Leclanché Capacitors
Avenue de Grandson 48
1400 Yverdon-les-Bains, Switzerland

Order code: DTIC 300-1100 r (K)

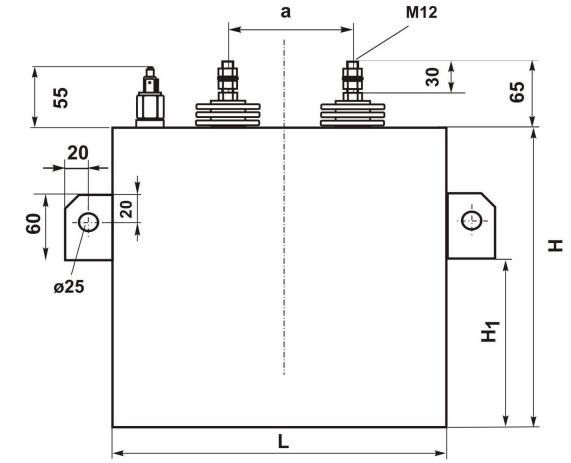
Application: AC/DC capacitor for general use in power electronics also for nonsinusoidal voltages and currents

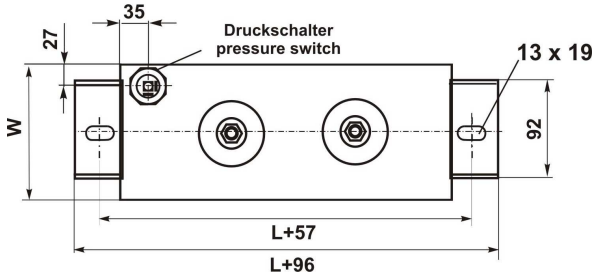
Standard: acc. to IEC 61071:2007

Characteristics

Rated capacitance	C_N	1100	µF ±10%
Rated d.c. voltage	U_{NDC}	3000	V d.c.
Rated a.c. voltage	U_{NAC}	1700	V a.c.
Insulation voltage	U_i	2200	V
Non-recurrent surge voltage	u_s	4500	V
Rated energy	W_N	5000	Ws
Maximum current	I_{max}	250	A
Maximum peak current	$\hat{I}$	50	kA
Maximum surge current	I_s	150	kA
Series resistance	R_s	0.35	mΩ
Tangent of the loss angle	$\tan\delta_o$	2	$x10^{-4}$
Self discharge time const.	$C \times R_{is}$	10000	s
Self inductance	Le ~	120	nH
Resonance frequency	f_r ~	14	kHz

outline drawing





Thermal conditions

Lowest operating temperature	Θ_{min}	-25	℃
Maximum operating temperature	Θ_{max}	70	℃
Thermal resistance	R_{th}	0.3	K/W

Maximum power loss

P_{max}	at Θ_{amb}
53 W	55 ℃
36 W	60 ℃
18 W	65 ℃
0 W	70 ℃

Storage temperature	$\Theta_{storage}$	-40..+85	℃
Humidity class		C	

Service life

Load duration	100000	h
at $\Theta_{hotspot}$	≤0	℃
Failure quota	100	FIT

Test data

Voltage test between terminals	U_{BB}	4500	V DC/10s
A.C. voltage test terminal/contai	U_{BG}	5400	V AC/10s

Dimensions

Height of the case	H	815	mm
Length of the case	L	340	mm
Width of the case	B	140	mm
Distance of terminals	a	140	mm
Height of the brackets	H_1	665	mm
Clearance in air	L	45	mm
Creepage distance	K	120	mm

Approx weight 47 kg

Mechanical characteristics

Construction	AC/DC - metallized polypropylene capacitor, self-healing,metallic case
Protection	without internal fuse, to be used only in uncritical environment
Impregnant	dry type ,resin moulded (Non PCB)
Fire load	1800MJ