

# CapXon RP Series

勝特力材料 886-3-5753170  
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[Http://www.100y.com.tw](http://www.100y.com.tw)

## RP Series Screw Terminal Type 85°C

### Features

- ◆ Load life: 85°C 2000 hours.
- ◆ High ripple capability.
- ◆ For detail specifications, please refer to Engineering Bulletin No. E140.



### Specifications

Item	Performance Characteristics																																																							
Operating Temperature Range	-40 ~ +85 °C	-25 ~ +85°C																																																						
Rated working Voltage Range	16 ~ 100 VDC	160 ~ 450 VDC																																																						
Capacitance Range	2200 ~ 68000 µF	270 ~ 22000 µF																																																						
Capacitance Tolerance	±20% (120Hz, +20°C)																																																							
Leakage Current (+20°C, max.)	I ≤ 0.02 CV After 5 minutes with rated working voltage applied.																																																							
Dissipation Factor (tan δ)	Less than the value under table (%)																																																							
	<table border="1"> <thead> <tr> <th>wv \ φD</th> <th>35</th> <th>51</th> <th>64</th> <th>77</th> </tr> </thead> <tbody> <tr> <td>16</td> <td>0.6</td> <td>0.7</td> <td>0.8</td> <td>1.2</td> </tr> <tr> <td>25</td> <td>0.4</td> <td>0.5</td> <td>0.7</td> <td>0.8</td> </tr> <tr> <td>35</td> <td>0.3</td> <td>0.5</td> <td>0.6</td> <td>0.7</td> </tr> <tr> <td>50</td> <td>0.25</td> <td>0.3</td> <td>0.5</td> <td>0.6</td> </tr> </tbody> </table> (+20°C, at 120Hz)	wv \ φD	35	51	64	77	16	0.6	0.7	0.8	1.2	25	0.4	0.5	0.7	0.8	35	0.3	0.5	0.6	0.7	50	0.25	0.3	0.5	0.6	<table border="1"> <thead> <tr> <th>wv \ φD</th> <th>35</th> <th>51</th> <th>64</th> <th>77</th> </tr> </thead> <tbody> <tr> <td>63</td> <td>0.2</td> <td>0.25</td> <td>0.3</td> <td>0.4</td> </tr> <tr> <td>80</td> <td>0.2</td> <td>0.2</td> <td>0.25</td> <td>0.3</td> </tr> <tr> <td>100</td> <td>0.15</td> <td>0.2</td> <td>0.25</td> <td>0.25</td> </tr> <tr> <td>160~250</td> <td>0.15</td> <td>0.15</td> <td>0.2</td> <td>0.2</td> </tr> <tr> <td>350~450</td> <td>0.2</td> <td>0.2</td> <td>0.25</td> <td>0.25</td> </tr> </tbody> </table>	wv \ φD	35	51	64	77	63	0.2	0.25	0.3	0.4	80	0.2	0.2	0.25	0.3	100	0.15	0.2	0.25	0.25	160~250	0.15	0.15	0.2	0.2	350~450	0.2	0.2	0.25
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Low Temperature Characteristics (120Hz)	Impedance ratio at 120 Hz -25°C / +20°C :3 max -40°C / +20°C :12 max																																																							
Load Life	Test conditions Duration time :2000 Hrs Ambient temperature :+85°C Applied voltage :Rated DC working voltage After test requirements at +20°C Capacitance change :≤ ±15% of the initial value Dissipation factor :≤ ±175% of the specified value Leakage current :≤ Not more than the specified value																																																							
Shelf Life	Test conditions Duration time :500 Hrs Ambient temperature :+85°C Applied voltage :None Capacitance change :≤ ±15% of the initial value Dissipation factor :≤ ±150% of the specified value Leakage current :≤ Not more than the specified value After test requirements at +20°C : Same limits as Load life. Pre-treatment for measurements shall be conducted after application of DC working voltage for 30 minutes.																																																							

