MPP/CBB21-RC Metallized Polypropylene Film Capacitors For Capacitive Divider (Dipped-Type) Data Sheet

Feature

■Wide capacitance range from 0.01uF to 3.3uF.

■Operating Temperature: -40℃～105℃

■Storage Temperature: 15℃~35℃

■Metallized polypropylene film.

■Good self-healing properties, withstanding over-voltage stressing.

■Long stability of capacitance.

■Excellent active and passive flame resistant abilities (UL94V-0).

Applications

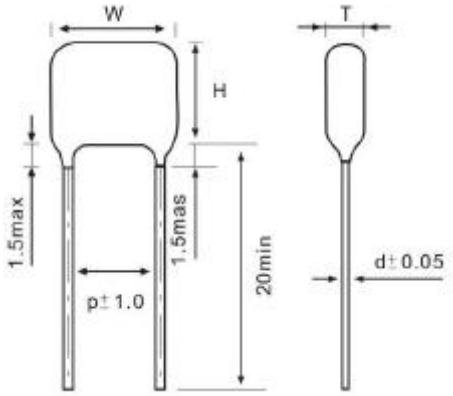
■Widely used in energy meter, LED driver ect.

Part numbering on request.

Specifications

Climatic Category	40/100/21
Rated Voltage	100VAC、220VAC、250VAC、275VAC
Dissipation Factor (tanδ)	≤0.1%(1KHz、1.0Vrms、20℃)
Withstand Voltage	1.6U_R (5s)
Insulation Resistance (I.R.)	C≤0.33uF, IR≥50000MΩ C＞0.33uF, IR≥15000S (AT 100VDC、60SEC、20℃)

Dimensions (mm)

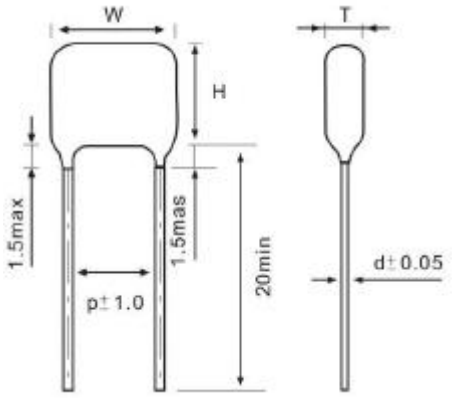
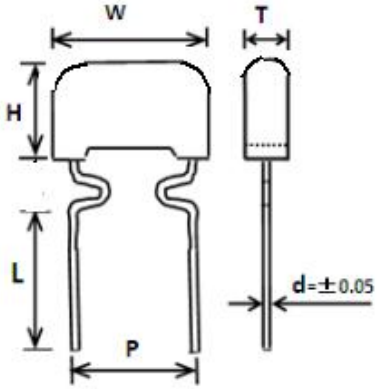


Capacitance (uF)	Rated Voltage	Size (mm)				
		W Max	H Max	T Max	P±1.0	d±0.05
0.01	100VAC	10.0	9.0	5.0	7.5	0.6
	220VAC	10.0	9.0	5.0	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	9.0	5.5	10.0	0.6
0.015	100VAC	10.0	9.0	5.5	7.5	0.6
	220VAC	10.0	9.0	5.5	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	11.0	6.0	10.0	0.6
0.018	100VAC	10.0	9.5	5.5	7.5	0.6
	220VAC	10.0	9.5	5.5	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	9.0	5.5	10.0	0.6
0.022	100VAC	10.0	8.5	5.5	7.5	0.6
	220VAC	10.0	8.5	5.5	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	9.0	5.5	10.0	0.6
0.027	100VAC	10.0	9.5	5.5	7.5	0.6
	220VAC	10.0	9.5	5.5	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	9.0	5.5	10.0	0.6
0.033	100VAC	10.0	9.5	6.0	7.5	0.6
	220VAC	10.0	9.5	6.0	7.5	0.6
	250VAC	13.0	10.0	6.0	10.0	0.6
	275VAC	13.0	10.0	6.0	10.0	0.6

