

Moxon Antennas for 144.0 MHz to 148.0 MHz

L.B. Cebik W4RNL (the antenna guru) describes the moxon as “. . . a parasitic 2-element array with the ends of each element folded back towards each other for additional coupling. The result is a beam with a very broad beamwidth and a very high front-to-back ratio, with a gain similar to that of a standard 2-element Yagi.” The diagram below shows the layout of a Moxon antenna. More information and a dimension calculator are available at <http://www.cebik.com/moxon/moxpage.html>

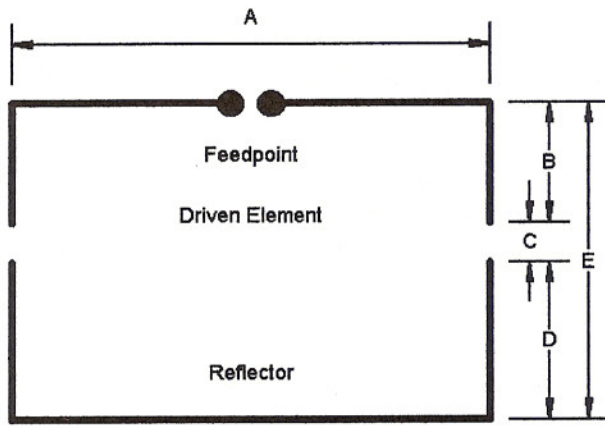


Figure 5

Moxon Rectangle Outlines

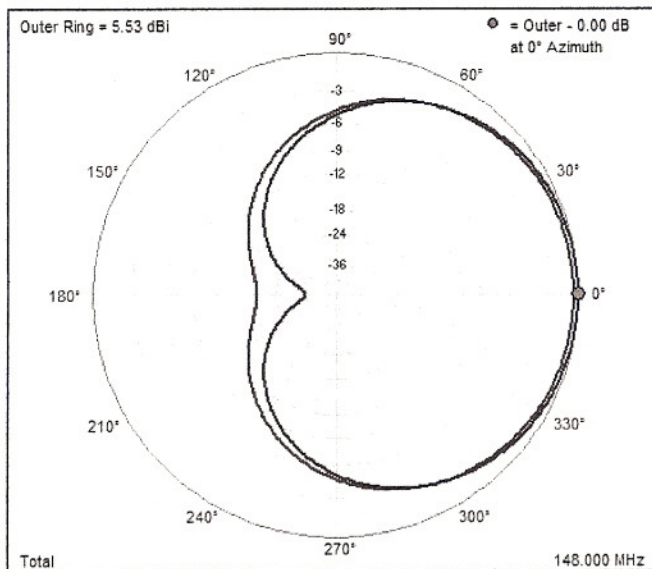
For 146.52 MHz with bare copper #10 wire, the applicable dimensions are as follows:

A =	29.07 inches or	738.31 mm
B =	4.03	102.43
C =	1.17	29.69
D =	5.54	140.74
E =	10.74	272.85

With #14 wire the dimensions are:

A =	29.37	745.91
B =	4.13	104.92
C =	1.12	28.49
D =	5.58	141.79
E =	10.84	275.21

Information about a 2 m vertical made of #6 ground wire can be found at this link:
<http://www.moxonantennaproject.com/wb5cxc/wb5cxc.htm>
 The author claims the following performance for the antenna:



The inner line is the design performance at 146 MHz while the outer line is at 148 MHz.

