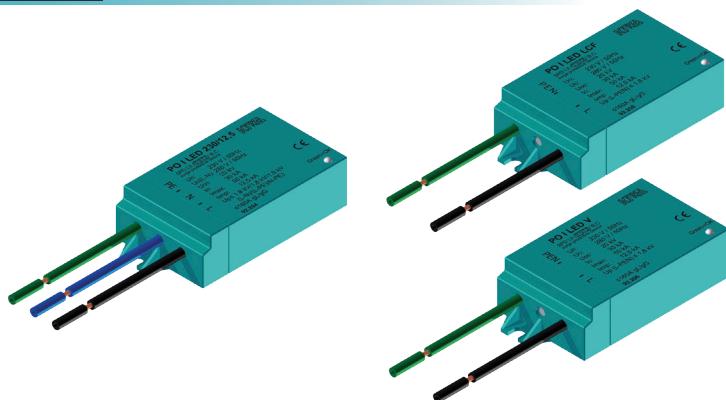
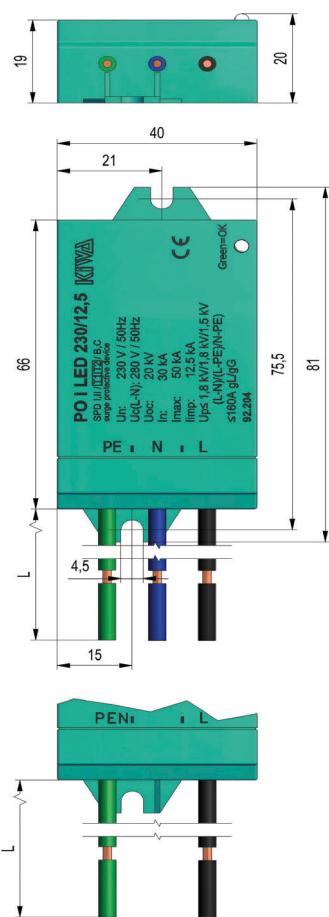


PO I LED, PO I LED V, PO I LED LCF (230V/12,5kA)

- Usage for LED lights as 1st and 2nd level (**T1** coarse and **T2**, medium) in 3-level overvoltage protection concept.
- It decreases overvoltage and reduces overvoltage wave energy caused by induction and switching processes in the connected low voltage network.
- Installation into the installation boxes to terminals of protected appliance or cable channel.
- Protection against the transverse and longitudinal overvoltage (L/N, L/PE, N/PE) and (L/PEN).
- Protective effect provided by a varistor combined with spark gap.
- Optical signalization of operational state.



DIMENSIONS



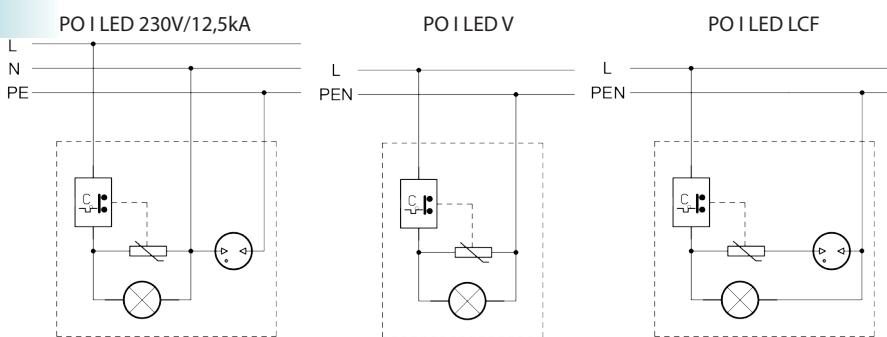
TECHNICAL PARAMETERS

TYPE	PO I LED	PO I LED V	PO I LED LCF
Specification	TN-S Patented	TN-C Patented	TN-C Patented
Connection	wire 2,5mm ²	wire 2,5mm ²	wire 2,5mm ²
L (mm)	160	160	160
Nominal voltage	U_n 230 V AC	230 V AC	230 V AC
Max. operation voltage	U_c 280 V AC	280 V AC	280 V AC
Impulse current (10/350) T1	I_{imp} 12,5 kA	12,5 kA	12,5 kA
Nom. discharge current (8/20) T1 T2	I_n 30 kA	30 kA	30 kA
Max. discharge current (8/20)	I_{max} 50 kA	50 kA	50 kA
Open circuit voltage	U_{oc} 20 kV	20 kV	20 kV
Voltage protection level	U_p (L-N) $\leq 1,5$ kV U_p (L-PE) $\leq 1,8$ kV U_p (N-PE) $\leq 1,5$ kV U_p (L-PEN) - $\leq 1,5$ kV $\leq 1,8$ kV	- - - - $\leq 1,5$ kV	- - - - $\leq 1,8$ kV
Response time	t_A (L-N) <25 ns t_A (L-PE) <100ns	<25 ns <100ns	<25 ns <100ns
Prospective short-circuit current of a power supply	I_p 25 kA _{ef}	25 kA _{ef}	25 kA _{ef}
Overcurrent protection gL/gG or a protector B, C	≤ 160 A	≤ 160 A	≤ 160 A
Operating temperature range	T_A -45 to +85 °C	-45 to +85 °C	-45 to +85 °C
Storage temperature range	T_{stg} -45 to +85 °C	-45 to +85 °C	-45 to +85 °C
Isolation voltage capability min.* ¹	2200 V	2200 V	2200 V
Degree of protection	IP 66		
Status indication of TDD (Thermic Disconnecting Device)		optical, green (OK)	
Colour		turquoise blue; RAL 5018	
Dimensions (mm)		40 x 81 x 20	
Products comply with norms	EN 61643-11 IEC 61643-1 VDE 0675-06	type 1 T1 + type 2 T2 + type 3 T3 Class I + Class II + Class III Klasse B + Klasse C + Klasse D	