Capacitance (uF)	Rated Voltage	Size (mm)				
		W Max	H Max	T Max	P±1.0	d±0.05
0.047	100VAC	10.0	9.5	5.5	7.5	0.6
	220VAC	10.0	9.5	5.5	7.5	0.6
	250VAC	13.0	9.0	5.5	10.0	0.6
	275VAC	13.0	10.5	6.5	10.0	0.6
0.056	100VAC	10.0	9.0	5.5	7.5	0.6
	220VAC	10.0	9.0	5.5	7.5	0.6
	250VAC	13.0	8.5	5.5	10.0	0.6
	275VAC	13.0	11.5	7.5	10.0	0.6
0.068	100VAC	10.0	9.5	6.0	7.5	0.6
	220VAC	10.0	9.5	6.0	7.5	0.6
	250VAC	13.0	9.5	6.0	10.0	0.6
	275VAC	18.0	11.0	6.0	15.0	0.8
0.1	100VAC	10.0	10.0	6.5	7.5	0.6
	220VAC	10.0	10.0	6.5	7.5	0.6
	250VAC	13.0	10.5	6.0	10.0	0.6
	275VAC	18.0	10.5	7.0	15.0	0.8
0.15	100VAC	13.0	10.5	6.5	10.0	0.6
	220VAC	13.0	10.5	6.5	10.0	0.6
	250VAC	13.0	11.5	7.0	10.0	0.6
	275VAC	18.0	13.0	7.5	15.0	0.8
0.22	100VAC	13.0	11.0	7.0	10.0	0.6
	220VAC	13.0	11.0	7.0	10.0	0.6
	250VAC	18.0	13.0	7.5	15.0	0.8
	275VAC	18.0	14.5	8.5	15.0	0.8
0.33	100VAC	13.0	12.5	8.5	10.0	0.6
	220VAC	13.0	12.5	8.5	10.0	0.6
	250VAC	18.0	14.5	7.0	15.0	0.8
	275VAC	18.0	17.5	10.0	15.0	0.8
0.47	100VAC	18.0	12.5	7.0	15.0	0.8
	220VAC	18.0	12.5	7.0	15.0	0.8
	250VAC	18.0	15.5	8.5	15.0	0.8
	275VAC	23.0	18.5	11.0	20.0	0.8
0.68	100VAC	18.0	14.5	8.0	15.0	.0.8
	220VAC	18.0	14.5	8.0	15.0	0.8
	250VAC	18.0	17.0	10.0	15.0	0.8
	275VAC	25.0	19.5	10.5	22.5	0.8

Capacitance (uF)	Rated Voltage	Size (mm)				
		W Max	H Max	T Max	P±1.0	d±0.05
1.0	100VAC	18.0	16.5	10.0	15.0	0.8
	220VAC	18.0	16.5	10.0	15.0	0.8
	250VAC	23.0	17.5	9.5	20.0	0.8
	275VAC	31.0	21.0	12.5	27.5	0.8
1.5	100VAC	23.0	17.5	9.5	20.0	0.8
	220VAC	23.0	17.5	9.5	20.0	0.8
	250VAC	31.0	17.5	9.0	27.5	0.8
	275VAC	31.0	24.5	14.5	27.5	0.8
2.0	100VAC	23.0	19.5	10.5	20.0	0.8
	220VAC	23.0	19.5	10.5	20.0	0.8
	250VAC	31.0	19.5	10.5	27.5	0.8
2.2	100VAC	23.0	19.5	11.5	20.0	0.8
	220VAC	23.0	19.5	11.5	20.0	0.8
	250VAC	31.0	20.0	11.5	27.5	0.8
3.0	100VAC	31.0	19.5	11.0	27.5	0.8
	220VAC	31.0	19.5	11.0	27.5	0.8
	250VAC	31.0	22.5	13.5	27.5	0.8
3.3	100VAC	31.0	20.0	11.5	27.5	0.8
	220VAC	31.0	20.0	11.5	27.5	0.8
	250VAC	31.0	24.0	14.5	27.5	0.8

