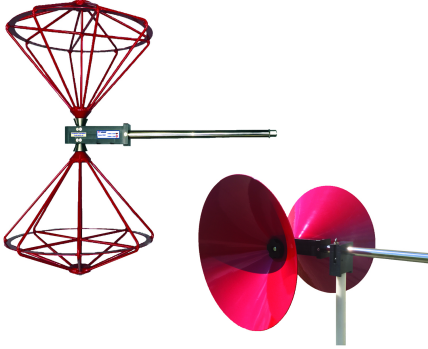


BROADBAND MIN-BICON ANTENNAS 3180C Broadband Mini-Bicon Antenna

ETS-Lindgren's Model 3180C Broadband Mini-Bicon Antenna has been designed for optimal performance across the frequency range of 30 MHz to 1 GHz (cage elements) and 30 MHz to 3 GHz (cone elements).



ETS-Lindgren's Model 3180C Broadband Mini-Bicon Antenna has been designed for optimal performance across the frequency range of 30 MHz to 1 GHz (cage elements) and 30 MHz to 3 GHz (cone elements). The 3180C's uniquely designed elements provide a omnidirectional pattern, without the beam splitting.

The model 3180C is ideal for the free space NSA (FSNSA) test for fully anechoic rooms. Its small size allows for harmonic monitoring when testing per the IEC 61000-4-3.

Key Features

- **Frequency Range:**
 - **Cage Elements: 30 MHz to 1 GHz**
 - **Cone Elements: 30 MHz to 3 GHz**
- **Omni-directional Pattern Ideal for:**
 - **Chamber Characterization**
 - **Broadband Spectrum Monitoring**
 - **Field Measurements Flexible Mounting**

Features

Frequency Range

The model 3180C covers the traditional frequency range for EMC measurements. Additionally, the 3180C covers all of the VHF and UHF bands, making it ideal for spectrum monitoring of FM, TV and some cellular phones. With the small cone elements in place, the 3180C can be used up to 3 GHz.

Radiation Pattern

The model 3180C has been designed to have a radiation pattern that is omnidirectional. The elements have been optimized to avoid any splitting of the main radiation beam in the elevation cut.

Flexible Mounting System

The model 3180C antenna includes both an EMCO block mount and a rear "stinger" mount.

Specifications

Electrical Specifications

Model	Frequency Range	VSWR Ratio (Average)	Maximum Continuous Power	Impedance (Nominal)	Connectors	Pattern Type	Polarization
3180C (Cage Elements)	30 MHz to 1 GHz	~3:1	250mW	50 Ω	Type N (f)	Omnidirectional	Linear
3180C (Cone Elements)	30 MHz to 3 GHz	~3:1	250mW	50 Ω	Type N (f)	Omnidirectional	Linear

