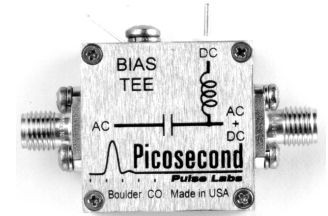




# Model 5545 Bias Tee

- 65 kHz - 20 GHz
- 12 ps Risetime
- 50 V, 500 mA

The Model 5545 is a broadband, coaxial bias insertion tee and DC blocking capacitor. It passes fast rise pulses with a minimum of waveform distortion. Its risetime is 12 ps. The frequency response is flat over many decades, and the -3 dB bandwidth extends from 65 kHz to 20 GHz.

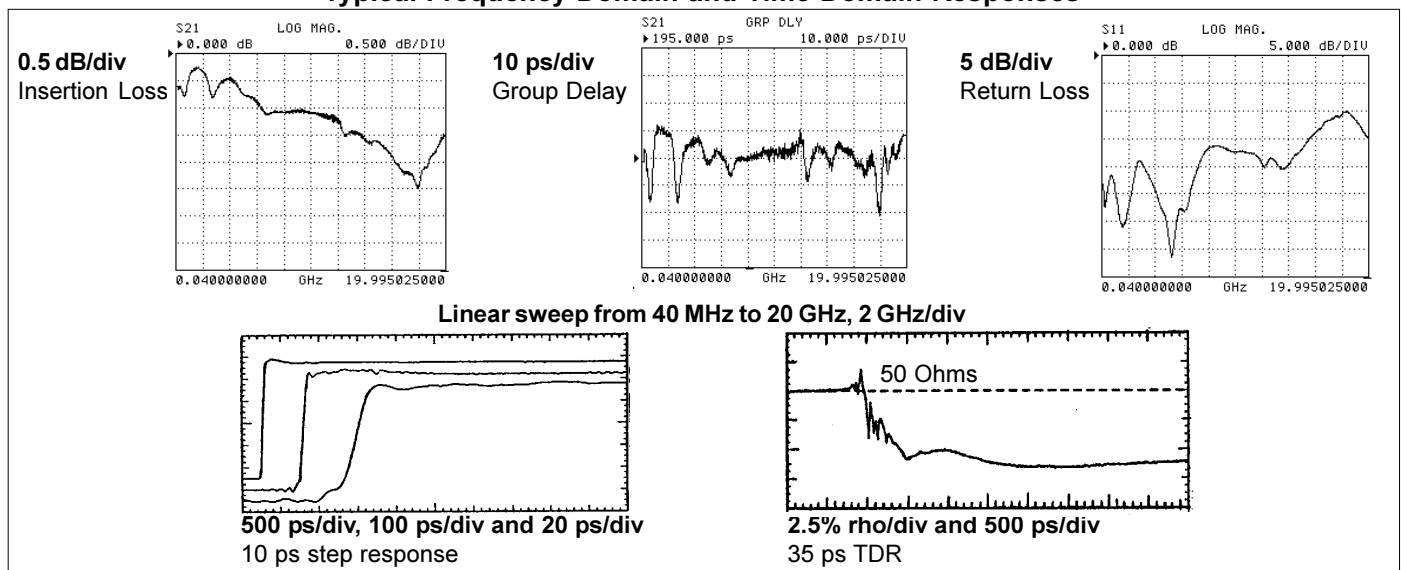


<b>Risetime (10%-90%)</b>	12 ps, 15 ps max.	<b>Capacitance</b>	0.03 $\mu$ F, $\pm$ 20%
<b>Bandwidth (-3 dB)</b>	>20 GHz [2]	<b>DC Voltage</b>	50 V max.
<b>Low Frequency (-3 dB)</b>	65 kHz	<b>Inductance</b>	340 $\mu$ H, $\pm$ 20%
<b>Insertion Loss</b>	0.7 dB, typical	<b>DC Current</b>	500 mA max.
	< 1 dB, f < 5 GHz	<b>Resistance</b>	1.1 $\Omega$
<b>Impedance</b>	< 1.5 dB, f < 12 GHz	<b>RF Power</b>	2 W avg. max.
	50 $\Omega$	<b>Delay</b>	195 ps
<b>Return Loss</b>	23 dB, f = 100 MHz	<b>Connectors</b>	SMA jacks (f) DC = solder pin
	>20 dB, f < 6 GHz	<b>Dimensions</b>	4.45 x 3.18 x 1.6 cm (case) 2.54 x 2.54 x 1.6 cm
<b>Refl. Coeff. (35ps TDR)</b>	>12 dB, f < 14 GHz	<b>Warranty</b>	One year. See Terms and Conditions of Sale for details.
<b>Ref. Coeff. (35ps TDR)</b>	-7%, t > 1 ns		
<b>Isolation</b>	>25 dB, typical		

### Ordering Information

Model Number	Description
5545-107	Bias Tee with standard connectors
5545-108	Bias Tee (above) with mounting plate
5545-119	Bias Tee (above) with AC = plug (m)

### Typical Frequency Domain and Time Domain Responses



#### Notes

- [1] Parameters listed are typical values. They are guaranteed only when maximum and/or minimum limits are given.
- [2] Not recommended for freq. domain applications above 15 GHz due to higher order mode resonances. [3] 10 ps risetime step response measured using a PSPL Model 4015C 15 ps pulse generator and an HP-54124A, 50 GHz oscilloscope.
- [4] Frequency response measured using a Wiltron 37369A, 40 MHz - 40 GHz network analyzer.

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