Note: *¹ (When the thermal disconnect opens)

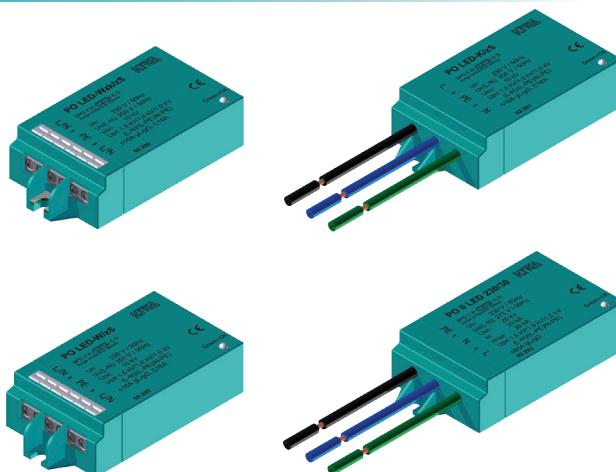
PRODUCT SPECIFICATION

TYPE	Order No.	Package
PO I LED 230V/12,5kA	92.204	1 pc
PO I LED V 230V/12,5kA	92.206	1 pc
PO I LED LCF 230V/12,5kA	92.205	1 pc



PO II LED, PO LED

- Usage for LED lights as 2nd and 3rd level (**T2** medium and **T3** fine protection) in 3-level overvoltage protection concept.
- It decreases overvoltage and reduces overvoltage wave energy caused by induction and switching processes in the connected low voltage network.
- Installation into the cable channel and installation boxes or to terminals of the protected appliance.
- Protection against the transverse and longitudinal overvoltage (L/N, L/PE, N/PE).
- Protective effect provided by a varistor combined with spark gap.
- Optical signalization of operational state.

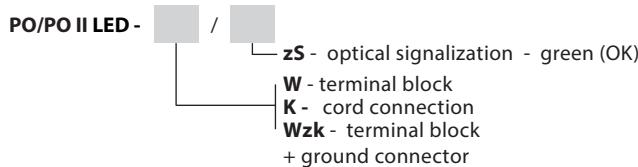


TECHNICAL PARAMETERS

TYPE	PO II LED 230V/30kA	PO LED-W/zS/zS	PO LED-W/zS	PO LED-K/zS
Connection	wire 2,5mm ²	terminal block, max. 1,5mm ²		wire 1,5mm ²
L (mm)	160	-		160
Nominal voltage	U _n 230 V AC		230 V AC	
Max. operation voltage	U _c 275 V AC		350 V AC	
Nominal discharge current (8/20) T2	I _n 20 kA		5 kA	
Max. discharge current (8/20)	I _{max} 30 kA		10 kA	
Open circuit voltage	U _{oc} 20 kV		10 kV	
Voltage protection level	U _p (L-N) U _p (L-PE) U _p (N-PE)	≤1,4 kV ≤1,4 kV ≤1,4 kV	≤1,5 kV ≤1 kV ≤1 kV	
Response time	t _A (L-N) t _A (L-PE)	<25 ns <100ns	<25 ns <100ns	
Prospective short-circuit current of a power supply	I _p 25 kA _{ef}		10 kA _{ef}	
Overcurrent protection gL/gG or a protector B, C	≤80 A		≤16 A	
Operating temperature range	T _A - 45 ... + 85 °C		- 25 ... + 80 °C	
Storage temperature range	T _{stg} - 45 ... + 110 °C		-	
Isolation voltage capability min.* ¹	1500 V		-	
Degree of protection	IP 66		IP 20	
Status indication of TDD (Thermic Disconnecting Device)		optical, green (OK)		
Colour		turquoise blue; RAL 5018		
Dimensions (mm)		40 x 73,5 x 20		
Products comply with norms EN 61643-11 IEC 61643-1 VDE 0675-06		type 2 T2 + type 3 T3 class II + class III Klasse C + Klasse D		

Note: *¹ (When the thermal disconnect opens)

PRODUCT SPECIFICATION



Condition of 10 y. Warranty: Although the surge protective unit PO LED itself provides protection against overvoltage, it is necessary that its installation is performed with a front-end protecting device of the Type 1 (or Type 2) in accordance with the concept of over-voltage protection coordination.

TYPE	Order No.
PO LED-W/zS/zS	92.200
PO LED-K/zS	92.201
PO LED-W/zS	92.202
PO II LED 230V/30kA	92.203