

DRY CAPACITORS

FEATURES

- Non-corrosive, flame-retardant UL 94V-2
- Meets EIA standards
- Integral mounting options available for easy installation
- 60,000 hours operational life
- Self-healing metallized polypropylene film
- Automated assembly for consistent results
- Light weight and cost effective

APPLICATIONS

NG dry A.C. motor run capacitors are designed to be used mainly in outdoor applications due to its noncorrosive plastic case. They are used as part of the current limiting circuit for power factor correction. The A.C. capacitors provide direction by shifting the current in the windings so that the motor simulates the operation of a two-phase motor. These motor run capacitors are designed specifically to be used with permanent splitphase capacitor motors in swimming pool and spa applications.

ELECTRICAL TESTING

NG dry motor run capacitors are designed to meet performance testing outlined in the EIA-456 standard. These test programs are run continuously at NG and at third party laboratories to monitor production and for design improvements. These tests confirm the reliable performance of NG capacitors used within rated conditions. Ongoing tests include: accelerated life, over voltage, mechanical, terminal to terminal voltage, and terminal to case voltage tests.



MARKING

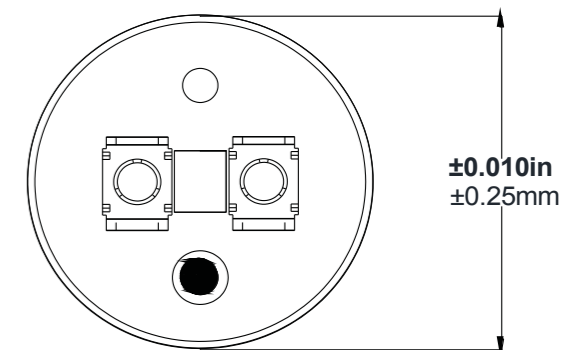
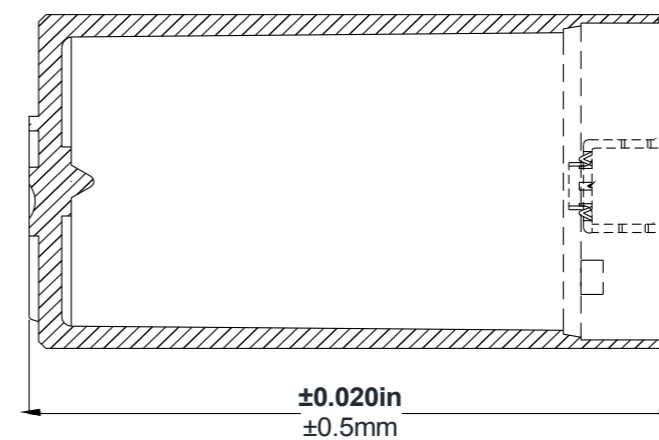
- Manufacturer's name, file number, authorized or trademark
- The part number or the equivalent
- The capacitance in microfarads (uF)
- Voltage rating
- The frequency in HERTZ
- Temperature rating
- Manufacturing Date
- Manufacturer's type designation
- Climatic category
- SH for self-healing capacitors
- Discharge device
- Class of safety protection
- Filling material
- Class of operation or life duration

DRY CAPACITORS ELECTRICAL SPECIFICATIONS

Capacitance Range	From 1 to 200 μ F
Voltage Range	Up to 660Vac at 50/60Hz Other voltages upon request
Tolerance:	6% Standard. Other tolerances upon request
Dissipation Factor:	0.1% Max. at 60Hz and 25°C, 1% at 1kHz and 25°C
Operating Temperature:	-40°C +70°C. (Upon request and certified by UL up to +90°C) Other temperatures upon request.
100% end of line tested:	Terminal to Terminal = 1.41x[1.75 x VAC (rated)] as a DC voltage Terminal to Case = 1.41x[2 x VAC (rated) + 1 KVAC] as a DC voltage D.F. measured at 120Hz at 25°C \pm 5°C Other measured frequencies upon request
100% serialized and 100% end of line data capture:	Capacitance measured at 120Hz and 25°C \pm 5°C D.F. measured at 120Hz and 25°C \pm 5°C Capacitance end of life is = -3% loss of capacitance

