



Self-Declaration Regarding Maximum Voltage in Huawei Full Optimizer Systems

This document applies to the following scope:

- **Huawei Smart PV Controller:**
SUN2000-3/4/5/6/8/10KTL-M1, SUN2000-12/15/17/20KTL-M2, SUN2000-30/36/40KTL-M3
- **Huawei Smart PV Optimizer:**
SUN2000-450W-P, SUN2000-600W-P

Huawei Technologies Co., Ltd. hereby declares that for an installation designed and installed according to the company's instructions (as detailed in the quick guide, manual and application notes available on the Support website) using **fully optimized solution** (each PV module with an optimizer), the DC voltage (between any two DC conductors, and between any DC conductor to Ground) **does not exceed 1000Vdc** (unless otherwise specified in the datasheet and/or user manual). A higher voltage, caused by external influence, leads to an immediate shut-down of the optimizers.

Note:

- This declaration does not apply to other (non-Huawei) optimizers used with Huawei inverters.
- The open circuit voltage of a PV module with a Huawei optimizer is 0Vdc.
- The declaration applies to a fully optimized solution (each model with an optimizer); for partially optimized solutions the standard calculation of the DC voltage shall be applied.
- The maximum number of optimizers per string for a fully optimized solution is shown in the table below:

Huawei Smart PV Optimizer SUN2000-450W-P and SUN2000-600W-P Configuration Principle

(Fully optimized solution)	SUN2000-3/4/5/6/8/10KTL-M1	SUN2000-12/15/17/20KTL-M2	SUN2000-30/36/40KTL-M3
Number of Optimizers Supported in a String	6 to 35	6 to 35	6 to 25
String Power Upper Limit	10,000W	10,000W	10,000W

