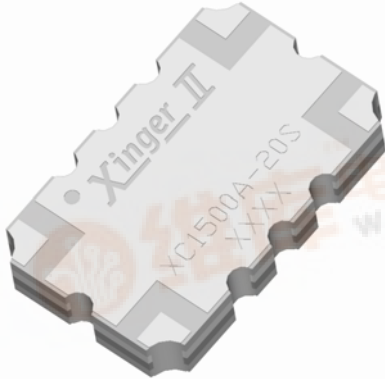


# Xinger II

## 20dB Directional Coupler



### Description

The XC1500A-20S is a low profile, high performance 20dB directional coupler in a new easy to use, manufacturing friendly surface mount package. It is designed for AMPS band applications. The XC1500A-20S is designed particularly for power and frequency detection, as well as for VSWR monitoring, where tightly controlled coupling and low insertion loss is required. It can be used in high power applications up to 150 Watts.

Parts have been subjected to rigorous qualification testing and they are manufactured using materials with coefficients of thermal expansion (CTE) compatible with common substrates such as FR4, G-10, RF-35, RO4350 and polyimide. Produced with 6 of 6 RoHS compliant tin immersion finish.

### Features:

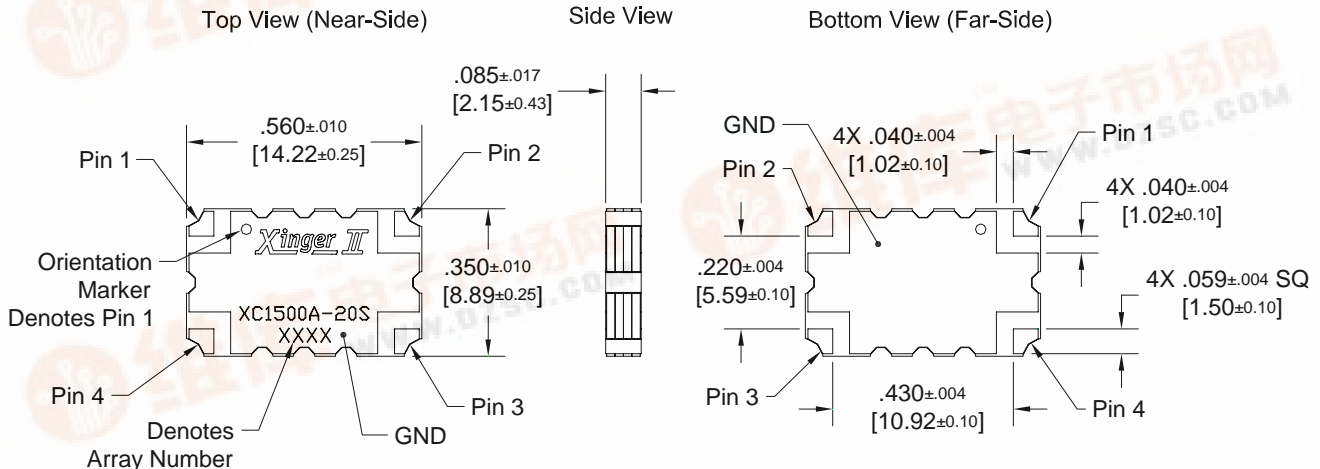
- 1000 - 2000 MHz
- AMPS
- High Power
- Very Low Loss
- Tight Coupling
- High Directivity
- Production Friendly
- Tape and Reel
- Lead-Free

### Electrical Specifications \*\*

Frequency	Mean Coupling	Insertion Loss	VSWR	Directivity
MHz	dB	dB Max	Max : 1	dB Min
1000-2000	20±0.70	0.19	1.28	21.0
Frequency Sensitivity	Power	∅JC	Operating Temp.	
dB Max	Avg. CW Watts	°C/Watt	°C	
±1.25	150	TBD	-55 to +85	

\*\*Specification based on performance of unit properly installed on Anaren Test Board 54606-0001. Refer to Specifications subject to change without notice. Refer to parameter definitions for details.

### Mechanical Outline



Dimensions are in Inches [Millimeters]  
XC1500A-20S Mechanical Outline

Tolerances are Non-Cumulative



## Packaging and Ordering Information

Parts are available in both reel and tube. Packaging follows EIA 481-2. Parts are oriented in tape and reel as shown below. Minimum order quantities are 2000 per reel and 30 per tube. See Model Numbers below for further ordering information.

