

- 185.0 MHz IF SAW Filter / 16.05 MHz Bandwidth
- Revision 0: 21. Apr. 2009

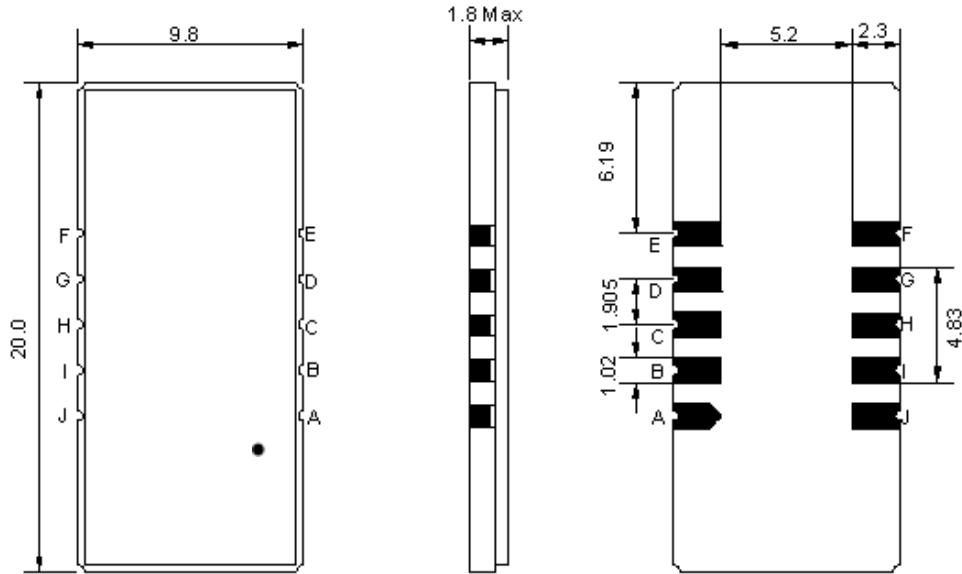
## Electrical Characteristics

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) <sup>(1)</sup>	Ω	-	50	-
Load Impedance (single ended) <sup>(1)</sup>	Ω	-	50	-
Package type & size	D1			
Length x Width	mm <sup>2</sup>	-	20.0 x 9.8	-
Height	mm	-	-	1.8

ELECTRICAL SPECIFICATION				
PARAMETERS DESCRIPTION	UNIT	MINIMUM	TYPICAL	MAXIMUM
Center Frequency (Fo)	MHz	-	185.0	-
Insertion Loss at Fo	dB	-	25.60	28.00
Group Delay Variation (Fo±7.5MHz)	nsec	-	30	70
Absolute Delay	usec	-	2.55	-
Passband Ripple (Fo±7.5MHz)	dB	-	0.50	0.95
Bandwidth at -1dB	MHz	15.80	16.05	-
Bandwidth at -3dB	MHz	-	16.40	-
Bandwidth at -40dB	MHz	-	17.95	18.10
Bandwidth at -50dB	MHz	-	18.05	-
Ultimate Rejection	dB	50	55	
Temperature coefficient	ppm/°C	-	-20	-

**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.

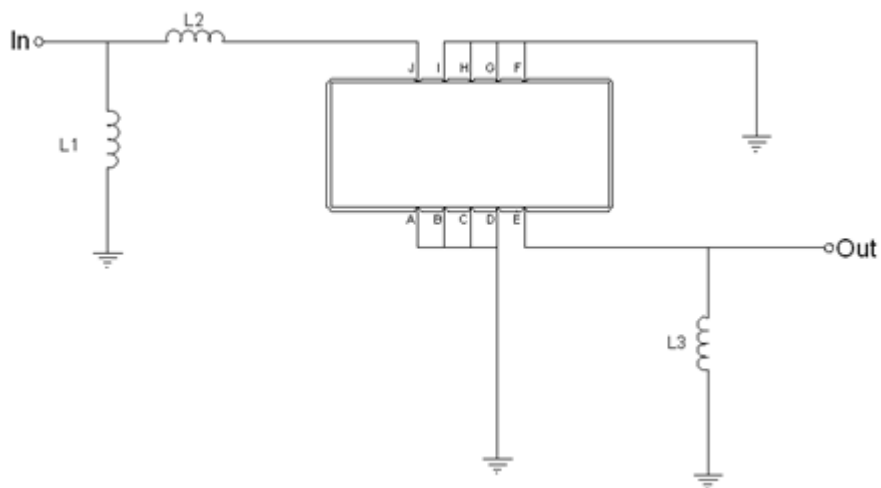
## Package Dimensions



- ① **TRANSKO:** Brand
- ② **TA18515A:** 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

