



**Article number:** 231 781  
**Description:** SMC 7000TL

**Input variables (DC)**

|                                |               |                   |
|--------------------------------|---------------|-------------------|
| Max. output                    | $P_{PV, max}$ | 7200 W            |
| Voltage range                  | $U_{PV}$      | 335 – 700 V       |
| Max. input voltage             | $I_{PV, max}$ | 21 A              |
| Max. no. of strings (parallel) |               | 4                 |
| Separator                      |               | MC-T3 plug system |
| Earth leakage protection       |               | Yes               |
| Reverse battery protection     |               | Yes               |

**Output values (AC)**

|                         |               |                           |
|-------------------------|---------------|---------------------------|
| Max. output             | $P_{AC, max}$ | 7000 W                    |
| Power rating            | $P_{AC, B}$   | 7000 W                    |
| Distortion factor       | k             | < 4 %                     |
| Voltage operating range | $U_{AC}$      | 198 – 253 V               |
| Frequency range         | $f_{AC}$      | 47.5 – 50.2 Hz            |
| Short circuit stability |               | Yes                       |
| Mains connection        |               | High-strength cable gland |

|  |               |         |
|--|---------------|---------|
| Max. efficiency                          | $\eta_{max}$  | 98.0 %  |
| European efficiency level                | $\eta_{euro}$ | <97.7 % |
| Power consumption (operational)          |               | < 10 W  |
| Power consumption (night-time operation) |               | 0.25 W  |

|                             |                    |
|-----------------------------|--------------------|
| Size (W x H x D)            | 468 x 613 x 242 mm |
| Weight                      | Approx. 32.0 kg    |
| Protection (DIN EN 60 529)  | IP65               |
| Operating temperature range | -25 °C ... +60 °C  |

**Operational data displayed:**

- Current feed values
- Current voltage
- Overall yield
- No. hours operation to present
- Daily yield
- Fault
- Cause of fault

**Note:**

An unbalanced load of more than 4.6 kVA must be avoided.

**Inverter: SMC 7000TL**

The **SMC 7000TL-D Mini Central inverter** offers the advantages of an inverter with transformer, together with all necessary monitoring and protective devices (ENS) for secure operation of a photovoltaic installation without separate shut-off device. IP65 protection and compact dimensions allow the SMC 7000TL to be installed directly on the solar generator. This both obviates the need for a separate space or switch cupboard for installation and keeps cable-related losses to a minimum.

The efficiency level of 96% for inverter with transformer, unique in its class, ensures the highest possible yields. Its new, active cooling concept ensures that the system operates reliably even where ambient temperatures are high.

**Quality features, certificates**

- Communication via RS232, RS485 or radio signal using Sunny Beam.
- Extremely efficient
- DC connection: MC-T3 plug-in system
- No photovoltaic current distribution required any more
- Integrated mains monitoring (VDEW regulations)
- Diagnosis and communication via the network: PV voltage, mains voltage and mains frequency, feed supply and feed output, operating hours, energy supplied (kWh), operating mode.
- Protection class IP 65
- Protection of installation and people through sensitive protective circuit, insulation monitoring, and protection against excess voltage.
- CE mark
- Extended temperature range (-25 °C to +60 °C ambient temperature).
- Key operating data and faults displayed on a special cover.