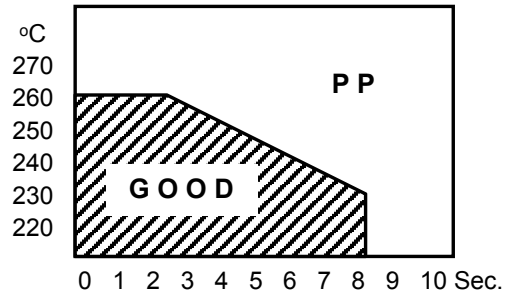
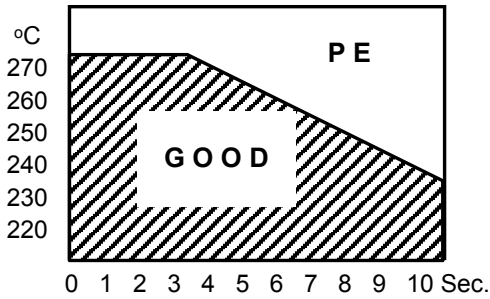




★ Characteristics			TYPE :X2-MKP	
No.	Test items		Test method	Characteristics
1	Climatic Category		/	40/110/56/B
2	Rated voltage		/	250VAC 310VAC
3	Withstand Voltage(TV)		430% of rated voltage for 60sec.	Shall be no abnormality.
4	Capacitance(CAP)		Measuring Frequency:1KHz±10%. Measuring Voltage :1Vrms.max.	0.0022uF — 4.7uF
5	Tolerance (%)		/	K (±10%)
6	Dissipation Factor(DF)		Measuring Frequency:1KHz±10%. Measuring Voltage :1Vrms.max.	0.0015 (0.15%)max. at 1 KHz.
7	Insulation resistance(IR)		Apply 100V±15%for 60±5sec.at+20 ±2℃ .	≥ 15,000MΩ(C≤0.33uF) ≥ 5,000MΩ·uF/C (C > 0.33uF)
8	Terminal Strength	Tensile	Apply 1.0 kg for 10 ± 1sec. to the terminal in the axial direction, and acting in a direction away from the body.	Shall be no abnormality.
9		Bending	Apply 0.5 kg for 2 cycles. Each cycle includes: 90°once, return to its initial position for 2-3 sec. and then to the opposite direction once.	Shall be no abnormality.
10	Solderability		Soldering temperature:250 ±3℃ ; Immersion duration: 2.0 ±0.5sec	Good Tinning.
11	Soldering Heat Resistance		Soldering Temperature : +260 ± 5℃ . Immersion Duration : 10 ±1sec.	CAP(ΔC/C) Within ±5% of the value before test. DF 0.002(0.2%) max.at 1KHz
12	Rapid Temperature Change		Test Temperature Cycle : Total 5 cycles. High Temperature : +100±5 ℃ Low Temperature : -40 ±5℃ 30 min ± 10% for each temperature.	Shall be no abnormality. CAP(ΔC/C) Within ±5% of the value before test. DF 0.002(0.2%) max.at 1KHz
13	Damp Heat Loading		Test temperature :+40 ± 2℃ Test humidity : 90% to 95% R.H. Test voltage : rated voltage. Test duration : 500 +24/-0 hrs.	Shall be no remarkable change. The marking shall be legible. CAP(ΔC/C) Within ±5% of the value before test. DF 0.002 (0.2%) max.at 1KHz
14	Climatic Sequence	Dry heat	Temperature: 105℃,Duration: 16 hrs.	Shall be no abnormality. Shall be no remarkable change. CAP(ΔC/C) Within ±5% of the value before test. DF 0.002(0.2%) max.at 1KHz
		Humid Cool	—40℃,Duration: 2 hrs.	
		Air pressure	Temperature: 15℃—35℃,Pressure: 8.5KPa; Duration: 1 hrs; After experiment, applied vottage 1 min.	
		Temperature Cycle	Test Temperature Cycle:Total 5 cycles. Each cycle includes : 1. +20 ±2℃ for 3min. 2. -40 ±3 ℃ for 30 min. 3. +20 ±2℃ for 3min. 4. +100 +3/-0 ℃ for 30 min. 5. +20 ±2℃ for 3 min.	
15	Durability		105℃,Applied 1.25 multiple rate voltage, Duration: 1000 hours (41.6 days)	No visible damage and clear mark; CAP(ΔC/C) Within ±10% of the value before test. DF 0.005 (0.5%) max.at 1KHz IR ≥50% of the limit value of No. 7
16	Charge & Discharge		Experiment period :10000 times; Charge duration: 0.5s; Discharge duration: 0.5s;	CAP(ΔC/C) Within ±10% of the value before test. DF 0.005 (0.5%) max.at 1KHz IR ≥50% of the limit value of No. 7

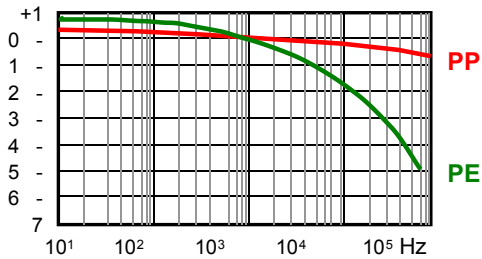
## CHARACTERISTICS REFERENCE

### Soldering Temperature VS Time

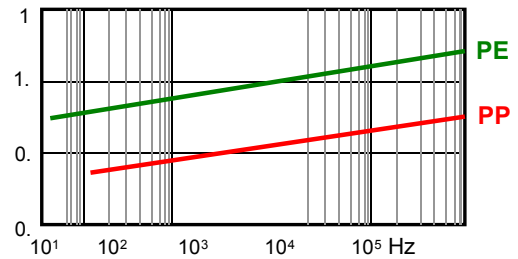


### Frequency Characteristics

#### $\Delta C/C(\%)$

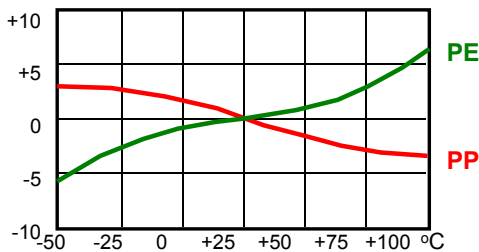


#### DF

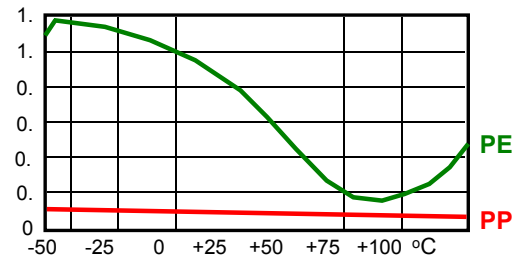


### Temperature Characteristics

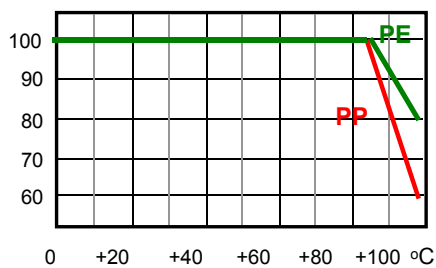
#### $\Delta C/C(\%)$ at 1KHz



#### DF(%) at



#### Vn(%)



#### I.R.(MΩm)

