



### Multiple Frequency Combiner 700MHz/850MHz/PCS /AWS



#### Features

- High Isolation
- Low Insertion Loss
- Excellent Temperature Stability
- Miniaturization
- Customization available upon request

#### Electrical Specifications, $T_A=25\text{ }^\circ\text{C}$

Parameters	700MHz			850MHz			PCS			AWS			Units
	Min.	Typ.	Max.	Min.	Typ.	Max.	Min.	Typ.	Max.	Min.	Typ.	Max.	
Frequency Range	698~806			824~894			1850~2000			1710~1755 &2110~2155			MHz
Insertion Loss		0.6	0.7		0.6	0.7		0.45	0.5		0.4	0.5	dB
Pass Band Ripple		0.3	0.4		0.3	0.4		0.3	0.4		0.3	0.4	dB
Return loss	18	19		18	19		18	19		18	20		dB
Port Isolation	45			45			45			45			dB
Input Power (Per Port)	20											Watts	
Impedance	50											Ohms	
Weight	49.74											ounces	
Input / Output Connectors	N-Female												
Material	Aluminum												
Finish	Black Paint												

Multiple Frequency Combiner 700MHz/850MHz/PCS /AWS



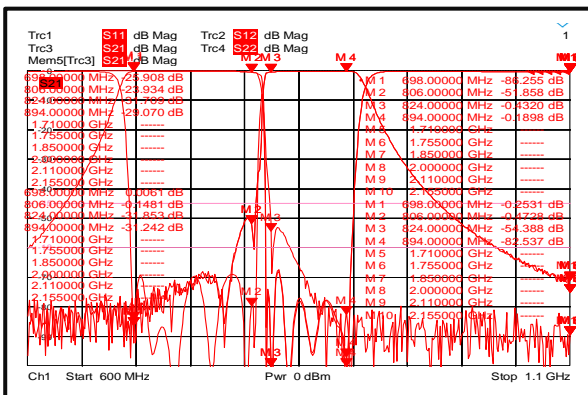
**Environmental Specifications and Test Standards**

Parameter	Standard	Description
Operational Temperature	MIL-STD-39016	-40°C~+85°C
Storage Temperature		-55°C~+125°C
Thermal Shock		1 Hour@ -45°C → 1 Hour @ +85°C (5 Cycles)
Random Vibration		Acceleration Spectral Density 6 (m/s) Total 92.6 RMS
Electrical & Temperature Burn In		Temperature +85°C for 72 Hours
Shock		1. Weight >20g, 50g half sine wave for 11ms, Speed variation 3.44m/s 2. Weight <=20g, 100g Half sine wave for 6ms, Speed variation 3.75m/s 3. Total 18 times (6 directions, 3 repetitions per direction).
Altitude	MIL-STD-883	Standard: 30,000 Ft (Epoxy Sealed Controlled Environment) Optional: Hermetically Sealed (60,000 ft. 1.0 PSI min)
Hermetically Sealed (Optional)		MIL-STD-883 (For Hermetically Sealed Units)

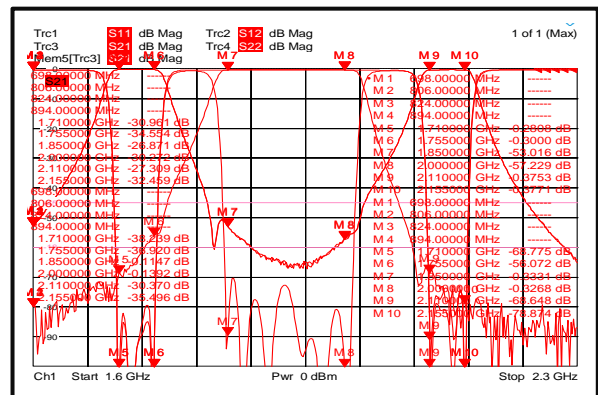
Multiple Frequency Combiner 700MHz/850MHz/PCS/AWS

