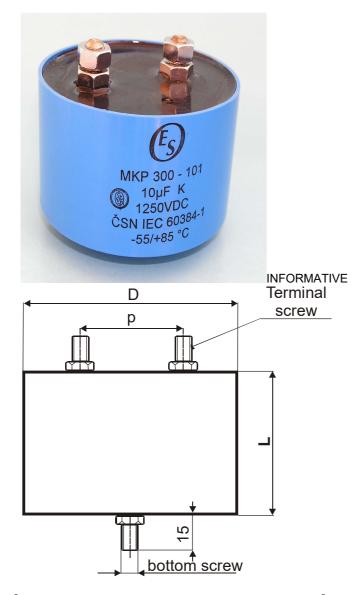
## Elektronické součástky CZ, a.s.

## **KPI 300-249 CAPACITORS FOR AC HIGH PULSE LOADING**



Capacit.		D	Dimensions [mm]	
C <sub>R</sub> [μF]	D	L	р	Terminal screws
2	75	100	40	M8

Other Capacitance on request

## **Construction:**

Metal electrodes, polypropylene film dielectric, Non-inductive, self-healing construction, Plastic cylindrical flame retardant case, with bottom screw M10x15 available **Applications:** High pulse loading, high current and other AC applications **Technical data Rated voltage U**<sub>R</sub>: 3000V DC Rated voltage is the max. DC or peak voltage, for which the capacitor is designed. If the capacitor works with the DC and also

super-imposed AC voltage  $U_{AC}$ , the sum of DC and the amplitude of AC must not exceed the  $U_{R}$ **Max permissible AC voltage:** 1000V 50/60Hz, If the working frequency is higher, the permissible AC voltage must be decreased, not to exceed the max. loss power of the capacitor.

Max.UAC(f) = 
$$\sqrt{\frac{PL}{2 \pi f CR \times tg\delta}}$$

Rated capacitance: up to  $10\mu F$ Tolerance:  $\pm 10\%$ ,  $\pm 5\%$ , Dissipation factor Tg $\delta$ : < 0,001 at 1kHz and +25°C ESR : <  $5m\Omega$  at 10kHz and +25°C Insulation resistance R<sub>IS</sub>: > 1000 [M $\Omega$ ] Operating temperature range:  $-55 \div +85°$ C The highest permissible capacitor temperature at the hottest point of the case must not exceed +85°C. Max . permitted dissipation power of the capacitor P<sub>L</sub>: depend on the construction of the capacitor and the cooling conditions, see table. Test voltage between terminals: 1,25 x U<sub>R</sub>, 1min. at +25°C

All capacitors are tested by the routine test by the producer

Protection against Over-voltages:

The capacitors are self-healing and regenerate themselves after occasional breakdowns. The capacitor remains fully functional after the breakdown. **Permitted Over-voltages in working conditions:** 

1,1 x  $U_R$  max. 10% of the service period If the Over-voltages exceed the permissible values above, the capacitor might have been destroyed. **Test voltage between terminals and case:** 3000VDC, 1min. at +25°C

Max. repetitive rate of voltage rise dU/dt: <  $1000V/\mu$ sec at U<sub>R</sub> and  $+25^{\circ}C$ Max. peak current I<sub>p</sub>: < C<sub>R</sub> x dU/dt

## Related standards: ČSN EN 60384-1 Marking for purchase ordering: KPI300-249 2µF±10% 3000VDC/1000V 50Hz

**Warning!** The manufacturer is not responsible for any damages, caused by the improper installation and application. Before using the capacitor in any application, pleas, read carefully this technical data-sheet.