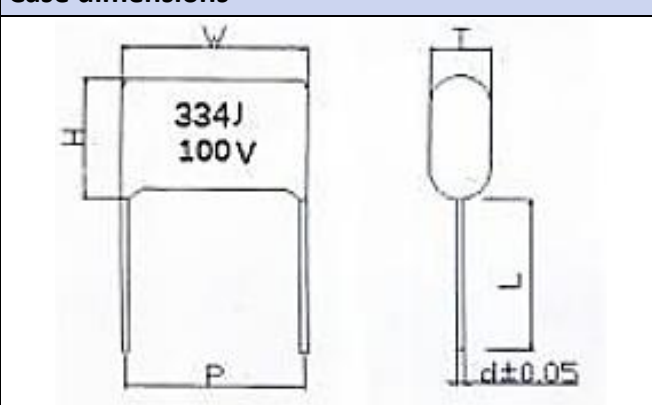


Metalized Polyester Film Capacitor



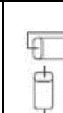




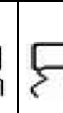





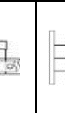
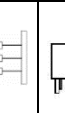
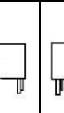
Primary characteristics		
Parameter	Value	Unit
Capacitance	1.0	nF
Rated voltage	2000	VDC

Features

- Pb-free and RoHS compliant
- Plastic case according to UL94V-0
- Small size, good self-healing effect

Case dimensions						
						
Unit	W	H	T	P	φd	L
mm	18 MAX	11 MAX	5.0 MAX	15 ±0.5	0.6 ±0.05	-

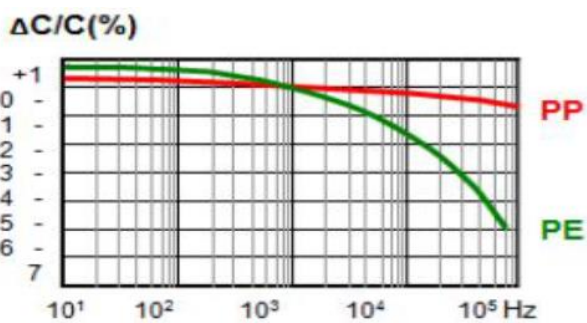
Part numbering system											
AFC	102	J	K	06P		00	U	T			
Series code	Capacitance $10\text{pF} \times 10^2 = 1.0\text{nF}$	Capacitance tolerance	Rated voltage marking		Lead width		Lead length	Lead configuration	Packing		
		J	±5%	K	2000V	01P	2.5mm	-	See: lead configuration below	B	Bulk
		K	±10%			02P	5.0mm			T	Tape
		M	±20%			03P	7.5mm				
						nP	n x 2.5mm				

Lead configuration																
Lead type																
Code	L	M	N	B	C	D	E	F	G	H	K	T	U	W	R	S

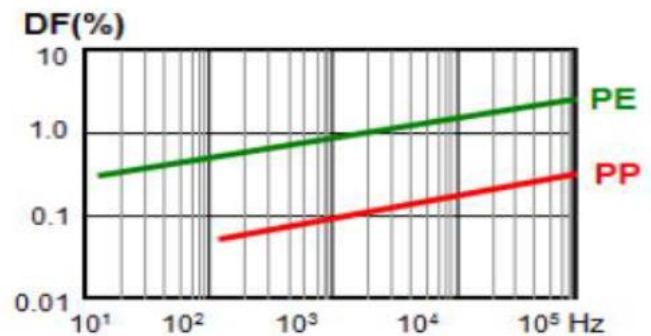
Specifications			
Parameter		Value	Unit
Operating temperature range		-40 ~ 85 typ.; 110 max	°C
Climatic category		40/110/56	
Standard capacitance (C _R)		1.0	nF
Capacitance tolerance		±5	%
Rated voltage		2000	VDC
Insulation resistance @20°C, 1min; @10VDC	C≤0.33μF	≥3000	MΩ
	C>0.33μF	≥1000	S

Frequency characteristics

Capacitance vs. frequency

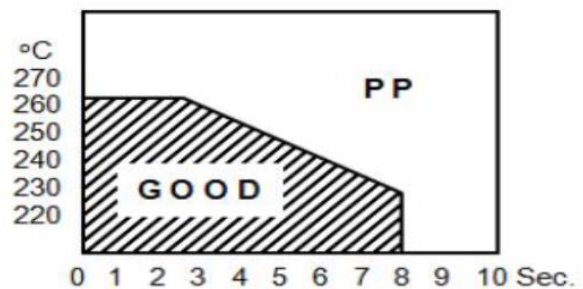
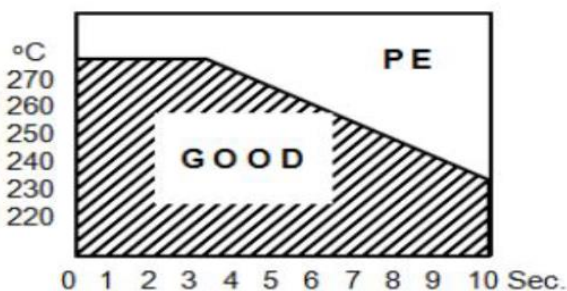


