

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



# Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China









www.vishay.com

Vishay Dale

## Inductors, Subminiature, Shielded, Radial Leaded



#### **ELECTRICAL SPECIFICATIONS**

Inductance tolerance: ± 10 %

Dielectric strength: 840 V<sub>RMS</sub> at sea level

Working voltage: 300 V<sub>DC</sub>

Q and SRF values: minimum not less than 80 % of specified

value

Maximum current: based on temperature rise not to

exceed 35 °C at +90 °C ambient

#### **MECHANICAL SPECIFICATIONS**

Operating temperature: -55 °C to +125 °C

Terminal pull: 3 pounds

#### **FEATURES**

• Classification is grade 1, class B





 Custom values up to 100 000 µH are available upon request

 Printed board mounting facilitated by 0.200" [5.08 mm] grid spacing

- · Radial lead fixed inductor
- · High Q values
- Unitized epoxy-molded construction
- Shielded construction to allow maximum density packaging
- Material categorization: for definitions of compliance please see www.vishay.com/doc?99912

#### **DENSITY SPECIFICATIONS**

Weight: 1.5 g maximum

Shielding: 3 % coupling maximum when two units are

tested side by side

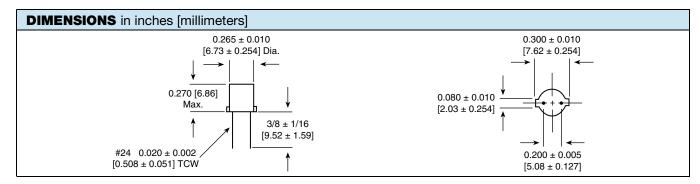
#### **ENVIRONMENTAL SPECIFICATIONS**

Moisture: per MIL-STD-202, method 106

**Vibration:** low frequency, 10 Hz to 55 Hz at 0.06" [1.52 mm] maximum total excursion at rate of 1 linear sweep per minute for 2 h repeated for each of three mutually

perpendicular planes

Shock: 100 g, 6 ms, body mounted



STANDARD ELECTRICAL SPECIFICATIONS								
MODEL	IND. (µH)	TOL. (%)	Q NOM.	TEST FREQ. (MHz)	SRF NOM. (MHz)	DCR MAX. (Ω)	RATED DC CURRENT (mA)	INCREMENTAL CURRENT (mA) <sup>(1)</sup>
PC	0.10	± 10	70	25	> 250	0.030	2500	2500
PC	0.12	± 10	70	25	> 250	0.030	2500	2500
PC	0.15	± 10	70	25	> 250	0.030	2500	2500
PC	0.18	± 10	70	25	> 250	0.035	2400	2400
PC	0.22	± 10	70	25	> 250	0.038	2300	2300
PC	0.27	± 10	80	25	> 250	0.040	2200	2200
PC	0.33	± 10	80	25	> 250	0.040	2200	2200
PC	0.39	± 10	80	25	250	0.045	2100	2100
PC	0.47	± 10	80	25	230	0.045	2100	2100

Note

(1) Incremental current: The DC current required to cause a 5 % reduction in the nominal inductance value.



