

## Molded Shielded Inductors, Axial Leads, High Frequency and Noise Suppression Applications



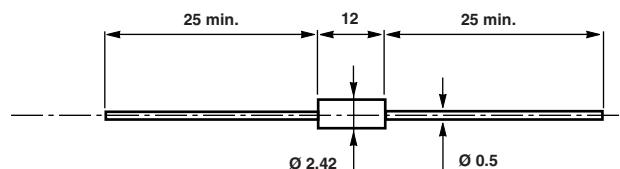
These inductors have copper winding on magnetic core structure.

### FEATURES

- Depending on inductance value core is either iron powder or ferrite
- Shielding gives a 3 % coupling limitation between two inductors
- Material categorization: For definitions of compliance please see [www.vishay.com/doc?99912](http://www.vishay.com/doc?99912)


**RoHS**  
COMPLIANT

### DIMENSIONS in millimeters ( $\pm 0.5$ )



### STANDARD ELECTRICAL SPECIFICATIONS

MODEL	INDUCTANCE RANGE $\mu\text{H}$	RATED POWER $P_{70^\circ\text{C}}$ W	LIMITING ELEMENT VOLTAGE $\text{V}_{\text{RMS}}$	TOLERANCE <sup>(1)</sup> $\pm \%$	Q RANGE	I RANGE mA
TRB023	0.1 to 1200	300	500	10	35 to 55	110 to 4300

### MECHANICAL SPECIFICATIONS

Coating	Molded epoxy compound
Weight	1.3 g

### PACKAGING

Standard: Tape and reel 500 pieces, code R10 (R)  
On request: 250 pieces tape in box "ammopack", code A15 (B)

### ENVIRONMENTAL SPECIFICATIONS

Operating temperature range	+ 70 °C
Temperature limits	- 55 °C + 125 °C

### MARKING

Standard:  
Print marked-manufacturer, inductance value, tolerance

### ORDERING INFORMATION (Part Number)

T	R	B	0	2	3	4	R	7	K	A	1	5			
MODEL			STYLE			VALUE			TOLERANCE			PACKAGING			
TRB			023			From 1 $\mu\text{H}$ to 1200 $\mu\text{H}$			K: $\pm 10\%$ On request: G: $\pm 2\%$ J: $\pm 5\%$			R10 = Reel 500 pieces On request: A15 = Ammopack 250 pieces			
4R7 = 4.7 $\mu\text{H}$												Special code given by Vishay			

### PART NUMBER DESCRIPTION (for information only)

TRB	023	4 $\mu\text{H}$ 7	10 %	B		e1
MODEL	STYLE	VALUE	TOLERANCE	PACKAGING	SPECIAL	LEAD (Pb)-FREE

STANDARD VALUES						
INDUCTANCE VALUE µH	TOLERANCE %	Q MIN.	TEST FREQUENCY MHz	RESISTANCE MAX. Ω	SRF MIN. MHz	I MAX. mA
0.10	± 10 %	40	25	0.008	250	4300
0.12	± 10 %	40	25	0.010	250	3880
0.15	± 10 %	40	25	0.025	250	3440
0.18	± 10 %	40	25	0.030	250	3160
0.22	± 10 %	40	25	0.036	250	2880
0.27	± 10 %	40	25	0.045	250	2680
0.33	± 10 %	35	25	0.065	250	2110
0.39	± 10 %	35	25	0.075	250	2000
0.47	± 10 %	35	25	0.10	230	1730
0.56	± 10 %	35	25	0.13	220	1620
0.68	± 10 %	35	25	0.20	195	1220
0.82	± 10 %	35	25	0.26	180	1070
1	± 10 %	35	25	0.06	145	1210
1.2	± 10 %	35	7.9	0.08	135	1930
1.5	± 10 %	35	7.9	0.10	118	1730
1.8	± 10 %	35	7.9	0.12	110	1580
2.2	± 10 %	35	7.9	0.14	100	1460
2.7	± 10 %	35	7.9	0.16	85	1360
3.3	± 10 %	35	7.9	0.22	75	1160
3.9	± 10 %	35	7.9	0.25	70	1090
4.7	± 10 %	35	7.9	0.30	63	1000
5.6	± 10 %	35	7.9	0.62	58	755
6.8	± 10 %	35	7.9	0.70	54	655
8.2	± 10 %	35	7.9	0.82	48	605
10	± 10 %	35	7.9	0.90	45	575
12	± 10 %	40	2.5	0.85	40	560
15	± 10 %	40	2.5	0.72	36	545
18	± 10 %	40	2.5	0.82	32	605
22	± 10 %	40	2.5	0.96	28	680
27	± 10 %	40	2.5	1.1	25	620
33	± 10 %	40	2.5	1.2	22	600
39	± 10 %	40	2.5	1.8	20	408
47	± 10 %	40	2.5	2	18	386
56	± 10 %	40	2.5	2.2	17	362
68	± 10 %	40	2.5	2.5	16	348
82	± 10 %	40	2.5	3.6	11	290
100	± 10 %	35	2.5	3	10	300
120	± 10 %	35	0.79	3.5	9	290
150	± 10 %	40	0.79	4.1	8	270
180	± 10 %	40	0.79	4.4	6.5	260
220	± 10 %	45	0.79	4.9	5.2	245
270	± 10 %	45	0.79	6.4	5	215
330	± 10 %	40	0.79	7.4	4.8	205
390	± 10 %	40	0.79	8	4.3	195
470	± 10 %	55	0.79	12	4	155
560	± 10 %	50	0.79	13.8	3.5	145
680	± 10 %	45	0.79	16	3.3	140
820	± 10 %	40	0.79	16.5	3.1	135
1000	± 10 %	35	0.79	23	2.9	115
1200	± 10 %	35	0.25	27	2.5	110

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