



## Film Capacitors – AC Capacitors

### Motor Start Capacitor

<b>Series/Type:</b>	<b>Substitute of Motor Start Application</b>
<b>Ordering code:</b>	<b>B32328F*</b>
<b>Date:</b>	<b>2023-02-06</b>
<b>Version:</b>	<b>4</b>

### Construction

- Dielectric: polypropylene film
- Plastic case
- Polyurethane resin
- Dry type

### Features

- Self-healing properties
- Low dissipation factor
- High insulation resistance
- P0 safety class

### Typical applications

- For general sine wave applications, mainly for motor start application

### Terminals

- Wire with sleeve






Technical data and specifications		
Reference standards	IS 2993	
Safety class to IS 2993	P0	
Rated maximum duty cycle	2.2%	
Rated capacitance C <sub>R</sub>	As per dimension table	
Tolerance	± 5%	
Rated voltage V <sub>R</sub>	250 V AC	
Rated frequency f <sub>R</sub>	50/60 Hz	
Maximum ratings		
Maximum permissible voltage V <sub>max</sub>	1.1 V <sub>R</sub>	(V <sub>R</sub> = rated voltage)
Maximum permissible current I <sub>max</sub>	1.3 I <sub>R</sub>	( I <sub>R</sub> = rated current )

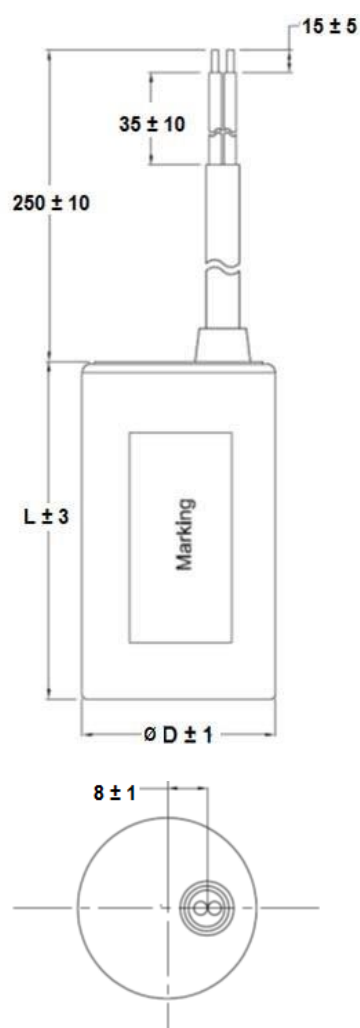
# Film Capacitors – AC Capacitors

B32328F\*

## Motor Start Capacitor

## Substitute of Motor Start Application

Test data	
AC test voltage terminal to terminal $V_{TT}$	2 $V_R$ , 2 s (routine test) 2 $V_R$ , 60 s (type test)
Dissipation factor $\tan \delta$ at +20 °C	$\leq 2.0 \times 10^{-2}$ (1KHz)
Maximum rate of voltage rise $dv/dt_{max}$	10 V/ $\mu$ s
Climatic data	
Climatic category	25/070/21
Lower category $T_{min}$	-25 °C
Upper category $T_{max}$	+70 °C
Damp heat test $t_{test}$	21 days
Mechanical and thermal properties	
Plastic can and top disk material	Compliant to IS 2993
Compatibility to RoHS	
Compliance to directive 2011/65/EU	
Marking	<div data-bbox="884 1061 1458 1285">  <div> <div>Cx <math>\mu</math>F Tx %</div> <div> <math>V_{RMS}</math> VAC 25/070/21 MPP 'SH' PO Number </div> </div> <div> B32328F IS 2993      WW.YY </div> </div> <div data-bbox="951 1308 1362 1456"> <div> IS 2993:1998    CML-7800031911 </div> <div> 250V PO  Rated duty cycle  1min 2.2%,50Hz </div> </div> <p>For Motor Start application( Range:X-Y)</p> <p>Where,  Cx – Capacitance Value  <math>V_{RMS}</math>– rated AC voltage  Tx% - Tolerance on capacitance  WW.YY – Week code  PO No. – Internal traceability number  X-Y – Capacitance range</p>

**Dimensional drawing**


**Ordering codes and packing units**

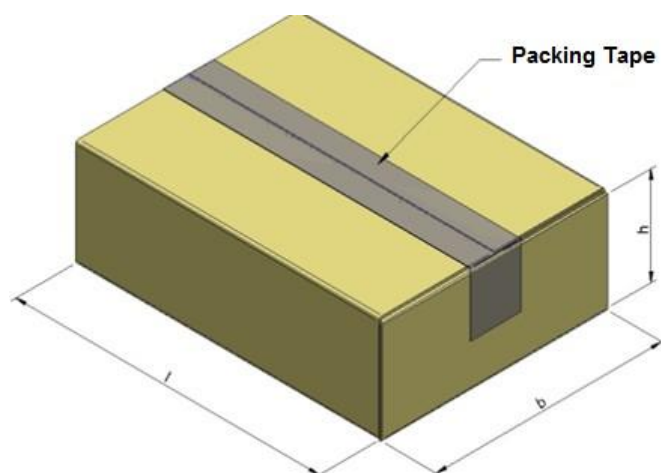
Voltage	Capacitance	Dimensions	Ordering code
VAC	μF	ØD x L (mm)	
250	30	35 x 70	B32328F1306J018
	40	40 x 73	B32328F1406J018
	45	35 x 96	B32328F1456J018
	60	40 x 96	B32328F1606J018
	72	40 x 96	B32328F1726J018
	75	40 x 96	B32328F1756J018
	82	45 x 96	B32328F1826J018
	90	45 x 96	B32328F1906J018
	100	45 x 96	B32328F1107J0 18
	105	50 x 95	B32328F1107J518
	120	50 x 95	B32328F1127J018

**Equivalent rating in advanced film technology construction for Motor start application**

Motor start capacitor rating in Aluminum electrolytic construction	Motor start capacitor in advanced film technology **
40-60	30
60-80	45
80-100	60
100-120	75
120-150	90
150-200	105
200-250	120

\*\* The equivalent ratings given are only recommendations. Customer shall take trials to finalise the suitable ratings in the respective applications.

### Packing specification



Dimensions D x L (mm)	Unit carton				Master carton			
	$l \pm 10$	$b \pm 10$	$h \pm 10$	Qty	$l \pm 10$	$b \pm 10$	$h \pm 10$	Qty
35 x 95	455	230	130	50	490	470	270	200
40 x 95	455	230	130	50	490	470	270	200
45 x 95	250	250	145	25	530	270	300	100
50 x 95	280	280	170	25	580	290	360	100

### Cautions and warnings

⚠ Please read “Applications warning, installation and maintenance instructions” and the “General Safety Data Sheet for Power Capacitors” issued by ZVEI, which are available on the internet at [www.tdk-electronics.tdk.com/ac\\_capacitors](http://www.tdk-electronics.tdk.com/ac_capacitors), to ensure optimum performance and to prevent products from failing, and in worst case, bursting and fire. Information given in the data sheet reflects typical specifications. You are kindly requested to approve our product specifications or request our approval for our specification before ordering.

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## Important notes

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