**Typical Performance Plots**

**700MHz/850MHz VS. VSWR. Loss. Ripple. Isolation**



**PCS/AWS VS. VSWR. Loss. Ripple. Isolation**

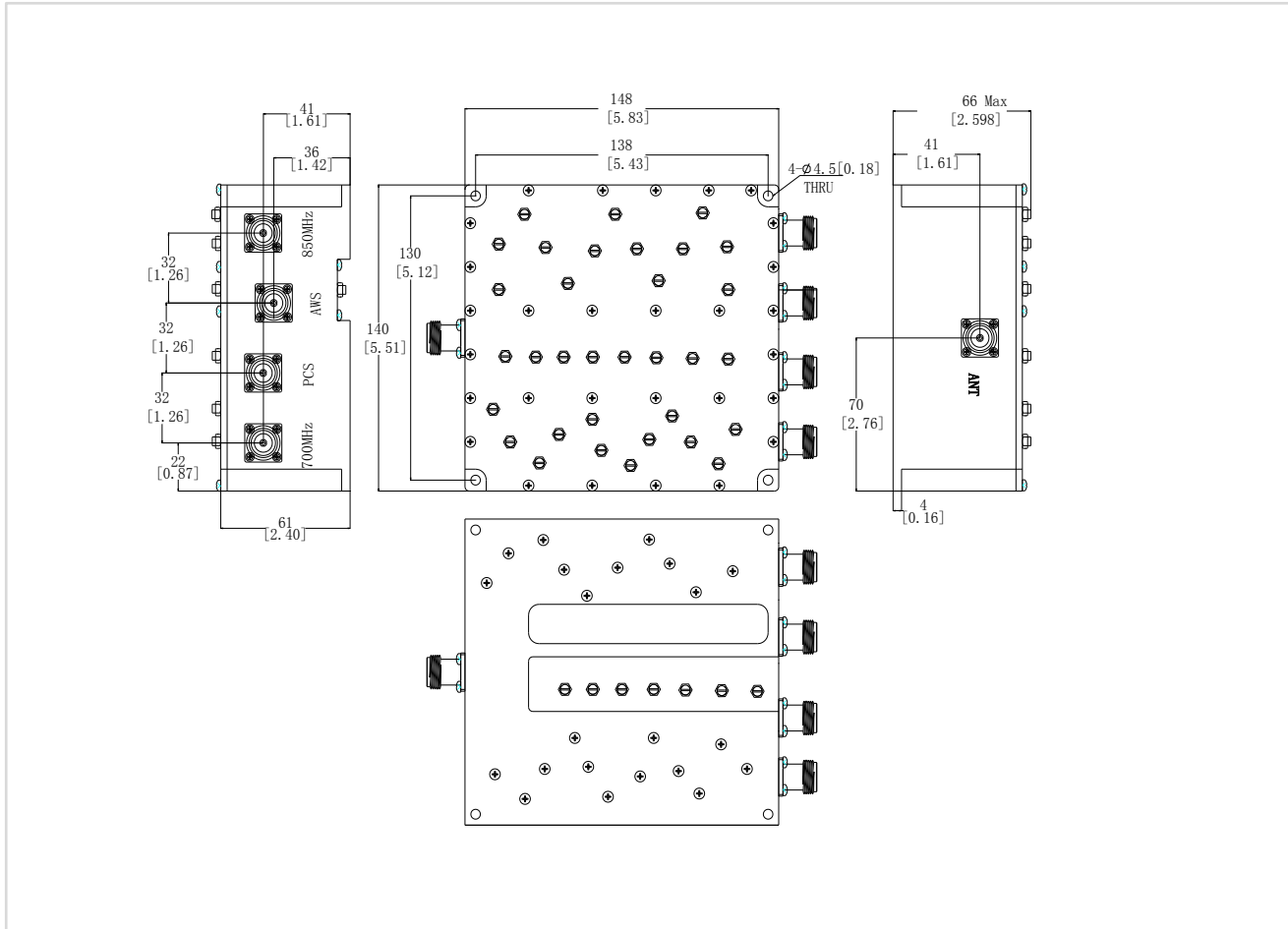




**Outline Drawing:**

All Dimensions in mm[inches]

Tolerance  $\pm 0.3$  [0.012]



**Multiple Frequency Combiner 700MHz/850MHz/PCS/AWS**

**Important Notice**

The information contained herein is believed to be reliable. RF-Lambda makes no warranties regarding the information contained herein. RF-Lambda assumes no responsibility or liability whatsoever for any of the information contained herein. RF-Lambda assumes no responsibility or liability whatsoever for the use of the information contained herein. The information contained herein is provided "AS IS, WHERE IS" and with all faults, and the entire risk associated with such information is entirely with the user. All information contained herein is subject to change without notice. Customers should obtain and verify the latest relevant information before placing orders for RF-Lambda products. The information contained herein or any use of such information does not grant, explicitly or implicitly, to any party any patent rights, licenses, or any other intellectual property rights, whether with regard to such information itself or anything described by such information. RF-Lambda products are not warranted or authorized for use as critical components in medical, life-saving, or life sustaining applications, or other applications where a failure would reasonably be expected to cause severe personal injury or death.