



Bourns Releases Air Coil Inductors

Model AC4842R Series

Riverside, California – November 9, 2023 – Bourns Magnetics Product Line is introducing the new [Model AC4842R Air Coil Inductor Series](#). This new Model AC4842R Series has a high Q value of at least 100 with inductance from 22 to 120 nH. These components are epoxy covered for mechanical stability and their surface mount design is well suited for pick and place processes.

The AC4842R models have tight tolerances with DC resistance from 4.2 to 17.3 milliohms max., and the maximum rated current is from 1.5 to 3.5 A. This Model AC4842R Series is designed to be used in high frequency TV and radio receivers, radio transmitters, and RF amplifier and tuning applications. These components are RoHS compliant* with an operating temperature range of -25 to +125 °C.

Model AC4842R Series Specifications:

Bourns Part Number	Inductance (nH) ±10 %	Q Min.	Test Frequency (MHz)	DC Resistance (mΩ) Max.	SRF (GHz) Min.	Rated Current (A) Max.
AC4842R-22NK	22	100	150	4.2	3.2	3.0
AC4842R-27NK	27	100	150	4.0	2.7	3.5
AC4842R-33NK	33	100	150	4.8	2.5	3.0
AC4842R-39NK	39	100	150	4.4	2.1	3.0
AC4842R-47NK	47	100	150	5.6	2.1	3.0
AC4842R-56NK	56	100	150	6.2	1.5	3.0
AC4842R-68NK	68	100	150	8.2	1.5	2.5
AC4842R-82NK	82	100	150	9.4	1.3	2.5
AC4842R-R10K	100	100	150	12.3	1.2	1.7
AC4842R-R12K	120	100	150	17.3	1.1	1.5

(Continued)

IC23109

Samples and production quantities are now available.

For additional details on Bourns® Air Coil Inductors, visit the Bourns website at www.bourns.com/products/magnetic-products/air-coil-inductors

If you have questions or need additional information, please feel free to contact [Bourns Customer Service / Inside Sales](#).

Features

- High Q value, self-resonant frequency
- Tight tolerance
- Epoxy cover for mechanical stability and pick & place processes
- Surface mount
- RoHS compliant*

Applications

- High frequency TV and radio receivers
- Radio transmitters
- RF amplifiers
- Tuning applications

* RoHS Directive 2015/863, Mar 31, 2015 and Annex.