

# ALUMINUM ELECTROLYTIC CAPACITORS



## PC series Axial Lead Type T

Smaller-sized Electrolytic Capacitor for Use Over Wide Temperature Range (-40~+105°C)

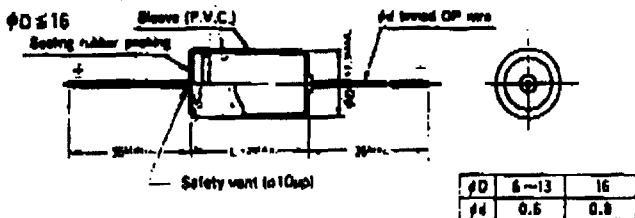
- The PC series is designed for use over a wide temperature range of -40°C~+105°C and features the same case sizes as the LB series on most ratings.
- This high reliability series is ideally suited for use in consumer electronic, communication and automotive applications.
- The Nichicon Safety Vent is standard on capacitors with diameters  $\geq 10$ mm.



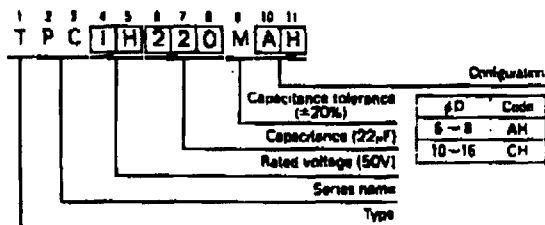
### Specifications

Item	Performance Characteristics																										
Operating Temperature Range	-40~+105°C																										
Voltage Range	6.3-100V																										
Capacitance Range	0.47-10000 $\mu$ F																										
Capacitance Tolerance	$\pm 20\%$ at 120 Hz, 20°C																										
Leakage Current	After 1 minute of application of rated voltage, leakage current will be no more than 0.03CV or 4 $\mu$ A, whichever is greater.																										
Dissipation Factor (tan $\delta$ )	For capacitance of more than 1000 $\mu$ F, add 0.02 for every increase of 1000 $\mu$ F. Measurement frequency: 120 Hz, Temperature: 20°C																										
	<table border="1"> <thead> <tr> <th>Rated voltage (V)</th> <th>6.3</th> <th>10</th> <th>16</th> <th>25</th> <th>35</th> <th>50</th> <th>63</th> <th>100</th> </tr> </thead> <tbody> <tr> <td>tan <math>\delta</math> (MAX.)</td> <td>0.24</td> <td>0.21</td> <td>0.18</td> <td>0.16</td> <td>0.14</td> <td>0.12</td> <td>0.10</td> <td>0.08</td> </tr> </tbody> </table>	Rated voltage (V)	6.3	10	16	25	35	50	63	100	tan $\delta$ (MAX.)	0.24	0.21	0.18	0.16	0.14	0.12	0.10	0.08								
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Low Temperature Characteristics	Measurement frequency: 120 Hz																										
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ZT/Z20 (MAX.)	10	8	6	4	4	4	4	4																			
Load Life	After the rated voltage has been applied for 1000 hours at a temperature of 105°C, the capacitors will meet the characteristic requirements listed.																										
	Leakage current	Initial specified value or less																									
	Capacitance change	Within $\pm 20\%$ of the initial measurement for capacitors of not more than 16WV or $\leq 0$ Within $\pm 20\%$ of the initial measurement for capacitors of not less than 25WV or above $\neq 0$																									
	tan $\delta$	200% or less of initial specified value																									
Shelf Life	After capacitors have been stored without load at 105°C for 1000 hours and applying voltage according to JIS C-5102 4.3, capacitors will meet the specified value for load life characteristics listed above.																										
	Appearance	No excessive leak of electrolyte or abnormal deformation																									
Marking	Printed with black letters on clear blue sleeve according to JIS C-5141.																										
Applicable Standards	Characteristics W of JIS C-5141 and JIS C-5102																										

### Axial Lead Type



### Type numbering system (Example: 50V 22 $\mu$ F)



### Nominal Dimensions

Cap. ( $\mu$ F)	WV	Code	D x L (mm)							
			6.3	10	16	25	35	50	63	100
			DJ	1A	1C	1E	1V	1H	1J	2A
0.47	R47							8x12		8x12
1.0	010							8x12		8x12
2.2	2R2							8x12		8x12
3.3	3R3							8x12		8x12
4.7	4R7							8x12		8x12
10	100							8x12	8x12	8x18
22	220						8x12	8x18	8x18	8x20
33	330					8x12	8x18	8x18	8x18	10x21
47	470				8x12	8x18	8x18	8x18	8x20	10x28
100	101		8x18	8x18	8x18	8x20	10x21	10x21	10x21	13x28
220	221	8x18	8x18	8x20	10x21	10x28	10x28	10x28	13x28	16x31.5
330	331	8x20	8x20	10x21	10x28	13x28	13x28	13x28	13x31.5	16x41.5
470	471	10x21	10x21	10x28	10x31	13x31.5	13x31.5	13x31.5	16x31.5	
1000	102	10x28	10x31	13x28	13x31.5	16x31.5	16x31.5	16x41.5		
2200	222	13x28	16x31.5	16x31.5	16x41.5					
3300	332	16x31.5	16x31.5							
10000	472	16x41.5								

### Ripple coefficient

#### Coefficient for frequency compensation

Cap. ( $\mu$ F)	Frequencies	100Hz	300Hz	1kHz	10kHz
47		1	1.25	1.57	2.0
10~470		1	1.25	1.34	1.5
100~10000		1	1.10	1.15	1.15

#### Coefficient for temperature compensation

Ambient temperature (°C)	-70	+25	+105
Compensating coefficient	1.02	1.00	1.0

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