

Pluggable Multi-Pole SPD
ProTec T2 3+0
Class II • Type 2 • Type 1CA



Location of Use: Sub-Distribution Boards
 Network Systems: TN-C
 Mode of Protection: L-PEN
 Surge Ratings: $I_n = 20\text{ kA}$ (8/20 μs)
 IEC/EN/UL Category: Class II / Type 2 / Type 1CA
 Protective Elements: High Energy MOV
 Housing: Pluggable Design
 Compliance: IEC 61643-11:2011
 EN 61643-11:2012
 UL 1449 4th Edition

Technical Data

| ProTec T2-xxx-3+0(-R) | | 150 | 300 | 350 | 480 | 750 |
|---|------------|------------------|-----------|-----------|-----------|-----------|
| IEC Electrical | | | | | | |
| Nominal AC Voltage (50/60Hz) | U_o/U_n | 120V | 240V | 277V | 400V | 600V |
| Maximum Continuous Operating Voltage (AC) | U_c | 150V | 300V | 350V | 480V | 750V |
| Nominal Discharge Current (8/20 μs) | I_n | 20 kA | 20 kA | 20 kA | 20 kA | 20 kA |
| Maximum Discharge Current (8/20 μs) | I_{max} | 50 kA | 50 kA | 50 kA | 50 kA | 35 kA |
| Voltage Protection Level | U_p | 1250V | 1500V | 1750V | 2300V | 3400V |
| Response Time | t_A | < 25 ns | | | | |
| Back-Up Fuse (max) | | 315 A / 250 A gG | | | | |
| Short-Circuit Current Rating (AC) | I_{SCCR} | 25 kA / 50 kA | | | | |
| TOV Withstand 5s | U_T | 229V | 337V | 403V | 581V | 871V |
| TOV 120min | U_T | 229V | 442V | 529V | 762V | 1143V |
| | mode | Withstand | Safe Fail | Safe Fail | Safe Fail | Safe Fail |
| Number of Ports | | 1 | | | | |

| | | | | | | |
|---|-------|--------|--------|--------|--------|--------|
| UL Electrical | | | | | | |
| Maximum Continuous Operating Voltage (AC) | MCOV | 150V | 300V | 350V | 480V | 750V |
| Voltage Protection Rating | VPR | 600V | 900V | 1000V | 1500V | 2500V |
| Nominal Discharge Current (8/20 μs) | I_n | 20 kA | 20 kA | 20 kA | 20 kA | 20 kA |
| Short-Circuit Current Rating (AC) | SCCR | 200 kA | 150 kA | 200 kA | 200 kA | 200 kA |

| | | | | | | |
|---------------------------------------|-----------|--|--|--|--|--|
| Mechanical & Environmental | | | | | | |
| Operating Temperature Range | T_a | -40 °F to +185 °F [-40 °C to +85 °C] | | | | |
| Permissible Operating Humidity | RH | 5%...95% | | | | |
| Altitude | | 13123 ft [4000 m] | | | | |
| Terminal Screw Torque | M_{max} | 39.9 lbf-in [4.5 Nm] | | | | |
| Conductor Cross Section (max) | | 2 AWG (Solid, Stranded) / 4 AWG (Flexible) 35 mm ² (Solid, Stranded) / 25 mm ² (Flexible) | | | | |
| Mounting | | 35 mm DIN Rail, EN 60715 | | | | |
| Degree of Protection | | IP 20 (built-in) | | | | |
| Housing Material | | Thermoplastic: Extinguishing Degree UL 94 V-0 | | | | |
| Thermal Protection | | Yes | | | | |
| Operating State / Fault Indication | | Green Flag / Not Green Flag | | | | |
| Remote Contacts (RC) | | Optional | | | | |
| RC Switching Capacity | | AC: 250V/1A, 125V/1A; DC: 48V/0.5A, 24V/0.5A, 12V/0.5A | | | | |
| RC Conductor Cross Section (max) | | 16 AWG (Solid) / 1.5 mm ² (Solid) | | | | |

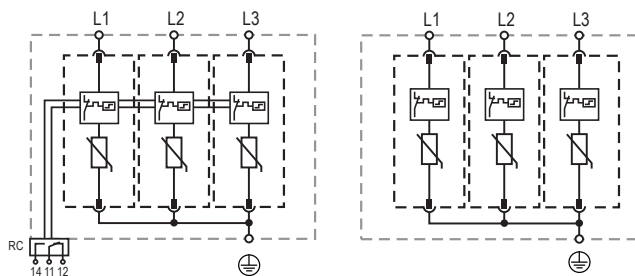
| Order Information | | | | | | |
|--|--|---------|---------|---------|---------|---------|
| Order Code | | 150 | 300 | 350 | 480 | 750 |
| ProTec T2-xxx-3+0 | | 59.0091 | 59.0093 | 59.0095 | 59.0097 | 59.0099 |
| ProTec T2-xxx-3+0-R (with remote contacts) | | 59.0092 | 59.0094 | 59.0096 | 59.0098 | 59.0100 |
| ProTec T2-xxx-P | | 59.0064 | 59.0065 | 59.0066 | 59.0067 | 59.0068 |

ProTec T2 3+0

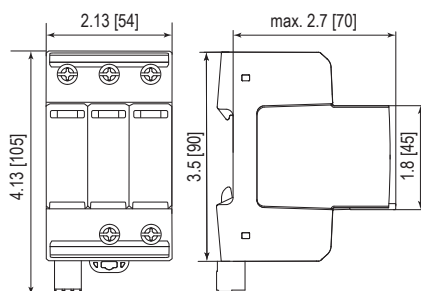
Internal Configuration

Legend

- L Line
- ⊕ Protective Earth
- RC Remote Contacts Optional



Dimensions & Packaging

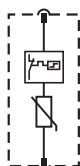


Dimensions & Packaging

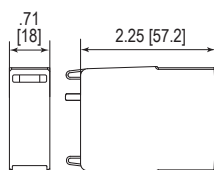
| | | 150 | 300 | 350 | 480 | 750 |
|---------------------------------|--------|------------|------------|--|------------|------------|
| Single Unit Weight | pounds | .761 | .807 | .840 | .874 | .979 |
| | grams | 345 | 366 | 381 | 396 | 444 |
| | | 150 | 300 | 350 | 480 | 750 |
| Single Unit Weight | pounds | .783 | .829 | .862 | .896 | 1.001 |
| | grams | 355 | 376 | 391 | 406 | 454 |
| Single Unit DIN 43880 Dimension | | | | 3 TE | | |
| Packaging Dimensions (HxWxL) | | | | 4.3 x 4.5 x 13.8" [109 x 115 x 352 mm] | | |
| Minimum Order Quantity | | | | 5 Units | | |

Plug Internal Configuration

ProTec T2-xxx-P



Dimensions & Packaging



Dimensions & Packaging

| | | 150 | 300 | 350 | 480 | 750 |
|---------------------------------|--------|------|------|-------------------------------------|------|------|
| Single Unit Weight | pounds | .120 | .135 | .146 | .157 | .192 |
| | grams | 54 | 61 | 66 | 71 | 87 |
| Single Unit DIN 43880 Dimension | | | | 1 TE | | |
| Packaging Dimensions (HxWxL) | | | | 3.3 x 4.6 x 12" [83 x 116 x 305 mm] | | |
| Minimum Order Quantity | | | | 24 Units | | |

inches
[mm]

Information contained in this document is subject to change at any time without notice.



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