COM-POWER CORPORATION

Log Periodic Antenna
AL-100

Features

Broadband - 300 MHz - 1000 MHz

Transmitting and Receiving Applications

Individual Calibration

Two Year Warranty

Description

The Log Periodic antenna Model AL-100 is a broadband antenna for use in the 300-1000 MHz frequency band. This antenna can be used for EMC emissions measurements and also for immunity testing. The antenna is constructed with light weight aluminum with corrosion resistant conductive coating.

Each antenna is individually calibrated. The calibration data is provided with each antenna to maximize measurement accuracy. The AL-100 can transmit up to 50 W of continuous power for transmit applications.

The fiber glass mounting base allows the antenna to be mounted in vertical or horizontal polarizations. The mounting base also has a 1/4 inch x 20 threads. This enables the antenna to be attached to an antenna tripod such as model AT-100 tripod.

The AL-100 can also be mounted on an antenna mast. The antenna has a two year warranty.

Application

The AL-100 Log Periodic antenna is used for emission and immunity testing to verify compliance for FCC, CE and MIL-STD 461 specifications.

Log Periodic antennas allow quick sweep measurements without a band break. This feature makes it convenient to use the Log Periodic antenna with a automated emissions or immunity measurement system. The size of the antenna also allows it to be used in a small area like a shield room.

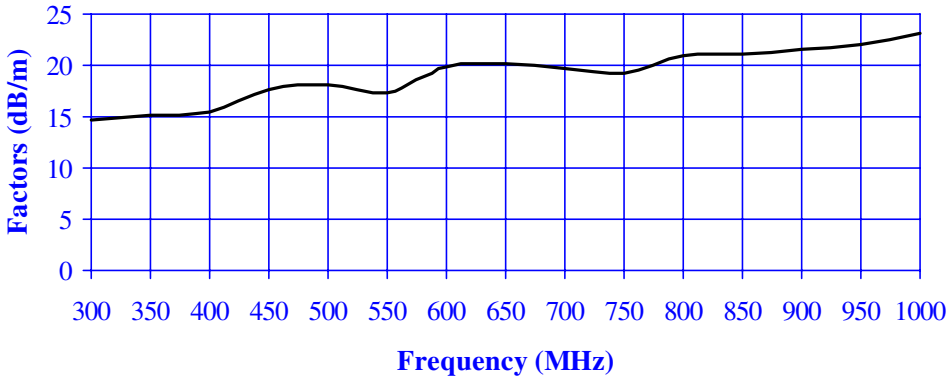
The Log Periodic antenna was designed to get a smooth response curve for the antenna factors to minimize measurement errors.

The calibration data provided with each antenna is used to calculate field strength measured for the selected frequency. The antenna factor (dB/m) for the selected frequency is added to the measured output (dBV) displayed by the EMI meter to obtain field strength (dBV/m).

Specifications

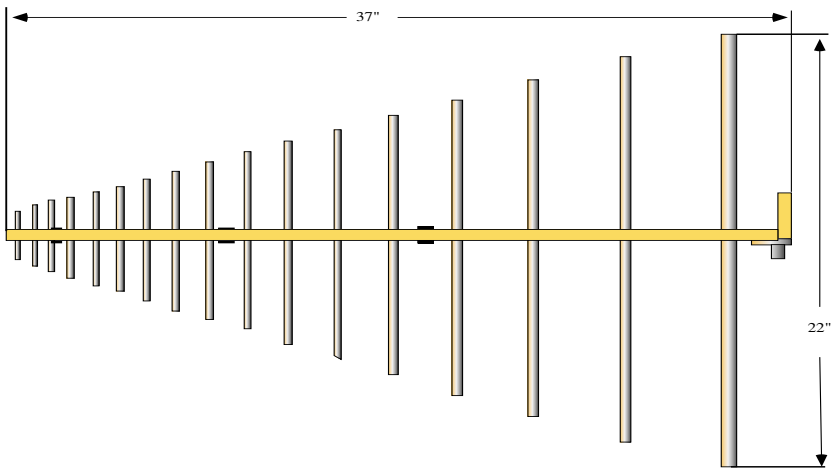
Frequency Range:	300 MHz - 1000 MHz
Continuous Power (CW):	50 Watts
Polarization:	Linear
Impedance:	50 Ohms
Connector:	BNC Female
Width:	22 inches (at the widest Point)
Length:	37 inches
Weight:	4 lbs. max.

Typical Antenna Factor:



Field strength (dB/m) = Output measured (dBV) + Antenna Factor (dB/m)

Mechanical Outline:



All values are typical, unless specified.
All specifications are subject ot change without notice.