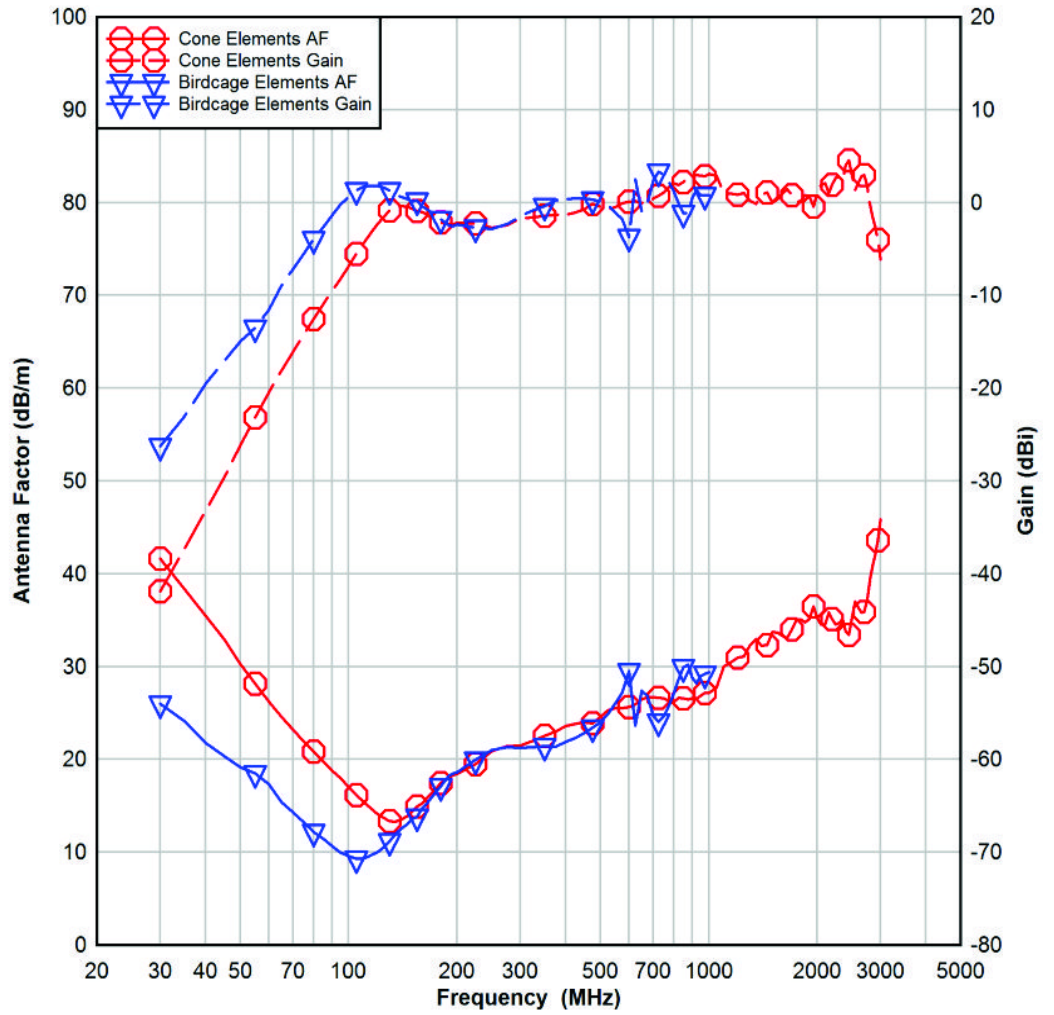
Physical Specifications

	Model 3180C, Cage Elements
Width (Element, tip-to-tip):	64.9 cm 25.5 in
Length:	72.4 cm 28.5 in
Diameter:	40.0 cm 15.7 in
	Model 3180C, Conical Elements
Width (Element, tip-to-tip):	37.5 cm 14.8 in
Length:	71.71 cm 28.2 in
Diameter:	39.1 cm 15.4 in

