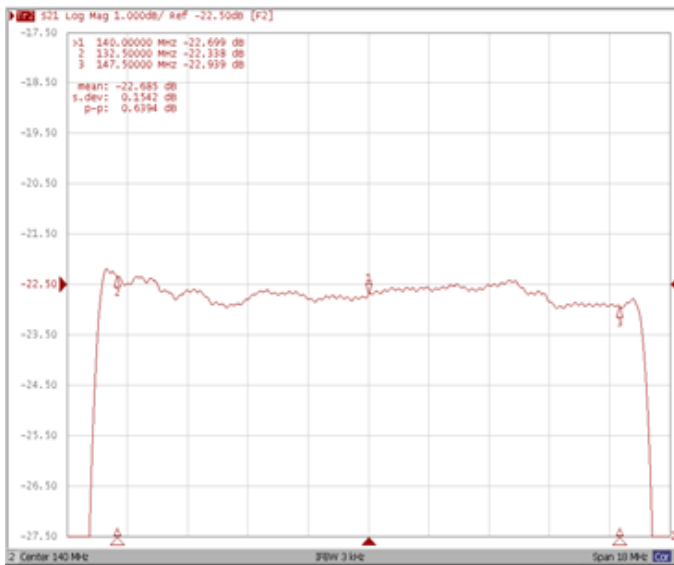
Bandwidth at -50.0 dB



Frequency Response

Ripple Variation Fo±7.5MHz

Group Delay Variation Fo±7.5MHz



Smith Chart

VSWR