### Multiplier for Ripple Current vs. Frequency

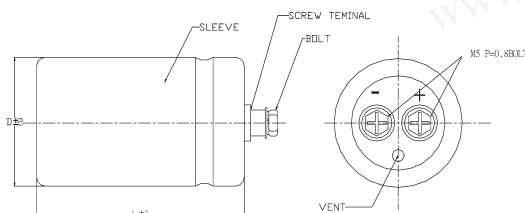
CAP (µF) \ Frequency(Hz)	50(60)	120	400	1K	10K ≤
10 ~ 50 WV	0.8	1	1.03	1.05	1.08
63 ~ 100 WV	0.8	1	1.05	1.07	1.10
160 ~ 450 WV	0.8	1	1.10	1.13	1.18

### Multiplier for Ripple Current vs. Temperature

Temperature(°C)	60 ≥	70	≤ 60
Multiplier	1.8	1.6	1.0

φD	35	51	63.5	76.2
P	12.7	22	28.6	31.8

### Diagram of Dimensions:(unit:mm)



# CapXon RP Series

## Case Size

φ D x L (mm)

WV (SV) μF	16 (20)		25 (32)		35 (44)		50 (63)	
	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple
6800							35x50	3.7
10000					35x60	3.5	35x60	5.0
15000			35x50	3.8	35x80	5.7	35x80	7.8
22000	35x60	5.1	35x60	6.8	35x100	7.1	35x120	12.8
33000	35x80	6.9	35x80	9.4	35x100	10.2	51x100	13.2
47000	35x1000	9.5	35x100	12.5	35x120	13.7	51x100	14.7
68000	51x80	12.7	51x80	14.3	51x100	15.1	51x140	17.8
100000	51x100	13.5	51x100	15.5	51x120	19.2	63.5x140	19.8
150000	51x140	17.6	51x140	24.2	63.5x120	23.8	76.2x140	25.7
220000	63.5x120	20.1	63.5x120	25.8	76.2x140	27.4	76.2x160	32.7
330000	63.5x140	25.2	76.2x120	26.7	76.2x160	35.7		
470000	76.2x140	27.5						
680000	76.2x160	35.1						

WV (SV) μF	63 (79)		80 (100)		100 (125)		160 (200)	
	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple
1000							35x60	2.8
1500							35x60	3.1
2200							35x100	4.7
3300					35x60	4.1	35x120	6.8
4700			35x60	4.0	35x80	5.2	51x80	7.5
6800	35x50	4.3	35x60	5.3	35x80	6.2	51x120	11.5
10000	35x60	6.2	35x80	7.3	35x100	7.9	51x140	13.4
15000	35x80	8.7	35x120	10.3	51x100	12.4	63.5x140	14.8
22000	35x120	13.1	51x80	12.3	51x120	16.2	76.2x140	15.4
33000	51x100	13.9	51x120	16.1	51x140	21.3		
47000	51x120	18.6	63.5x120	18.5	63.5x140	24.3		
68000	63.5x120	21.3	63.5x140	24.1	76.2x140	28.4		

WV (SV) μF	200 (250)		250 (300)		350 (400)		400 (450)		450 (500)	
	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple
220									35x50	1.0
330							35x60	1.2	35x60	1.2
470					35x60	1.5	35x80	1.6	35x80	1.8
680			35x60	1.8	35x80	2.7	35x100	2.1	35x120	2.3
1000	35x60	2.3	35x80	3.1	35x100	3.2	35x120	2.8	51x80	2.9
1500	35x80	3.2	35x80	3.8	51x80	4.1	51x100	3.8	51x120	3.7
2200	35x100	4.8	35x120	5.3	51x120	6.0	51x140	4.7	63.5x120	4.9
3300	35x120	6.2	51x120	7.5	51x140	7.8	63.5x120	5.8	76.2x120	6.3
4700	51x100	7.8	51x140	9.1	63.5x120	8.0	76.2x120	6.9	76.2x160	8.6
6800	51x140	9.8	63.5x120	9.8	76.2x120	8.9	76.2x160	9.8		
10000	63.5x120	11.2	76.2x140	12.3	76.2x160	12.3				
15000	76.2x140	14.2	76.2x160	15.1						
22000	76.2x160	17.8								

Ripple Current (A, rms) at 85°C 120Hz

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