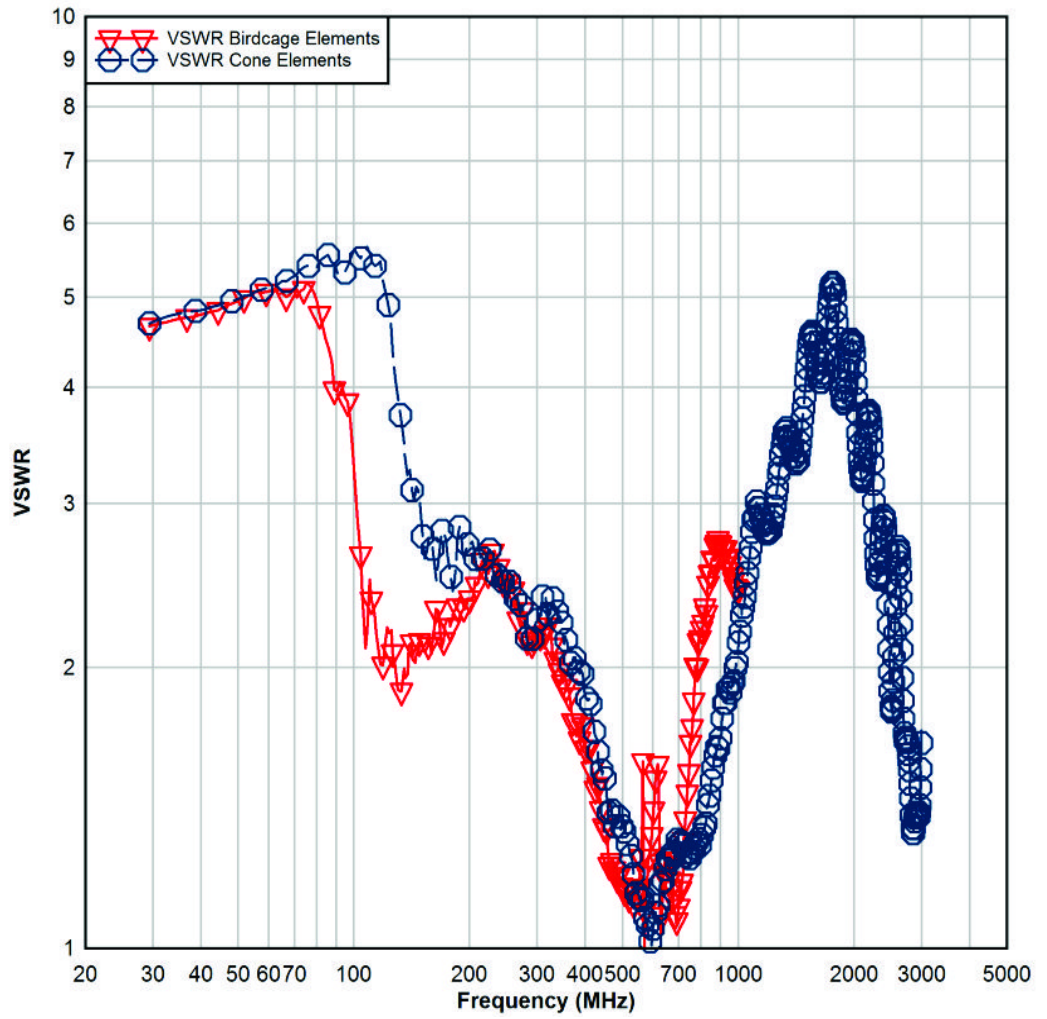
Other Specifications

- **Antenna Includes:**
 - Balun
 - One Pair of Cage Elements
 - One Pair of Cone Elements
- Individually Calibrated. Actual factors and a signed Certificate of Calibration Conformance included.
- Manual

