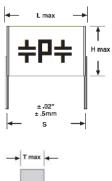


### Angstor® Capacitor Metallized Polymer Dielectric

RC

Stacked Metallized polymer capacitor

With -55 to +150C operating temperature range





# For more information contact info@quanticpaktron.com

- Highest ripple current x C\*V ratings in the industry
- Novel Dielectric Material: Ultra low D.F, high operating temperature, self-healing properties
- Ultra low ESR/ESL
- Lightweight <25% of equivalent MLCC</li>
- Low losses at high frequency
- Excellent for resonant circuits
- High dv/dt
- Efficient size
- Rugged construction
- Made in U.S.A.

200 VDC / 140 VAC											
PF Code	Value µF	L MAX	T MAX	н мах	S±.02 [.5]	d	Typical dv/dt [V/µs]	Typical ESR 500khz m0hm	Max Ripple current 85C 500kHz [ARMS]	SRF [MHz]	Part Number
844	0.84	0.650 (16.5)	0.290 [7.4]	0.440 (11.1)	0.591 [15]	0.032 [.8]	35	17	6.1	1.75	844K200RC6_
400 VDC	280 VAC										
424	0.42	0.650 (16.5)	0.290 [7.4]	0.440 [11.1]	0.591 (15)	0.032 [.8]	120	13	5.4	2.5	424K400RC6 _

Dimensions in inches, metric [mm] in parenthesis Tolerance: K [ $\pm 10\%$ ] standard, J [ $\pm 5\%$ ] available

RoHS part number information

No suffix indicates RoHS-5 compliant standard part number. RoHS-5 product does not contain five of the RoHS banned materials [Hg, CrVI, Cd, PBB and PBDE] in levels exceeding the industry defined limits. Component lead wires are plated with Sn / Pb and match conventional SnPb 1 assembly requirements

For a RoHS-6 compliant part, add a -FA suffix. RoHS-6 product does not contain any of the six RoHS banned materials (Hg, CrVI, Cd, PBB, PBDE and Pb) in levels exceeding the industry defined limits. Component lead wires are plated with Sn.

#### Electrical

#### Capacitance Range:

.42 to .84 µF @ 1KHz

#### Tolerance:

Available in ± 5%, 10% (standard), 20%

#### Voltage Range:

200, 400 VDC

#### **Dissipation Factor:**

≤ 0.1 % @ 25°C, 1KHz

#### **Insulation Resistance:**

 $100\Omega F$  or  $106\Omega,$  whichever is less at Rated voltage and 25C

#### Dielectric Strength:

1.3 x RVDC, 2 seconds max.

#### Self Inductance:

2 to 6nh typical

#### Temperature Range:

-55°C to 150°C operating -55°C to 105°C @ rated DC voltage derate voltage 1.66% / °C above 105°C max operating temperature; 150C

#### Performance

#### **Accelerated DC Voltage Life Test:**

1,000 Hours, 85°C, 1.25 × Rated VDC  $\Delta$  C/C  $\leq$  5%

DF ≤ 1.0%, 1KHz, 25°C

IR ≥ 1,000 Megohm x μF

Need not exceed 1,000 Megohms

#### **Moisture Test:**

 $85^{\circ}\text{C}$  / 85% RH / 21 days Applied Voltage: zero bias  $\Delta$  C/C  $\leq 7\%$ 

 $\mathsf{DF} \leq 0.1\%,\,\mathsf{1KHz},\,\mathsf{25}^{\circ}\mathsf{C}$ 

IR  $\geq$  30% of initial limit

#### Long Term Stability:

After 2 years storage, standard environment  $\Delta$  C/C  $\leq$  2%

# Physical Vibration:

#### Mil Std 202 Method 204D

Solder Resistance:  $260^{\circ}\text{C}$ ,  $5 \text{ Sec. } \Delta \text{ C/C} \leq 2\%$ 

#### **Construction:**

Non-inductively constructed with metallized polymer dielectric. Parallel plate-multilayer polymer [MLP] design.

#### Electrode:

Aluminum metallization

#### Case:

polymer tape wrap

#### Marking:

Parts are continuously marked **‡P‡** and pf code. Capacitance, tolerance and working voltage are printed on container.

#### Packaging:

**Bulk Packaging Standard** 

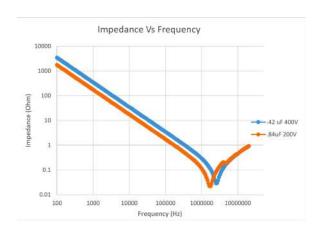


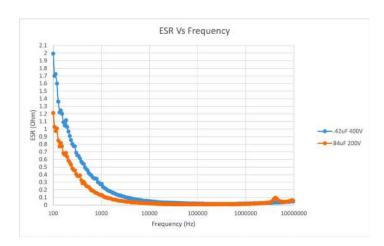
For more information contact info@quanticpaktron.com

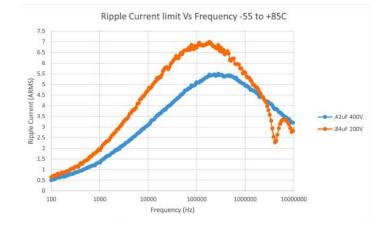
Angstor® Capacitor Metallized Polymer Dielectric

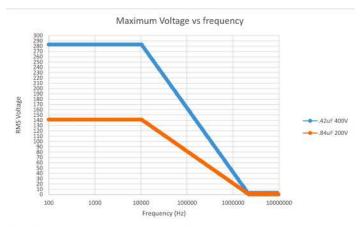


## **Electrical Characteristics**









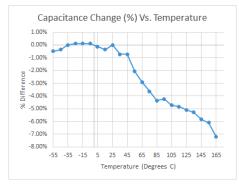


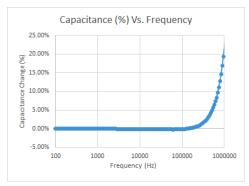
For more information contact info@quanticpaktron.com

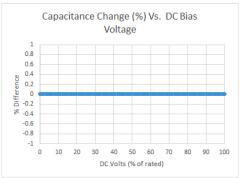
Angstor® Capacitor Metallized Polymer Dielectric

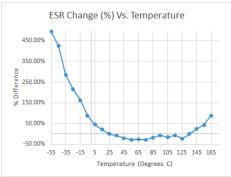


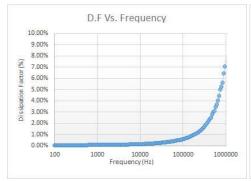
# Electrical Characteristics for 200V and 400V Ratings

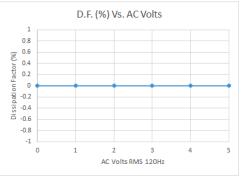


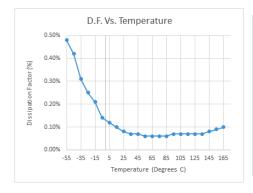


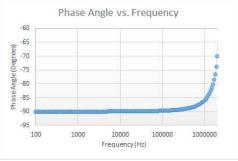


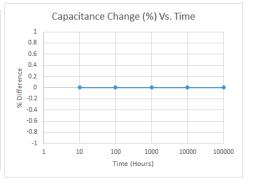












#### **Quantic Paktron**

1205 McConville Road Lynchburg, VA 24502 USA

TEL 434.239.6941

EMRIL info@quanticpaktron.com

URL quanticpaktron.com