

## OCRK Series

### Features

- 105°C, 5,000 hours assured
- Ultra low ESR with large permissible ripple current
- RoHS compliance



Marking color: Blue

### Specifications

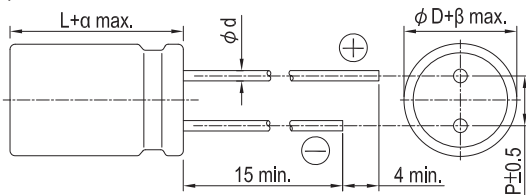
Items	Performance				
Category Temperature Range	-55°C ~ +105°C				
Capacitance Tolerance	±20% (at 120 Hz, 20°C)				
Leakage Current (at 20°C)*	Rated voltage applied, after 2 minutes at 20°C. See Standard Ratings				
Tanδ (at 120 Hz, 20°C)	See Standard Ratings				
ESR (at 100k~300k Hz, 20°C)	See Standard Ratings				
Endurance	Test Time	5,000 Hrs			
	Capacitance Change	Within ±20% of initial value			
	Tanδ	Less than 150% of specified value			
	ESR	Less than 150% of specified value			
	Leakage Current	Within specified value			
*The above specifications shall be satisfied when the capacitors are restored to 20°C after the rated voltage applied for 5,000 hours at 105°C.					
Moisture Resistance	Test Time	1,000 Hrs			
	Capacitance Change	Within ±20% of initial value			
	Tanδ	Less than 150% of specified value			
	ESR	Less than 150% of specified value			
	Leakage Current	Within specified value			
*The above specifications shall be satisfied when the capacitors are restored to 20°C after subjecting them at 60°C, 90 ~ 95% RH for 1,000 hours. Leakage current should be tested after voltage treatment*.					
Resistance to Soldering Heat * (Please refer to page 11 for soldering conditions)	Capacitance Change	Within ±10% of initial value			
	Tanδ	Within specified value			
	ESR	Within specified value			
	Leakage Current	Within specified value			
Ripple Current and Frequency Multipliers	Frequency (Hz)	120 ≤ f < 1k	1k ≤ f < 10k	10k ≤ f < 100k	100k ≤ f < 500k
	Multiplier	0.05	0.3	0.7	1.0

\* For any doubt about measured values, measure the leakage current again after the following voltage treatment.

Voltage treatment: DC rated voltage is applied to the capacitors for 2 hours at 105 °C.

### Diagram of Dimensions

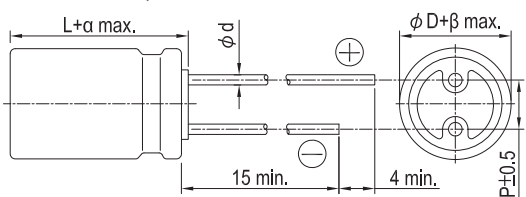
6.3 φ × 8L



Lead Spacing and Diameter Unit: mm

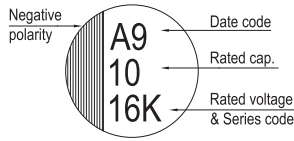
φD	6.3	8	10
L	8	11.5	12
P	2.5	3.5	5.0
φd	0.6		
α	1.0		
β	0.5		

8 φ × 11.5L and 10 φ × 12L

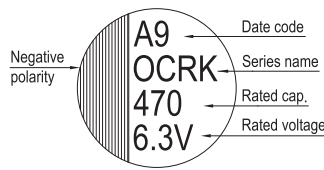


### Marking

$\phi D = 6.3$



$\phi D = 8 \sim 10$



Dimension:  $\phi D \times L$ (mm)

Ripple Current: mA/rms at 100k Hz, 105°C

### Standard Ratings

Rated Volt. (V)	Surge Voltage (V)	Capacitance ( $\mu$ F)	Size $\phi D \times L$ (mm)	Tan $\delta$ (120 Hz, 20°C)	L C ( $\mu$ A)	E S R (m $\Omega$ /at 100k ~ 300k Hz, 20°C max.)	Rated R. C. (mA/rms at 100k Hz, 105°C)
2.5V (0E)	2.9	330	6.3 $\times$ 8	0.10	500	7	5,600
		470					
		560					
		820					
4V (0G)	4.6	560	6.3 $\times$ 8	0.10	500	7	5,000
6.3V (0J)	7.2	390	8 $\times$ 11.5	0.15	491	15	4,210
		470	6.3 $\times$ 8	0.10	592	8	4,700
			8 $\times$ 11.5	0.15	592	15	4,210
		560	6.3 $\times$ 8	0.10	706	8	4,700
		820	10 $\times$ 12	0.15	1,033	12	4,360
10V (1A)	12.0	330	8 $\times$ 11.5	0.12	660	17	3,950
		560	10 $\times$ 12	0.12	1,360	16	4,720
16V (1C)	18.0	180	8 $\times$ 11.5	0.12	576	20	3,640
		270	6.3 $\times$ 8		864	15	3,800
		330	10 $\times$ 12		1,056	16	4,720
20V (1D)	23.0	100	8 $\times$ 11.5	0.12	400	28	2,300
		330	10 $\times$ 12	0.12	1,320	26	2,800
25V (1E)	29.0	100	8 $\times$ 11.5	0.12	500	28	2,200
		270	10 $\times$ 12	0.12	1,350	27	2,700
35V (1V)	40.0	68	8 $\times$ 11.5	0.12	476	29	2,200
		150	10 $\times$ 12	0.12	1,050	28	2,600

### Part Numbering System

OCRK Series	470 $\mu$ F	$\pm 20\%$	6.3V	Bulk Package	Gas Type	8 $\phi$ $\times$ 11.5L	Pb-free and PET coating case
<b>ORK</b>	<b>471</b>	<b>M</b>	<b>0J</b>	<b>BK</b>	-	<b>0811</b>	
Series Name	Capacitance	Capacitance Tolerance	Rated Voltage	Lead Configuration and Package	Rubber Type	Case Size	Lead Wire and Coating Type

Note: For more details, please refer to "Part Numbering System (Radial Type)" on page 13.