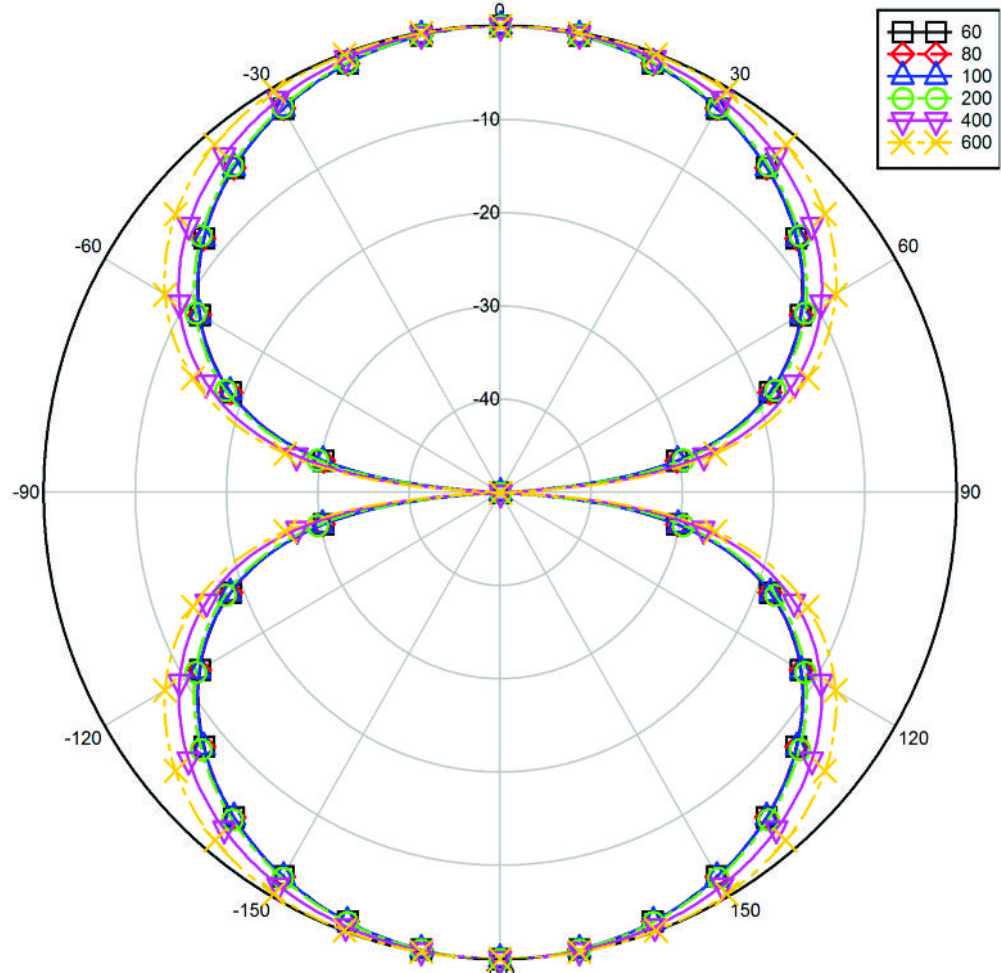
**3180C
Mini Bi-Con
Antenna Factor
and Gain
Both Elements**



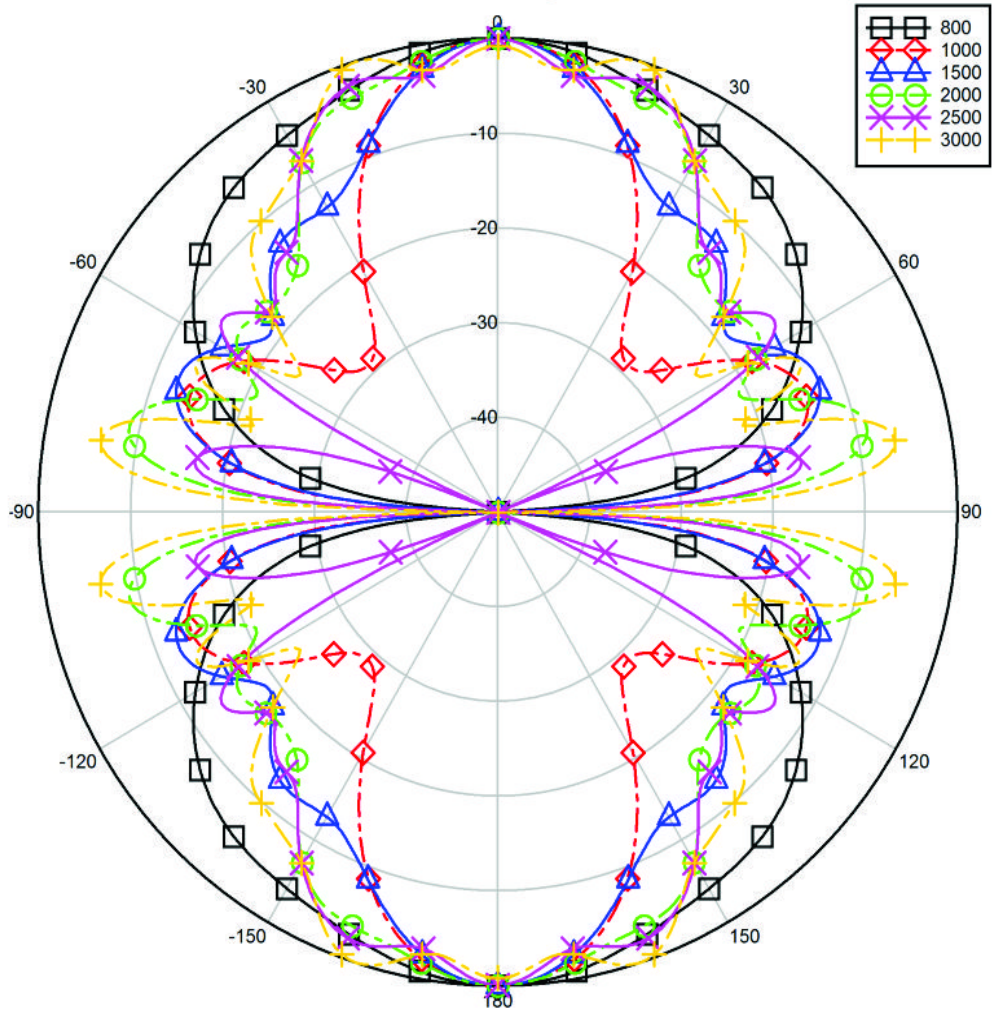
**3180C
Mini Bi-Con
VSWR
Both Elements**