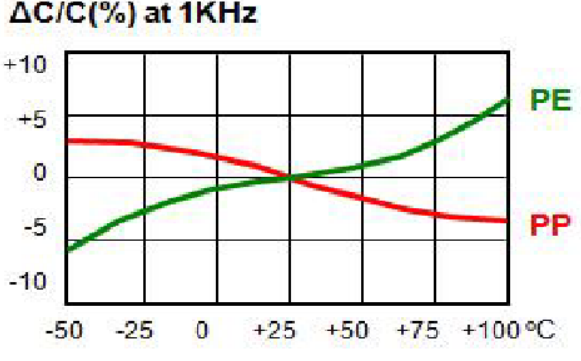
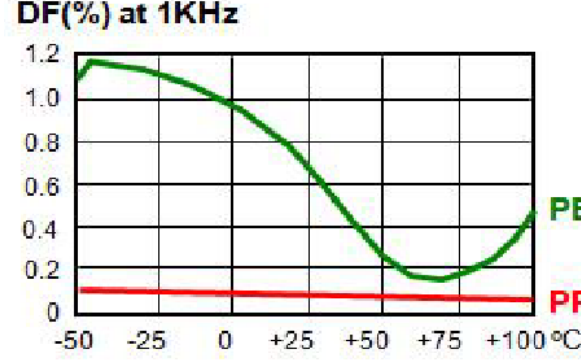
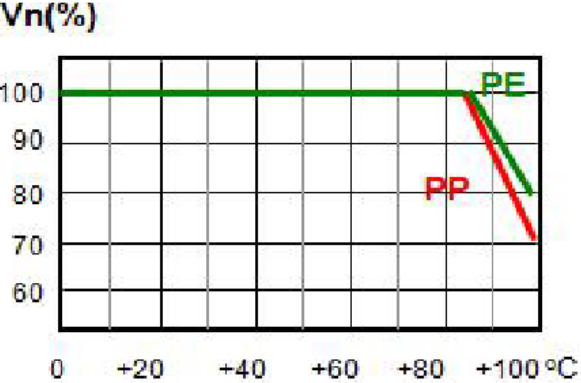
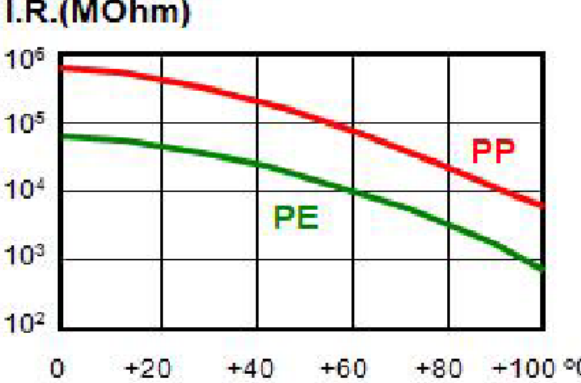
Dissipation factor vs. frequency



Soldering characteristic

Soldering temperature vs time



Temperature characteristic	
<p>Capacitance vs. temperature</p>  <p>ΔC/C(%) at 1KHz</p> <p>The graph shows the percentage change in capacitance (ΔC/C) at 1 kHz for PE (green line) and PP (red line) dielectrics. The x-axis represents temperature from -50°C to +100°C. The y-axis ranges from -10% to +10%. PE shows a positive change, while PP shows a negative change.</p>	<p>Dissipation factor vs. temperature</p>  <p>DF(%) at 1KHz</p> <p>The graph shows the dissipation factor (DF) at 1 kHz for PE (green line) and PP (red line) dielectrics. The x-axis represents temperature from -50°C to +100°C. The y-axis ranges from 0 to 1.2. PE shows a peak at low temperatures and a minimum around 75°C. PP remains relatively constant and low.</p>
<p>Operating voltage vs. temperature</p>  <p>Vn(%)</p> <p>The graph shows the operating voltage (Vn) in percent for PE (green line) and PP (red line) dielectrics. The x-axis represents temperature from 0°C to +100°C. The y-axis ranges from 60% to 100%. Both materials maintain 100% voltage until approximately 90°C, after which they drop sharply.</p>	<p>IR vs. temperature</p>  <p>I.R.(MΩm)</p> <p>The graph shows the insulation resistance (I.R.) in MΩm for PE (green line) and PP (red line) dielectrics. The x-axis represents temperature from 0°C to +100°C. The y-axis is logarithmic, ranging from 10² to 10⁶. Both materials show a decrease in I.R. as temperature increases, with PP maintaining a higher value than PE.</p>

Ordering information			
Part Number	Package	Shipping Quantity	Box dimensions
AFC 102JK06P00UT	18 x 11 x 5.0mm	400 pcs / polybag 2000 pcs / box	-

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