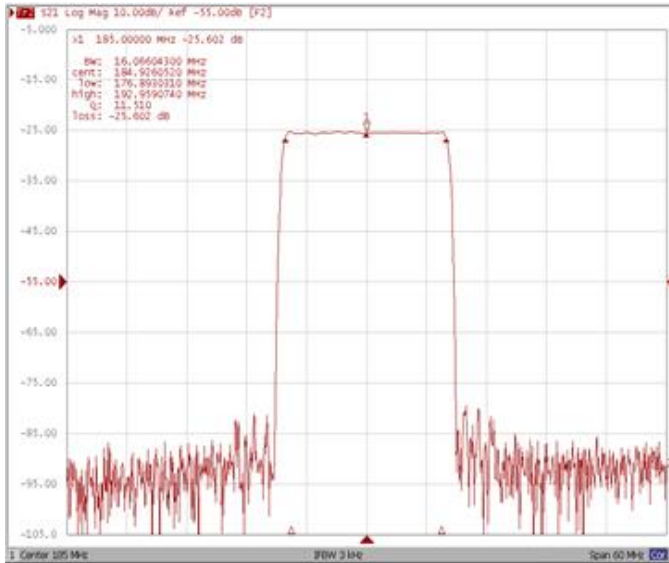


Test Fixture & Values	
Input	L1=18nH, L2=8.2pF
Output	L3=27nH
Source/Load Impedance	50 Ω