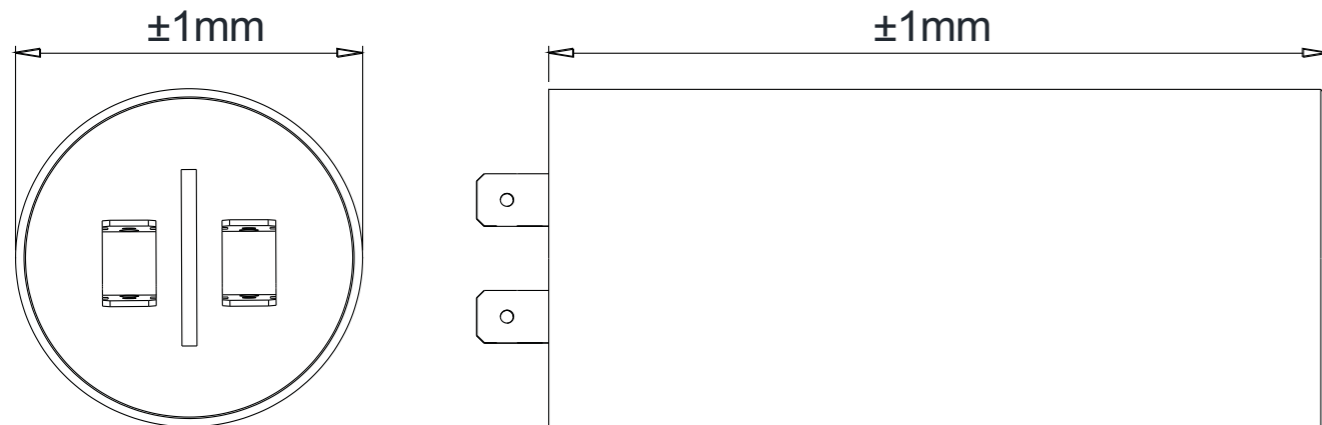
MECHANICAL SPECIFICATIONS / MAXIMUM CAPACITANCE PER THERMOPLASTIC CASE (BLACK)

VOLTAGE [VAC]		240 & 250	300	330 & 370	400, 440 & 450	480
Diameter	Capacitor Height (H)		C. Max. (μ F)	C. Max. (μ F)	C. Max. (μ F)	C. Max. (μ F)
	in	mm				
1.437" (36.50mm)	(1) 2.75	69.85	25.0	15.0	10.0	8.0
	(2) 3.365	85.72	30.0	22.0	12.0	10.0
1.812" (46.02mm)	(4) 3.365	85.72	60.0	40.0	25.0	20.0
	(5) 4.365	111.12	80.0	60.0	35.0	25.0



MECHANICAL SPECIFICATIONS / MAXIMUM CAPACITANCE PER ROUND THERMOPLASTIC SIZES (SNAP)

VOLTAGE [VAC]			240 & 250	300	330 & 370	400, 440 & 450	480
Diameter	Capacitor Height (H)		C. Max. (µF)	C. Max. (µF)	C. Max. (µF)	C. Max. (µF)	C. Max. (µF)
	in	mm					
0.984" [25 mm]	(C) 2.204	56.00	8	5	3	3	2
	(D) 2.342	59.50	8	5	3	3	2
1.181" [30mm]	(E) 2.303	58.50	13	8	6	4	3
	(F) 2.814	71.50	21	13	9	7	5
	(G) 3.759	95.50	29	17	11	9	7
1.377" [35mm]	(H) 2.303	58.5	19	12	8	6	5
	(J) 2.814	71.5	32	20	13	10	8
	(K) 3.759	95.5	44	25	17	14	10
1.574" [40mm]	(L) 2.814	71.50	44	28	19	14	11
	(M) 3.759	95.50	60	35	24	19	14
1.771" [45mm]	(N) 2.814	71.50	58	37	25	19	14
	(O) 3.759	95.50	80	46	31	25	18
	(P) 4.783	121.50	104	70	48	35	25
1.968" [50mm]	(Q) 3.72	94.50	102	59	40	32	23
	(R) 4.704	119.50	140	89	61	45	32



ELECTRICAL SPECIFICATIONS (for Plastic Boxes)

Capacitance Range:	1 to 25 µF (Upto 32 µF under 250VAC)
Tolerance:	± 3%, ±5%, -5% + 10%, ±10 %
Voltage Range:	Higher voltages without UL recognition 180VAC to 450VAC
Operating Temperature: (under special requests)	-40° ~ + 70° C (-40° ~ 158° F) (Standard)
	-40° ~ + 85° C (-40° ~ 185° F)
	-40° ~ + 90° C (-40° ~ 194° F)
Dissipation Factor:	0.1% maximum at 25° C, 60 Hz
Rated Frequency:	50 - 60 HZ
Dielectric Strength:	Terminals to case: Capacitors shall be capable of withstanding the application of 2 x rated AC voltage plus 1,000 volts for one second. Between terminals: Capacitors shall be capable of withstanding the application of 1.75 x rated AC voltage for one second.