

Motor Start Electrolytic Capacitors



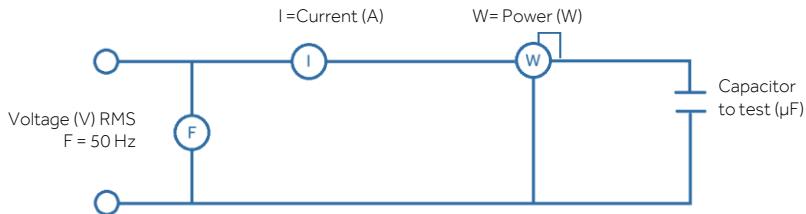
PERFORMANCE DATA

- Rated Voltage 320 Vac (capacitance \leq 315 μ F)
250 Vac (capacitance \geq 315 μ F)
- Rated Frequency 50 / 60 Hz
- Capacitance Range from 25 μ F to 550 μ F
- Capacitance Tolerance - 0% + 25% or -/+ 10%
- Working Condition The standard time rating defined of IEC 252 is 1,67% full time and corresponds to a duty cycle of 3 seconds on and 177 seconds off.

The EL electrolytic capacitor have **high capacitance** (μ F value) able to provide an high starting torque to the motor. It is a non polarized capacitor especially designed for intermittent AC voltage applications for single-phase motors.

TECHNICAL DATA

Operating Temperature	-45 °C / +65 °C (higher temperatures on request)
Storage Temperature	-40 °C / +70 °C
Endurance test	500 h
Dissipation Loss Angle	Measurement frequency: 50 Hz, the typical value shall not exceed 0,10, calculated as follows: $Tan \delta = W / (V \times I) = (\text{true watts} / \text{apparent watts})$
Capacitance Measurement	Capacitance shall be determined by measuring the current – after 2/3 sec. of energizing – through the capacitor at rated voltage and frequency. The capacitance is defined as follows: $C = (I \times 10^6) / 2 \pi^2 \times f \times V$



TYPICAL VALUES

For Single-phase Motor	kW	0,074	0,183	0,368	0,552	0,736	1,104	1,472
	HP	1/10	1/4	1/2	3/4	1	1,5	2
220 V		20 μ F	50 μ F	100 μ F	150 μ F	200 μ F	300 μ F	-
280 V		10 μ F	25 μ F	50 μ F	80 μ F	100 μ F	150 μ F	200 μ F

Note: the indicated voltages are the working capacitor voltages

STANDARDS AND APPROVALS

Reference standards CEI EN 60252-2 (capacitor); CEI EN 60695-11-10 (electrolyte).

Directives It complies with the RoHs Directive

CONFIGURATION

Table

Type	Cn (μ F)	Rated Voltage	Dimension D x H ₁ /H ₂ (mm)
8150610	25 - 31,5	250/320	46 x 98
8150710	31,5 - 40	250/320	46 x 98
8150810	40 - 50	250/320	46 x 98
8150910	50 - 63	250/320	46 x 98
8151010	63 - 80	250/320	46 x 98
8151110	80 - 100	250/320	46 x 98
8151210	100 - 125	250/320	46 x 98
8151310	125 - 160	250/320	46 x 98
8151410	160 - 200	250/320	46 x 98
8151510	200 - 250	250/320	46 x 98
8151610	250 - 315	250/320	46 x 98
8141710	315 - 400	250	46 x 98
8141810	400 - 480	250	46 x 98
8141910	450 - 550	250	46 x 98

Other solutions are available on request.

Optional requests:

- **Protective cap**, code 730050;
- **Mounting bracket**, code 565008;
- **Bipolar cable**, length 300 mm with Female Faston 6,35 mm, code 7850694;
- EL Capacitors can be equipped with **Resistors** (codes on request);
- EL Capacitors can be supplied in a more compact version, with a **diameter of 36,5 mm** (codes on request).

MECHANICAL CONFIGURATION

Case	Plane base self-extinguishing (V2) plastic case
Finishing	Double faston terminal. Size = 6,3 x 0,8 mm
Figure	