# MOTOR RUN AC METALLIZED

## MRC SERIES

The MRC series is a range of AC metallized capacitors. These capacitors are most often used in motor run, HVAC, lighting, and power supply applications.

### FEATURES:

- .25" 4–Way Quick Connect terminals
- Pressure activated circuit interrupter
- Self healing of shorts due to dielectric breakdown
- Non–PCB dielectric fluid
- Low dissipation factor
- Leak–proof terminals

### RATINGS

**Capacitance Range:**
370 Volts – 2µF to 50µF
440 Volts – 2µF to 60µF
**Tolerance:** See Table on Next Page

### PERFORMANCE SPECIFICATIONS

**Operating Temperature Range:** –25°C to +85°C
**(MRC440V17R5 ONLY):** –40°C to +70°C
**(MRC440V30 ONLY):** –55°C to +70°C
**Capacitance Change Due To Temp:** +5% to–7%
**Dissipation Factor:** 0.001% Max @ 60Hz
**(MRC440V17R5 ONLY)** 0.1% Max @ 60Hz
**Service Life:** *150,000 hours (at Max Rating)
94% survival
**Shelf Life:** 10 years (when stored at < 35°C)
**Impregnant:** Dykanol XK

### CAPACITOR CONSTRUCTION

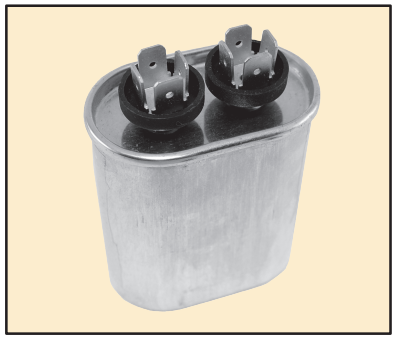
Metallized electrodes on both sides of paper substrate are wound with polypropylene film as a dielectric. During vacuum fluid processing the paper acts as a wick for thorough fluid impregnation to SUPPRESS CORONA and to promote long life.

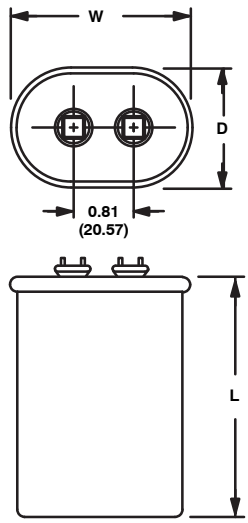
### ORDERING INFORMATION

**MRC 370V 2**

**Series**
**Voltage**
**Capacitance**

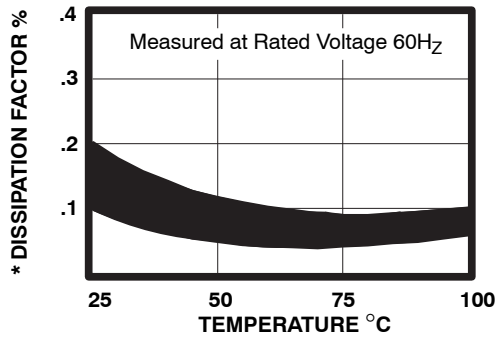
* EIA Standard is 60,000 hours





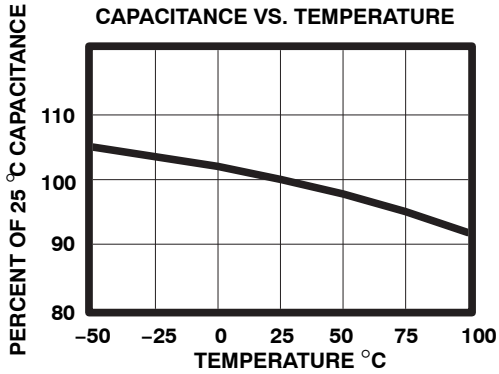

**TERMINAL TYPE**
Standard terminal 0.25 (6.35) wide x 0.032 (0.85) four blade quick disconnect universal type lugs of tin plated silicon bronze or brass (MRC440V20 may be received in two blade type).
**NOTE:** All dimensions are typical and for reference **ONLY**. Please contact the factory for actual size.

**DISSIPATION FACTOR VS. TEMPERATURE**




* NOTE – DF values after rated voltage is applied for 24 hours.