www.vishay.com

Vishay Dale

STANDARD ELECTRICAL SPECIFICATIONS								
MODEL	IND. (μH)	TOL. (%)	Q NOM.	TEST FREQ. (MHz)	SRF NOM. (MHz)	DCR MAX. (Ω)	RATED DC CURRENT (mA)	INCREMENTAL CURRENT (mA) <sup>(1)</sup>
PC	0.56	± 10	80	25	220	0.050	2000	2000
PC	0.68	± 10	80	25	190	0.055	1900	1900
PC	0.82	± 10	85	25	180	0.060	1800	1800
PC	1.0	± 10	85	25	160	0.070	1700	1700
PC	1.2	± 10	90	7.9	170	0.085	1670	1670
PC	1.5	± 10	100	7.9	155	0.100	1540	1540
PC	1.8	± 10	115	7.9	135	0.110	1470	1470
PC	2.2	± 10	110	7.9	120	0.120	1410	1410
PC	2.7	± 10	110	7.9	104	0.125	1380	1380
PC	3.3	± 10	90	7.9	93	0.165	1200	1200
PC	3.9	± 10	90	7.9	87	0.180	1135	1135
PC	4.7	± 10	95	7.9	79	0.245	985	985
PC	5.6	± 10	95	7.9	72	0.265	950	950
PC	6.8	± 10	85	7.9	63	0.330	853	853
PC	8.2	± 10	95	7.9	60	0.460	720	720
PC	10	± 10	90	7.9	54	0.640	620	620
PC	12	± 10	120	2.5	37	0.800	545	545
PC	15	± 10	120	2.5	28.8	0.865	520	520
PC	18	± 10	115	2.5	23.8	0.940	504	504
PC	22	± 10	125	2.5	21.3	1.03	460	460
PC	27	± 10	115	2.5	20.6	1.18	418	418
PC	33	± 10	120	2.5	18.6	1.30	398	398
PC	39	± 10	120	2.5	17.7	1.41	385	385
PC	47	± 10	110	2.5	14.9	1.61	350	350
PC	56	± 10	115	2.5	13.9	2.08	330	333
PC	68	± 10	105	2.5	12.9	2.20	320	330
PC	82	± 10	105	2.5	11.7	2.42	300	320
PC	100	± 10	95	2.5	10.5	2.15	333	300
PC	120	± 10	95	0.79	5.6	2.38	316	190
PC	150	± 10	90	0.79	5.2	2.52	306	175
PC	180	± 10	95	0.79	4.9	2.88	288	150
PC	220	± 10	95	0.79	4.6	3.18	273	125
PC	270	± 10	100	0.79	4.2	3.50	260	120
PC	330	± 10	100	0.79	3.55	4.80	222	110
PC	390	± 10	100	0.79	3.45	5.44	209	105
PC	470	± 10	100	0.79	3.2	5.9	201	100
PC	560	± 10	95	0.79	2.9	6.3	194	90
PC	680	± 10	100	0.79	2.7	7.2	181	80
PC	820	± 10	90	0.79	2.5	8.0	172	70
PC	1000	± 10	100	0.79	2.35	12	141	65

#### Note

<sup>(1)</sup> Incremental current: The DC current required to cause a 5 % reduction in the nominal inductance value.

MARKING		
- Manufacturer da	data printed	

ORDERING INFORMATION							
PC	0.10 μΗ	10 %	EB	e2			
MODEL	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	PACKAGE CODE	JEDEC® LEAD (Pb)-FREE STANDARD			

GLOBAL PART NUMBER			
P C 9	ЕВ	R 1 0	K
MODEL	PACKAGE CODE	INDUCTANCE VALUE	INDUCTANCE TOLERANCE



## **Legal Disclaimer Notice**

Vishay

### **Disclaimer**

ALL PRODUCT, PRODUCT SPECIFICATIONS AND DATA ARE SUBJECT TO CHANGE WITHOUT NOTICE TO IMPROVE RELIABILITY, FUNCTION OR DESIGN OR OTHERWISE.

Vishay Intertechnology, Inc., its affiliates, agents, and employees, and all persons acting on its or their behalf (collectively, "Vishay"), disclaim any and all liability for any errors, inaccuracies or incompleteness contained in any datasheet or in any other disclosure relating to any product.

Vishay makes no warranty, representation or guarantee regarding the suitability of the products for any particular purpose or the continuing production of any product. To the maximum extent permitted by applicable law, Vishay disclaims (i) any and all liability arising out of the application or use of any product, (ii) any and all liability, including without limitation special, consequential or incidental damages, and (iii) any and all implied warranties, including warranties of fitness for particular purpose, non-infringement and merchantability.

Statements regarding the suitability of products for certain types of applications are based on Vishay's knowledge of typical requirements that are often placed on Vishay products in generic applications. Such statements are not binding statements about the suitability of products for a particular application. It is the customer's responsibility to validate that a particular product with the properties described in the product specification is suitable for use in a particular application. Parameters provided in datasheets and / or specifications may vary in different applications and performance may vary over time. All operating parameters, including typical parameters, must be validated for each customer application by the customer's technical experts. Product specifications do not expand or otherwise modify Vishay's terms and conditions of purchase, including but not limited to the warranty expressed therein.

Except as expressly indicated in writing, Vishay products are not designed for use in medical, life-saving, or life-sustaining applications or for any other application in which the failure of the Vishay product could result in personal injury or death. Customers using or selling Vishay products not expressly indicated for use in such applications do so at their own risk. Please contact authorized Vishay personnel to obtain written terms and conditions regarding products designed for such applications.

No license, express or implied, by estoppel or otherwise, to any intellectual property rights is granted by this document or by any conduct of Vishay. Product names and markings noted herein may be trademarks of their respective owners.

Revision: 13-Jun-16 1 Document Number: 91000

# **Mouser Electronics**

**Authorized Distributor** 

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

## Vishay:

PC9FJ181K PC9EBR10K PC9EB1R0K PC9FJ101K