

AMATEUR RADIO • HF ANTENNA ENGINEERING

## Maximum-Efficiency Magnetic Loop Antenna

3.0 m Diameter • 7/8" Type L Copper Tube • Vacuum Variable Capacitor • 100 W PEP

RADIATION PATTERN ANALYSIS

DETAILED PERFORMANCE DATA

**Magnetic Loop Antenna — 80 m & 40 m Maximum Efficiency Design**

Based on standard small-loop theory (Kraus, *Antennas*; Straw, *ARRL Antenna Book*).

All values are theoretical — actual performance depends on construction quality and environment.

[github.com/Asteriskman2020/Magnetic-Loop-Antennas](https://github.com/Asteriskman2020/Magnetic-Loop-Antennas)