Lead Configuration

Lead Style	Drawing	Lead Length L (mm)
Long Straight		①[2.5≤L＜6.0]+/-0.5; ②[6.0≤L≤10]+/-1.0
Inner Crimped		①[2.5≤L＜6.0]+/-0.5; ②[6.0≤L≤10]+/-1.0

Taping And Dimensions (mm)

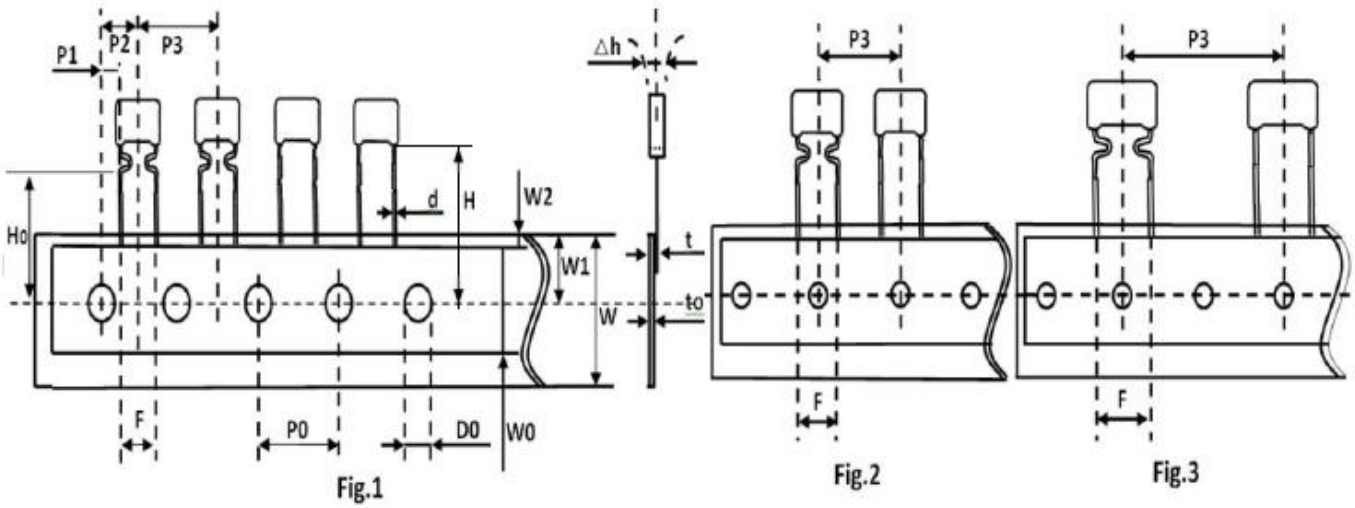


Fig.1

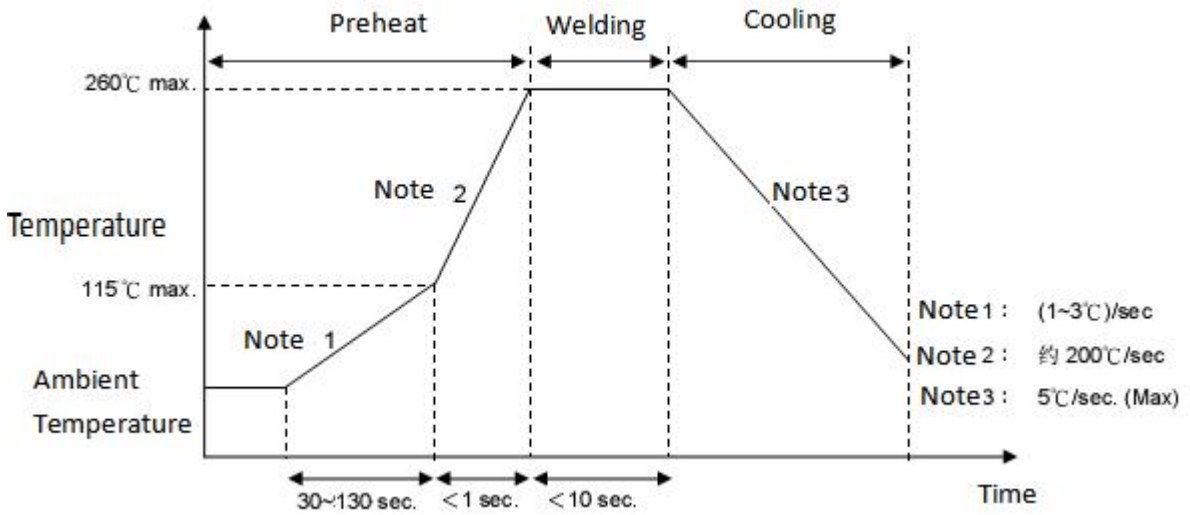
Fig.2

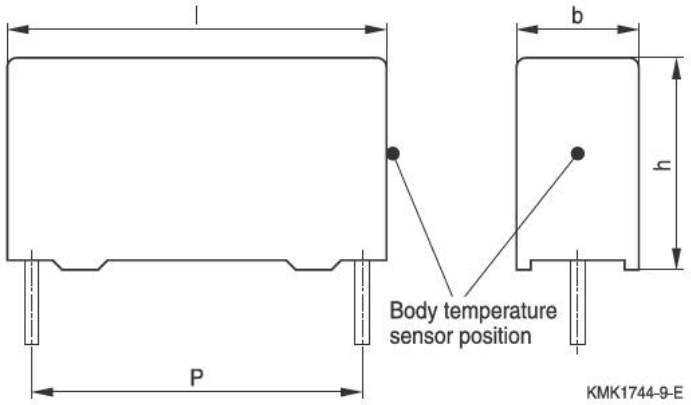
Fig.3

Symbol	Fig.1	Fig.2	Fig.2	Fig.3	Fig.3	Tolerance
	P=5.0	P=7.5	P=10	P=15	P=20/22.5	
P3	12.7	12.7	12.7	25.4	30.0	±1.0
P2	6.35	/	/	/	/	±1.3
P0	12.7	12.7	12.7	12.7	15.0	±0.3
P1	3.85	/	/	/	/	±0.7
F	5.0	7.5	10.0	15.0	20.0/22.5	±1.0
H	20.0	20.0	20.0	20.0	20.0	±1.0
H0	16.5	16.5	16.5	16.5	16.5	±0.5
Δ h	0	0	0	0	0	±2.0
W	18.0	18.0	18.0	18.0	18.0	+1.0/-0.5
W0	12.0	12.0	12.0	12.0	12.0	±1.0
W1	9.0	9.0	9.0	9.0	9.0	±0.5
W2	3.0	3.0	3.0	3.0	3.0	Max
D0	4.0	4.0	4.0	4.0	4.0	±0.3
d	0.5	0.6	0.6	0.8	0.8	±0.05
t	1.0	1.1	1.1	1.4	1.4	±0.2
t0	0.38	0.38	0.38	0.47	0.47	±0.04

Soldering Condition

Wave Soldering Graph





PP:
During pre-heating: Tp ≤110℃
During soldering: Ts ≤120℃, ts ≤15 s
PE:
During pre-heating: Tp ≤125℃
During soldering: Ts ≤160℃, ts ≤15 s

Note: Film capacitor is not suitable for reflow soldering, because it will cause thermal contraction and affect electrical performance.

Iron Soldering Condition

Item	Condition
Temperature of soldering copper bit	350℃（max.）
Soldering duration	3sec（max.）
Space between soldering position and coating layer	2mm（min.）

Storage Conditions

- When store under the atmosphere, the terminal may contact with the substance of hydrochloride, hydrosulfide, sulfuric acid, etc. in the atmosphere, which needs to be paid attention to the deterioration of the solderability of the terminal.
- Product could not be exposed to high humidity and high temperature environment. Please store under below condition with the original packing.

A. Temperature: ≤35℃

B. Himidity: ≤70%RH

C. Storage period: Max 12 months