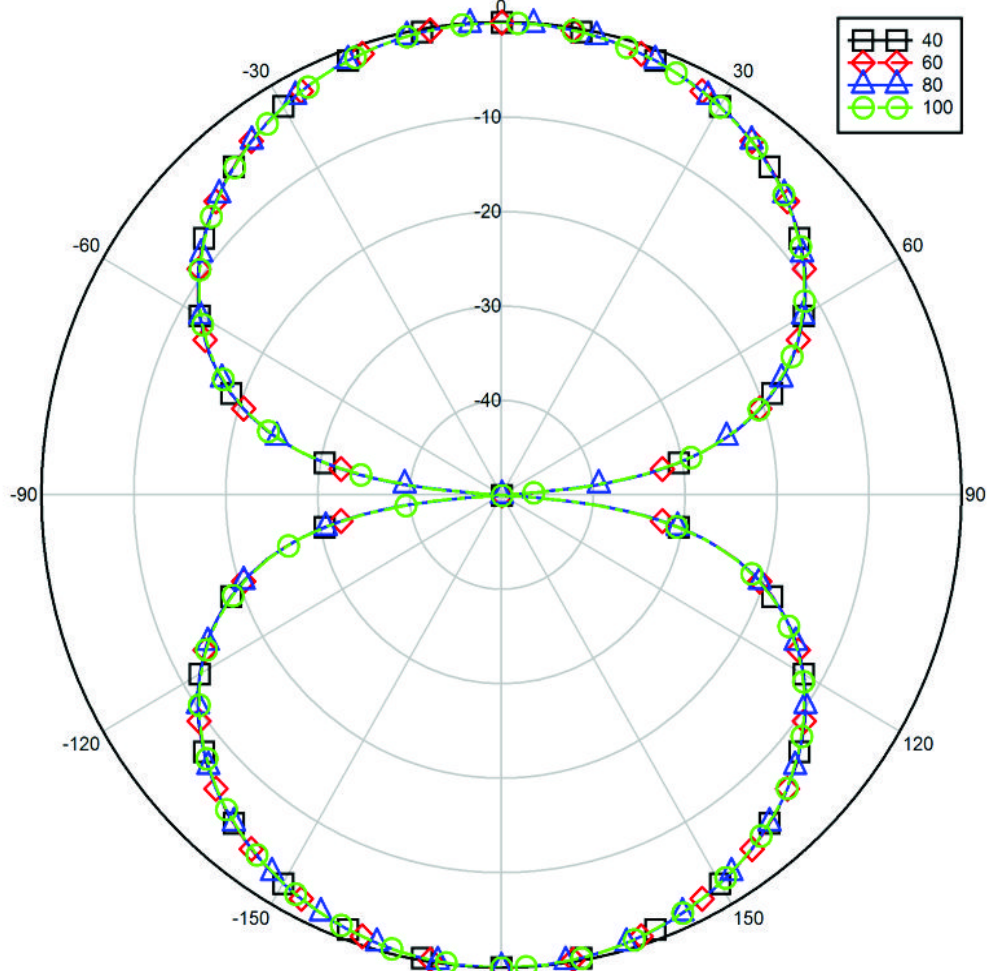
**3180C
Mini Bi-Con
E-Plane Pattern
Cone Elements
60 MHz to 600 MHz**



