

**Surge protection  
SPD II 2 PV 1000VDC****Weidmüller Interface GmbH & Co. KG**

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Surge protection for use on the DC side of photovoltaic installations. The SPD II PV series is tested according to UL 1449 ed. 3 (file E354261) as type 4 for use in type 2 applications. This series is assembled according to the respective PV voltage (600 V, 1000 V, 1200 V) and has a nominal discharge current of up to 50 kA (8/20  $\mu$ s) per path. The SPD II has a compact and modular structure and a standard module width of 17.8 mm; it allows rapid and simple exchange of the varistor protection. The SPD PV arrestor consists of 2 elements.

**General ordering data**

|            |                               |
|------------|-------------------------------|
| Order No.  | <a href="#">1348490000</a>    |
| Type       | SPD II 2 PV 1000VDC           |
| Version    | Surge protection, Low voltage |
| GTIN (EAN) | 4050118152906                 |
| Qty.       | 1 pc(s).                      |

## Surge protection SPD II 2 PV 1000VDC

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## Technical data

### Dimensions and weights

|       |         |            |       |
|-------|---------|------------|-------|
| Width | 36 mm   | Height     | 90 mm |
| Depth | 73.5 mm | Net weight | 288 g |

### Temperatures

|                       |                 |                     |                 |
|-----------------------|-----------------|---------------------|-----------------|
| Operating temperature | -40 °C...+70 °C | Storage temperature | -40 °C...+85 °C |
|-----------------------|-----------------|---------------------|-----------------|

### General data

|                   |                                |                           |                                                   |
|-------------------|--------------------------------|---------------------------|---------------------------------------------------|
| Colour            | Light Grey                     | Design                    | Installation housing; 2TE                         |
| Height with TS 35 | 74 mm                          | Lightning arrester        | No                                                |
| Mounting rail     | TS 35, TS 35 x 15, TS 35 x 7.5 | Optical function display  | green = OK; red = arrester is defective - replace |
| Protection degree | IP 20                          | UL 94 flammability rating | V-0                                               |

### Insulation coordination acc. to EN 50178

|                    |   |                        |     |
|--------------------|---|------------------------|-----|
| Pollution severity | 2 | Surge voltage category | III |
|--------------------|---|------------------------|-----|

### technical data

|                                        |               |                                     |               |
|----------------------------------------|---------------|-------------------------------------|---------------|
| Max. continuous voltage, $U_c$ (DC)    | 1000 V        | Total discharge current $I_{total}$ | 40 kA         |
| Discharge current, max. (8/20 $\mu$ s) | 20 kA         | Protection level $U_p$ (typ.)       | $\leq 4000$ V |
| Colour                                 | Light Grey    | AC/DC/UC                            | DC            |
| Response time                          | $\leq 100$ ns |                                     |               |

### Connection data

|                                                                 |                    |                                                                 |                     |
|-----------------------------------------------------------------|--------------------|-----------------------------------------------------------------|---------------------|
| Clamping range, rated connection                                | 25 mm <sup>2</sup> | Clamping range, rated connection, min.                          | 4 mm <sup>2</sup>   |
| Clamping range, rated connection, max.                          | 35 mm <sup>2</sup> | Wire connection cross section, stranded, rated connection, min. | 2.5 mm <sup>2</sup> |
| Wire connection cross section, stranded, rated connection, max. | 25 mm <sup>2</sup> | Tightening torque, min.                                         | 2.5 Nm              |
| Tightening torque, max.                                         | 3 Nm               | Stripping length, rated connection                              | 15 mm               |

### Photovoltaic technical data

|                                                                |            |                                              |        |
|----------------------------------------------------------------|------------|----------------------------------------------|--------|
| Maximum continuous operating voltage UCPV mode +/-, -/PE, +/PE | 1,000 V DC | Protection level $U_p$ at $I_n$ (per module) | 4000 V |
| Protection level $U_p$ mode (+/-, -/PE, +/PE)                  | 4000 V     |                                              |        |

### Rated data UL

|                |                                     |                             |           |
|----------------|-------------------------------------|-----------------------------|-----------|
| Category       | Typ 2                               | $I_{max}$                   | 20 kA     |
| $I_n$          | 10 kA                               | MCOV                        | 1,000 Vdc |
| SCCR           | 200 kA                              | Test Voltage 39.1 (UL 1449) | 1,000 V   |
| UL certificate | E-File 354261 Type 2 by UL1449 Ed.3 | VPR                         | 4 V       |

### Classifications

|            |             |            |             |
|------------|-------------|------------|-------------|
| ETIM 3.0   | EC000941    | UNSPSC     | 30-21-19-21 |
| eClass 5.1 | 27-13-08-01 | eClass 6.2 | 27-13-08-02 |
| eClass 7.1 | 27-14-02-01 |            |             |

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## Technical data

### Approvals

Approvals



ROHS

Conform

### Downloads

|                           |                                |
|---------------------------|--------------------------------|
| Declaration of Conformity | <a href="#">K481_05_12.pdf</a> |
| EPLAN                     | <a href="#">1348490000.ema</a> |

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## Drawings

### Electric symbol