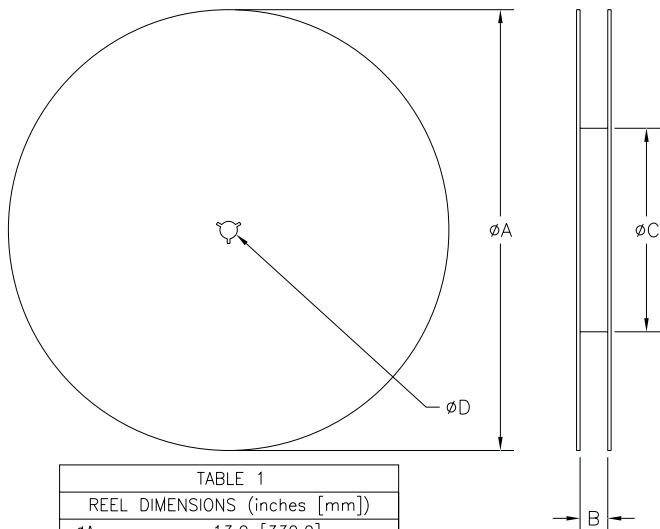
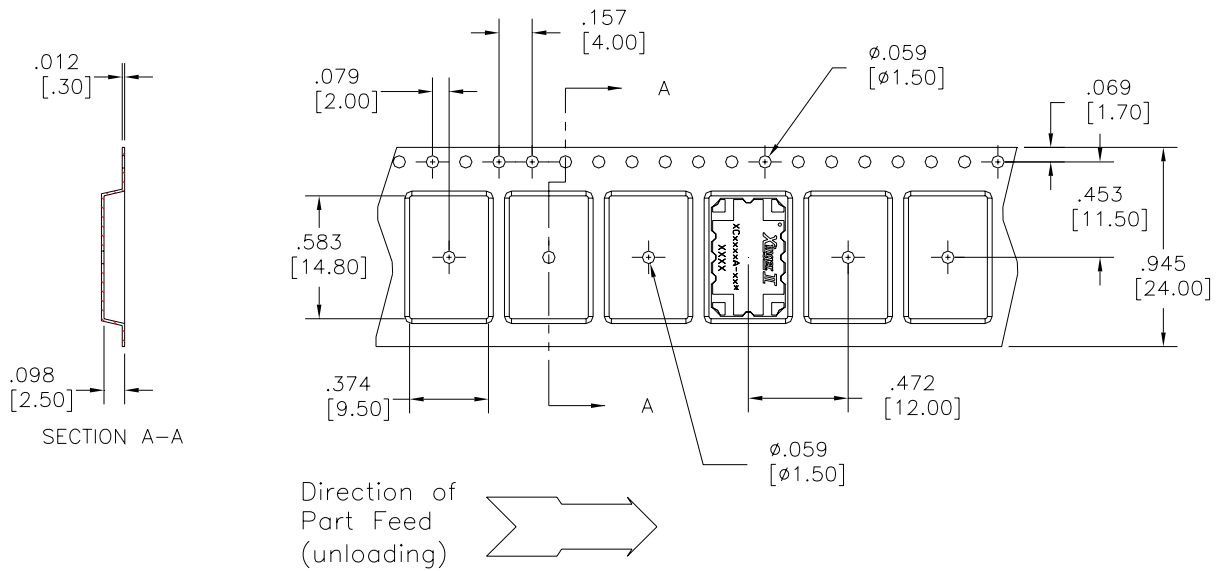


TABLE 1	
REEL DIMENSIONS (inches [mm])	
$\phi A$	13.0 [330.0]
B	.945 [24.0]
$\phi C$	4.017 [102.03]
$\phi D$	0.512 [13.0]

Xinger Coupler	Frequency (MHz)	Size (Inches)	Coupling Value	Plating Finish
XC	0450 = 410-500	A = 0.56 x 0.35	03 = 3dB	P = Tin Lead S = Immersion Tin
	0900 = 800-1000	B = 1.0 x 0.50	05 = 5dB	
	1900 = 1700-2000	E = 0.56 x 0.20	10 = 10dB	
	2100 = 2000-2300	L = 0.65 x 0.48	20 = 20dB	
	2500 = 2300-2500	M = 0.40 x 0.20	30 = 30dB	
	2650 = 2650-2800	P = 0.25 x 0.20		
	3500 = 3300-3800			

Ordering code: XX XXXX X - XX X