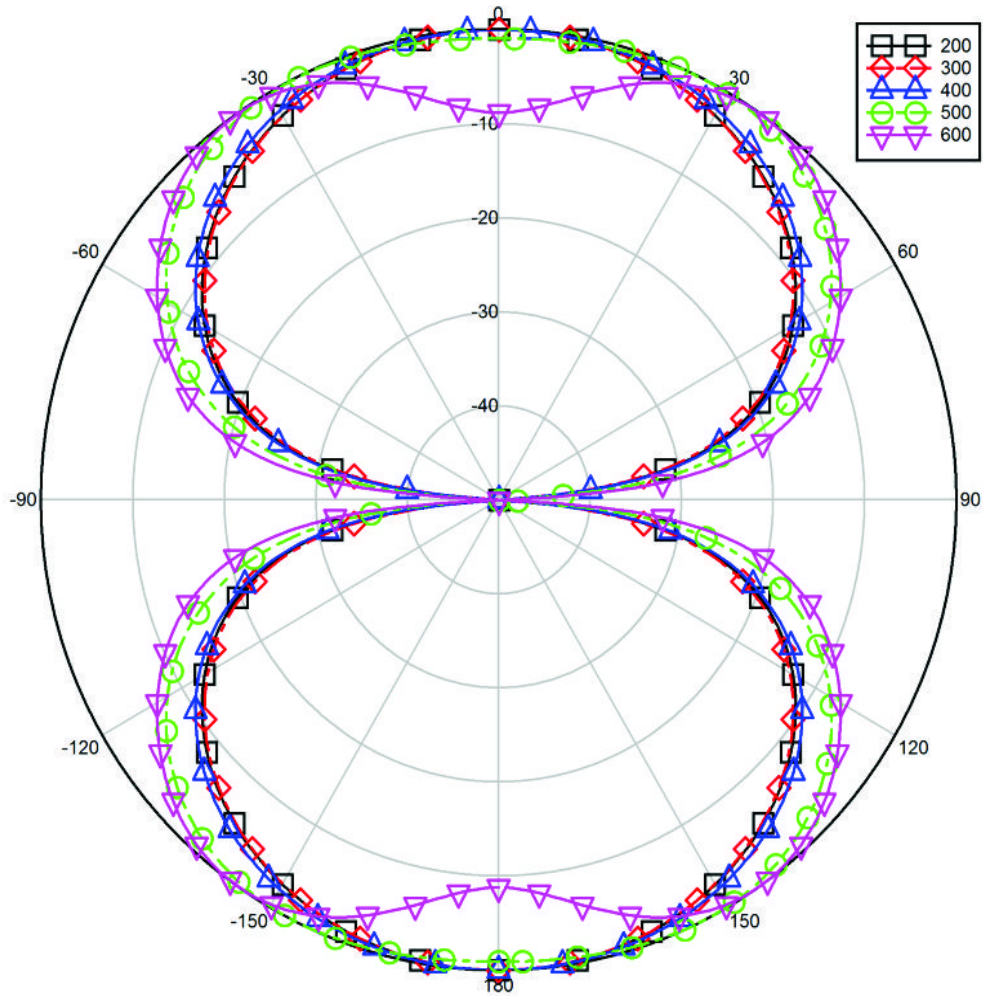
**3180C
Mini Bi-Con
E-Plane Pattern
Cone Elements
800 MHz to 3000 MHz**



**3180C
Mini Bi-Con
E-Plane Pattern
Birdcage Elements
40 MHz to 100 MHz**



**3180C
Mini Bi-Con
E-Plane Pattern
Birdcage Elements
200 MHz to 600 MHz**



**3180C
Mini Bi-Con
E-Plane Pattern
Birdcage Elements
700 MHz to 1000 MHz**

