# Lightning and Surge Arrester TYPE 1+2 

VARISTOR
TYPE $1+2$ / CLASS I +1 / / C€

$-^{17.5}$


## PZH R1 275/12,5, PZH R1 275/12,5 S

PZH R1* is a lightning and surge arrester according to EN 61643-11 ed.2 (IEC 61643-11:2011) consisting of high energy varistors. Its parameters enable usage in buildings with considerable levels of protection LPL III and LPL IV, such as small administration complexes, residential buildings, family houses or properties and halls without the incidence of persons and indoor equipment. The device is to be installed on the interface of LPZ 0 - LPZ 1 and higher zones according to standard EN 62305 ed. 2 (IEC 62305:2010), closest to where overhead line enters the building i.e. in the main distribution boards. $\mathbf{S}$ indication specifies a version with remote monitoring.

| TYPE | PZH R1 275/12,5, PZH R1 275/12,5 S |  |
| :---: | :---: | :---: |
| Test class according to EN 61643-11 ed.2 (IEC 61643-11:2011) |  | TYPE 1+2, CLASS I+II |
| Max. continuous operating voltage | $U_{C}$ | 275 V AC / 350 V DC |
| Maximum discharge current (8/20) | $I_{\text {max }}$ | 50 kA |
| Impulse discharge current for class I test (10/350) | $\mathrm{I}_{\text {imp }}$ | 12,5 kA |
| Charge | Q | 6,25 As |
| Specific energy | W/R | $39 \mathrm{~kJ} / \mathrm{\Omega}$ |
| Nominal discharge current for class II test (8/20) | $I_{n}$ | 25 kA |
| Voltage protection level | $U_{p}$ | $<1,2 \mathrm{kV}$ |
| Temporary overvoltage (TOV) | $U_{T}$ | $337 \mathrm{~V} / 5 \mathrm{~s}$ |
| Response time | $\mathrm{t}_{\text {A }}$ | $<25 \mathrm{~ns}$ |
| Max. back-up fuse |  | $160 \mathrm{AgL} / \mathrm{gG}$ |
| Short-circuit withstand capability $160 \mathrm{AgL} / \mathrm{gG}$ | $I_{p}$ | 60 kA rms |
| LPZ |  | 0-1 |
| Housing material |  | Polyamid PA6, UL94 V-0 |
| Degree of protection of enclosure |  | IP20 |
| Operating temperature range | $\vartheta$ | $-40^{\circ} \mathrm{C} \ldots+70^{\circ} \mathrm{C}$ |
| Cross-section of the connected conductors (at tightening moment of clamps 3 Nm ) |  | $25 \mathrm{~mm}^{2}$ (solid) - $16 \mathrm{~mm}^{2}$ (wire) |
| The mounting method/ operating position |  | DIN rail $35 \mathrm{~mm} /$ any |
| Failure signalisation |  | optical function signalization target clear - ok optical function signalization target red - fault |
| Potential free signal contact (S) (recommended cross-section of remote monitoring max. $1 \mathrm{~mm}^{2}$ ) |  | AC: $250 \mathrm{~V} / 0,5 \mathrm{~A}, \mathrm{DC}: 250 \mathrm{~V} / 0,1 \mathrm{~A}$ |
| Lifetime |  | min. 100000 h |
| Weight |  | 140 g |
| Article number |  | 7710058,7710007 |

