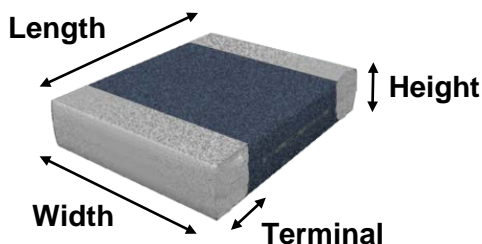


TDK Thin Film Power inductor TFM201210ALC series

FEATURES

- The package size of TFM2012 is L2.0mm x W1.25mm.
- The thickness of this product is 1.0mm, and it is very thin compared with other same kind of products.
- This product consists of original fine copper pattern with micro-processing technology .
- The coil pattern is coated with metal magnetic material.
- Superior DC-Bias characteristics .
- This product corresponds to ROHS.

PRODUCTS SHAPE



OPERATING TEMPERATURE RANGE

-40 ~ 125 deg.C
(Include self temperature rise 40 deg.C)

DIMENSIONS

	Length ±0.2 [mm]	Width ±0.2 [mm]	Height Max. [mm]	Terminal Ref. [mm]
TFM201210ALC	2.0	1.25	1.0	0.5

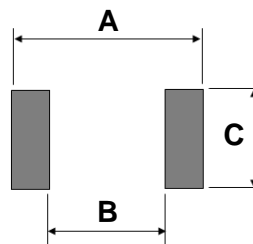
PRODUCT IDENTIFICATIONS

TFM 2012 10 ALC – R47 M T AA

(1) (2) (3) (4) (5) (6) (7) (8)

- (1) Series name
- (2) Product size (Length , Width)
- (3) Product height
- (4) Product identification
- (5) Inductance value (R47 : 0.47μH)
- (6) Inductance tolerance (M : ±20%)
- (7) Packing style (T : Taping)
- (8) Control mark

RECOMMENDED RAND PATTERN



	A [mm]	B [mm]	C [mm]
TFM201210ALC	2.4	1.2	1.25

ELECTRICAL CHARACTERISTICS

Identification	Inductance [μH]	Test frequency [MHz]	DC Resistance [mOhm]		Rated current			
			Max	Typ.	Isat [A]		Itemp [A]	
					Max	Typ.	Max	Typ.
TFM201210ALC-R11MTAA (Mass Production Stage)	0.11 +/-20%	1.0	12	9	7.0	8.0	6.8	7.5
TFM201210ALC-R47MTAA (Sampling Stage)	0.47 +/-20%	1.0	32	29	4.0	4.4	3.7	4.2
TFM201210ALC-1R0MTAA (Sampling Stage)	1.0 +/-20%	1.0	78	71	2.8	3.0	2.4	2.7

Isat : Depend on the Inductance Saturation. (-30% Reduction from Initial L Value/ Test Freq. 1MHz)

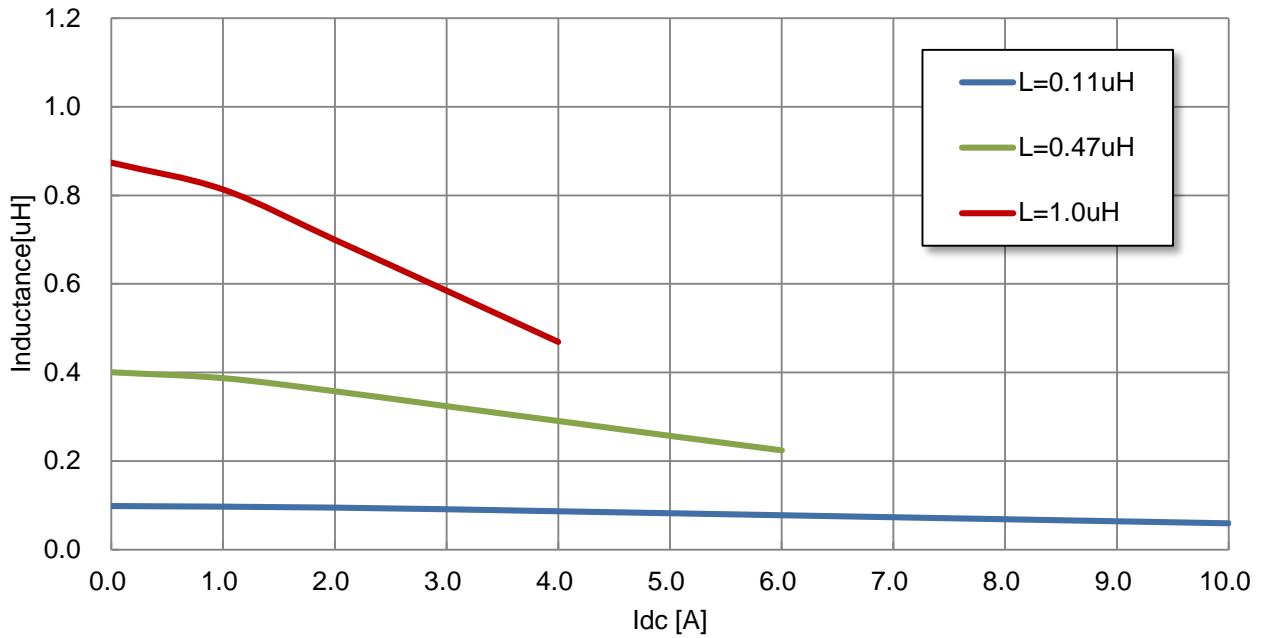
Itemp : Depend on the Self Temperature Rise. (40deg.C Typ.)

Rated Current: The less value which is Isat Max or Itemp Max.

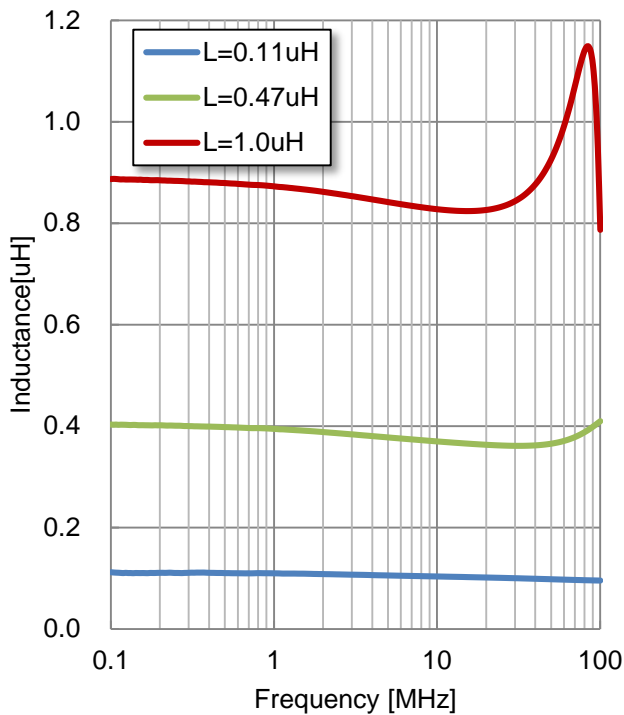
**This product is under development. This document is subjected to change specifications without notice.*

TDK Thin Film Power inductor TFM201210ALC series

Inductance - DC Bias



Inductance - Frequency



Resistance - Frequency