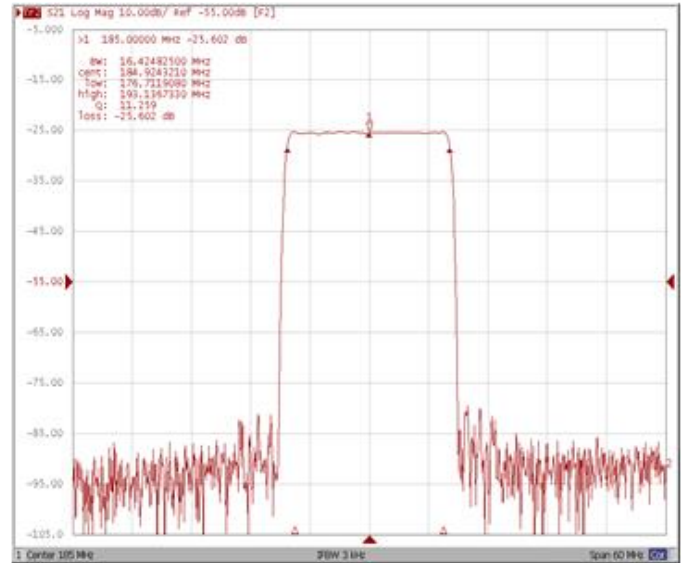
## Frequency Characteristics

### Frequency Response

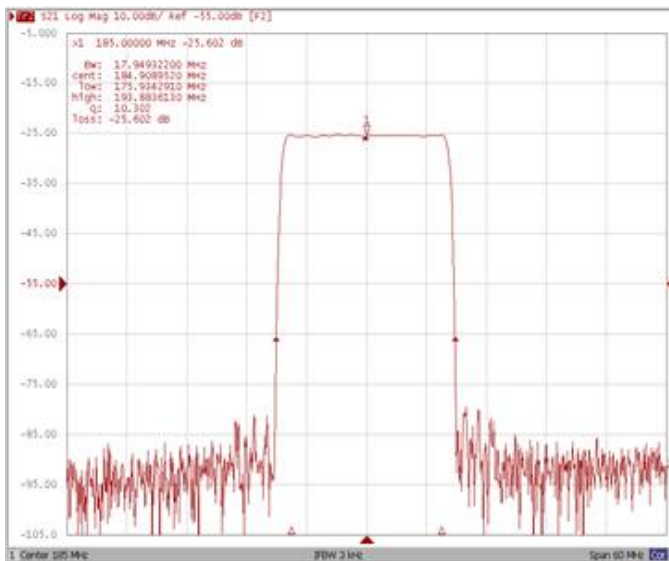
**Bandwidth at -1.0 dB**



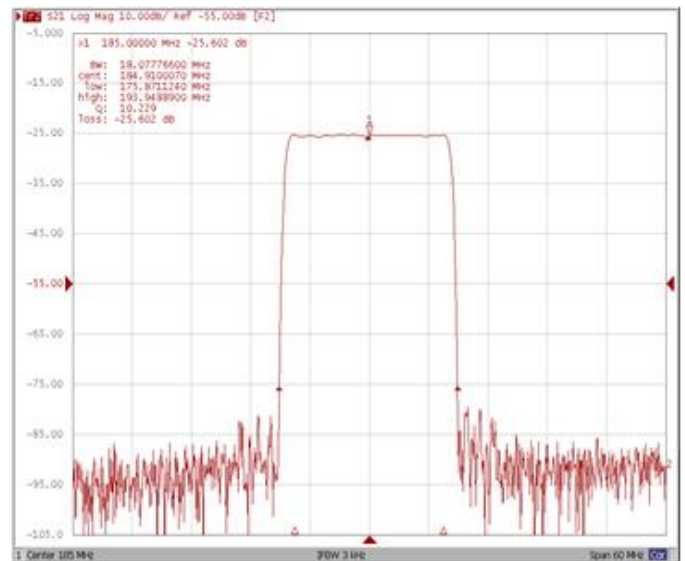
**Bandwidth at -3.0 dB**



**Bandwidth at -40.0 dB**

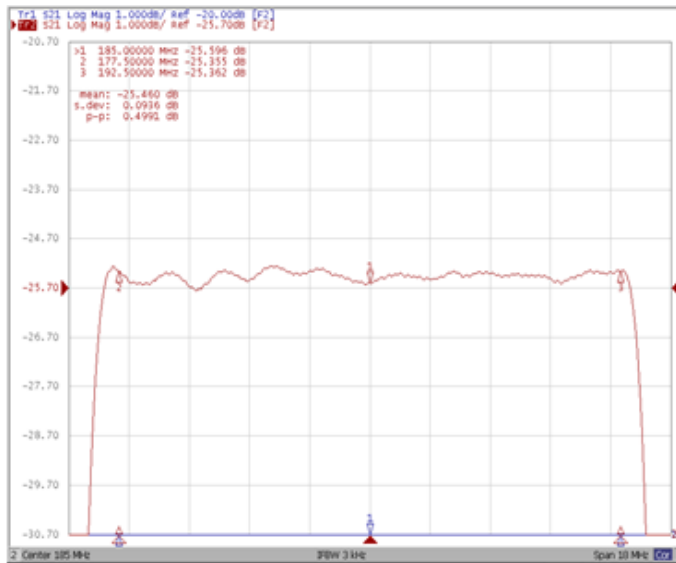


**Bandwidth at -50.0 dB**

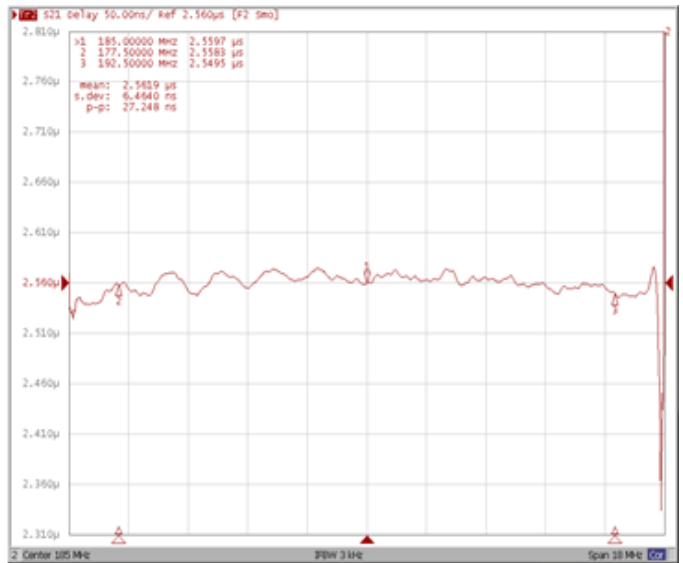


**Frequency Response**

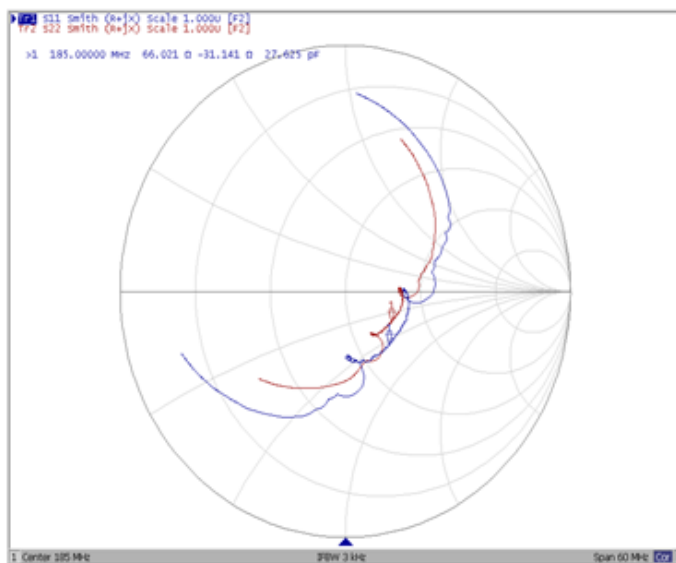
**Ripple Variation  $Fo \pm 7.5\text{MHz}$**



**Group Delay Variation  $Fo \pm 7.5\text{MHz}$**



**Smith Chart**



**VSWR**

