

Package: S-20

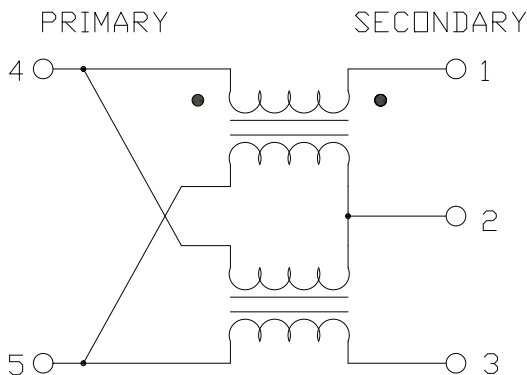


Features

- Frequency Range 2 MHz to 1000 MHz
- Low Cost and RoHS Compliant
- Transmission Line
- Industry Standard SMT package
- Available in Tape-and -Reel
- 50Ω Characteristic Impedance

Applications

- Broadband/CATV
- Wireless



Schematic

Product Description

The RFXF3553 Transformer is designed for applications that require very small, low cost, and highly reliable surface mount components. Applications may be found in broadband, wireless and other communications systems. These units are built Lead-Free and RoHS compliant and feature welded wire construction for increased reliability. S-Parameters are available on request.

Ordering Information

Part Number	Description	Reel Size	Package
RFXF3553SB	2 MHz to 1000 MHz 1:4 SMT Transformer	N/A	5-piece bag
RFXF3553SQ	2 MHz to 1000 MHz 1:4 SMT Transformer	N/A	25-piece bag
RFXF3553SR	2 MHz to 1000 MHz 1:4 SMT Transformer	13"	100 piece reel
RFXF3553TR13	2 MHz to 1000 MHz 1:4 SMT Transformer	13"	1000 piece reel

Optimum Technology Matching® Applied

<input type="checkbox"/> GaAs HBT	<input type="checkbox"/> SiGe BiCMOS	<input type="checkbox"/> GaAs pHEMT	<input type="checkbox"/> GaN HEMT
<input type="checkbox"/> GaAs MESFET	<input type="checkbox"/> Si BiCMOS	<input type="checkbox"/> Si CMOS	<input type="checkbox"/> BiFET HBT
<input type="checkbox"/> InGaP HBT	<input type="checkbox"/> SiGe HBT	<input type="checkbox"/> Si BJT	<input type="checkbox"/> LDMOS

Absolute Maximum Ratings

Parameter	Rating	Unit
RF Power	2	W
Operating Temperature	-40 to +85	°C
Storage Temperature	-55 to +100	°C



Caution! ESD sensitive device.

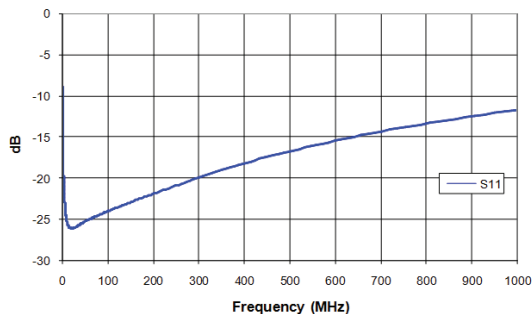
Exceeding any one or a combination of the Absolute Maximum Rating conditions may cause permanent damage to the device. Extended application of Absolute Maximum Rating conditions to the device may reduce device reliability. Specified typical performance or functional operation of the device under Absolute Maximum Rating conditions is not implied.

RoHS status based on EUDirective2002/95/EC (at time of this document revision).

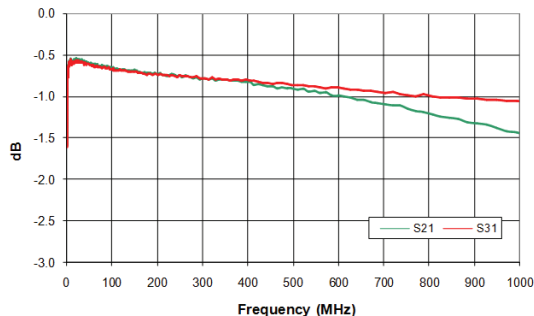
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Parameter	Specification			Unit	Condition
	Min.	Typ.	Max.		
					Typical values represent Mid-Band performance at 25 °C
Frequency Range	2		1000	MHz	
Insertion Loss <1 dB	2		400	MHz	
Insertion Loss <2 dB	2		1000	MHz	
Insertion Loss <3 dB	-		-	MHz	
Amplitude Balance		0.2	1.0	dB	
Phase Balance		3	10	°	
Impedance Ratio	1:4				
Type - Transmission Line	Unbalanced to Balanced				

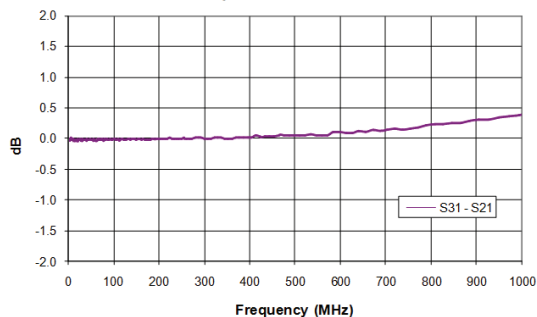
Input Return Loss



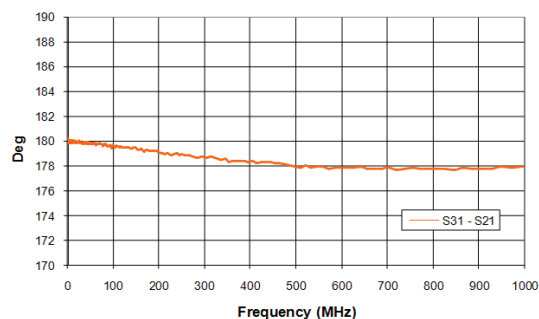
Insertion Loss



Amplitude Balance



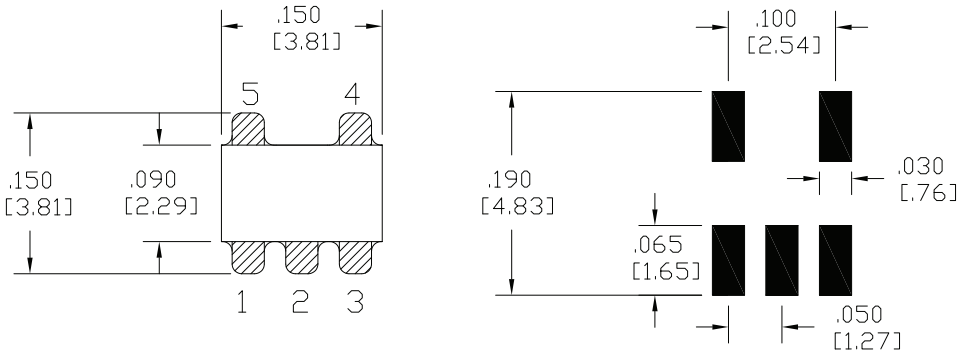
Phase Balance



Pin Out

Pin	Function
1	Secondary Dot
2	Secondary CT
3	Secondary
4	Primary Dot
5	Primary

Package Drawing - S20
Dimensions in inches (millimeters)



PCB FOOTPRINT