**CAPACITANCE VS. TEMPERATURE**



# MOTOR RUN AC METALLIZED

## MRC SERIES

### 370VAC Ratings and Dimensions @ 70° Case Temp.

| NTE Type Number | Capacitance | Tolerance | Case Dimensions – Inch (mm) | | | Case Style |
|---|---|---|---|---|---|---|
| | µF | % | W | D | L | |
| MRC370V2 | 2 | 5 | 2.16 (54.86) | 1.31 (33.27) | 2.18 (55.37) | A |
| MRC370V3 | 3 | 10 | 2.16 (54.86) | 1.31 (33.27) | 1.85 (46.99) | A |
| MRC370V4 | 4 | 10 | 2.16 (54.86) | 1.31 (33.27) | 1.85 (46.99) | A |
| MRC370V5 | 5 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.18 (55.37) | A |
| MRC370V6 | 6 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.15 (54.61) | A |
| MRC370V7R5 | 7.5 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.36 (59.94) | A |
| MRC370V10 | 10 | 5 | 2.13 (54.10) | 1.34 (34.00) | 2.95 (75.00) | A |
| MRC370V12R5 | 12.5 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.88 (73.15) | A |
| MRC370V15 | 15 | 5 | 2.87 (72.89) | 1.87 (47.50) | 2.95 (74.93) | B |
| MRC370V17R5 | 17.5 | 5 | 2.16 (54.86) | 1.31 (33.27) | 3.95 (100.33) | A |
| MRC370V20 | 20 | 5 | 2.87 (72.89) | 1.87 (47.50) | 2.95 (74.93) | B |
| MRC370V25 | 25 | 5 | 2.16 (54.86) | 1.31 (33.27) | 3.75 (95.25) | A |
| MRC370V30 | 30 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.03 (76.96) | B |
| MRC370V35 | 35 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.94 (100.08) | B |
| MRC370V40 | 40 | 5 | 2.89 (73.41) | 1.85 (46.99) | 3.94 (100.08) | B |
| MRC370V45 | 45 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.95 (100.33) | B |
| MRC370V50 | 50 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.94 (100.08) | B |

### 440VAC Ratings and Dimensions @ 70° Case Temp.

| NTE Type Number | Capacitance | Tolerance | Case Dimensions – Inch (mm) | | | Case Style |
|---|---|---|---|---|---|---|
| | µF | % | W | D | L | |
| MRC440V2 | 2 | 10 | 2.16 (54.86) | 1.31 (33.27) | 1.85 (46.99) | A |
| MRC440V3 | 3 | 5 | 2.16 (54.86) | 1.31 (33.27) | 2.33 (59.18) | A |
| MRC440V4 | 4 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.23 (56.64) | A |
| MRC440V5 | 5 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.63 (66.80) | A |
| MRC440V6 | 6 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.63 (66.80) | A |
| MRC440V7R5 | 7.5 | 10 | 2.16 (54.86) | 1.31 (33.27) | 2.81 (71.37) | A |
| MRC440V10 | 10 | 5 | 2.87 (72.89) | 1.87 (47.50) | 2.95 (74.93) | B |
| MRC440V12R5 | 12.5 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.06 (77.72) | B |
| MRC440V15 | 15 | 5 | 2.13 (54.10) | 1.34 (34.00) | 2.95 (74.93) | A |
| MRC440V17R5 | 17.5 | 10 | 2.91 (73.91) | 1.91 (48.51) | 3.91 (99.31) | B |
| MRC440V20 | 20 | 5 | 2.87 (72.89) | 1.87 (47.50) | 2.95 (74.93) | B |
| MRC440V25 | 25 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.82 (97.03) | B |
| MRC440V30 | 30 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.94 (100.08) | B |
| MRC440V35 | 35 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.94 (100.08) | C |
| MRC440V40 | 40 | 5 | 2.87 (72.89) | 1.87 (47.50) | 4.92 (124.96) | B |
| MRC440V45 | 45 | 5 | 2.87 (72.89) | 1.87 (47.50) | 4.92 (124.96) | B |
| MRC440V50 | 50 | 5 | 2.87 (72.89) | 1.87 (47.50) | 3.94 (100.08) | B |
| MRC440V55 | 55 | 5 | 2.87 (72.89) | 1.87 (47.50) | 5.12 (130.05) | B |
| MRC440V60 | 60 | 5 | 2.87 (72.89) | 1.87 (47.50) | 5.12 (130.05) | B |