

Multilayer Air Core Inductance Formula

The Multilayer Air Core Inductance formula is:

$$L \{uH\} = \frac{31.6 * N^2 * r1^2}{6*r1 + 9*L + 10*(r2-r1)}$$

L{uH} = Inductance in microHenries

N² = Total Number of turns on coil Squared

r1 = Radius of the inside of the coil {meters}

r2 = Radius of the outside of the coil {meters}

L = Length of the coil {meters}