

VUP Series

Features

- 6.3 ϕ ~ 10 ϕ , 125°C, 2,000 ~ 3,000 hours assured
- Low impedance capacitors
- Chip type high temperature range, for +125°C use
- For automobile modules and other high temperature applications
- RoHS compliance

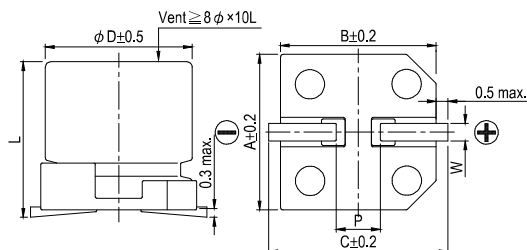


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Specifications

Items	Performance												
Category Temperature Range	-40°C ~ +125°C												
Capacitance Tolerance	±20% (at 120 Hz, 20°C)												
Leakage Current (at 20°C)	$I = 0.01CV$ or $3(\mu A)$ whichever is greater (after 2 minutes) Where, C = rated capacitance in μF , V = rated DC working voltage in V												
Tan δ (at 120 Hz, 20°C)	<table border="1"> <thead> <tr> <th>Rated Voltage</th> <th>10</th> <th>16</th> <th>25</th> <th>35</th> </tr> </thead> <tbody> <tr> <td>Tanδ (max)</td> <td>0.30</td> <td>0.23</td> <td>0.18</td> <td>0.16</td> </tr> </tbody> </table>	Rated Voltage	10	16	25	35	Tan δ (max)	0.30	0.23	0.18	0.16		
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Low Temperature Characteristics (at 120 Hz)	<p>Impedance ratio shall not exceed the values given in the table below.</p> <table border="1"> <thead> <tr> <th colspan="2">Rated Voltage</th> <th>10</th> <th>16</th> <th>25</th> <th>35</th> </tr> </thead> <tbody> <tr> <td>Impedance Ratio</td> <td>Z(-40°C)/Z(+20°C)</td> <td>12</td> <td>8</td> <td>6</td> <td>4</td> </tr> </tbody> </table>	Rated Voltage		10	16	25	35	Impedance Ratio	Z(-40°C)/Z(+20°C)	12	8	6	4
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Diagram of Dimensions



Lead Spacing and Diameter

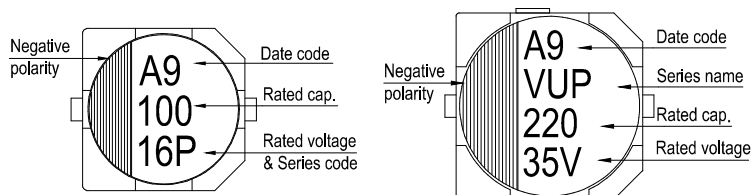
Unit: mm

ϕD	L	A	B	C	W	P ± 0.2
6.3	7.7 ± 0.3	6.6	6.6	7.2	0.5 ~ 0.8	2.0
8	10 ± 0.5	8.3	8.3	9.0	0.7 ~ 1.1	3.1
10	10 ± 0.5	10.3	10.3	11.0	0.7 ~ 1.3	4.7

Marking

$\phi D = 6.3$ mm

$\phi D = 8 \sim 10$ mm





Dimension: $\phi D \times L$ (mm)
 Ripple Current: mA/rms at 100k Hz, 125°C
 Impedance: Ω / at 100k Hz, 20°C

Dimension and Permissible Ripple Current

Rated Volt. (V _{DC})		10V (1A)			16V (1C)			25V (1E)			35V (1V)		
Cap. (μ F)	Contents	$\phi D \times L$	Imp.	mA	$\phi D \times L$	Imp.	mA	$\phi D \times L$	Imp.	mA	$\phi D \times L$	Imp.	mA
33	330										6.3×7.7	0.5	197
47	470										6.3×7.7 8×10	0.5 0.2	197 270
100	101				6.3×7.7 8×10	0.5 0.2	197 270	6.3×7.7 8×10	0.5 0.2	197 270	8×10	0.2	270
220	221	8×10	0.2	270	8×10	0.2	270	8×10 10×10	0.2 0.15	270 500	10×10	0.15	500
330	331	8×10 10×10	0.2 0.15	270 500	10×10	0.15	500	10×10	0.15	500			
470	471	10×10	0.15	500	10×10	0.15	500						

Part Numbering System

VUP series	100 μ F	$\pm 20\%$	16V	Carrier Tape	6.3 ϕ × 7.7L	Pb-free and Coated Case
VUP	101	M	1C	TR	-	0607
Series name	Capacitance	Capacitance Tolerance	Rated Voltage	Package Type	Terminal Type	Case Size
						Lead Wire and Case Type

Note: For more details, please refer to "Part Numbering System (SMD Type)" on page 15.