

# Feed-in management (with Solar-Log™ PM Pro Analyser)

For some time now, we have been offering our customers a planning and configuration service for PV systems that are connected to the medium-voltage grid in accordance with VDE 4110. In the course of this configuration, the individual active and reactive power control functions are checked and tested. These tests are technically complex and time-consuming. To minimise this effort, we offer you our Solar-Log™ PM Pro Analyzer.

The PM Pro Analyzer helps to automatically test all certification-relevant functions and document the results. It defines which tests are to be carried out - the test tool checks the test conditions and carries out the tests automatically. The process can be monitored via a progress bar. Some tests take up to 20 minutes.

Once the test has been completed, the results with the measured values are clearly documented in an Excel file using text and graphics.

The fee-based tool can be purchased with a licence and is installed remotely on the system.

#### Solar-Log™ PM Pro Analyser function

The Solar-Log™ PM Pro Analyser can be used to completely test the active and reactive power functions of a PV system. Several individual tests are available for this purpose, which are described in detail below.

Please note that the currently configured active and reactive power settings of the system to be tested are deactivated for the test.

To be able to start the test, an active power of at least 30 % of the maximum system power (PAV-max.) must be available.

The following tests are available:

## **Active power**

Steps

In this test, a maximum of 4 active power control levels are approached and maintained. The control levels are set to the values 100 %, 60 %, 30 % and 0 % by default, but can be adjusted before the start of the test if required.

Gradient

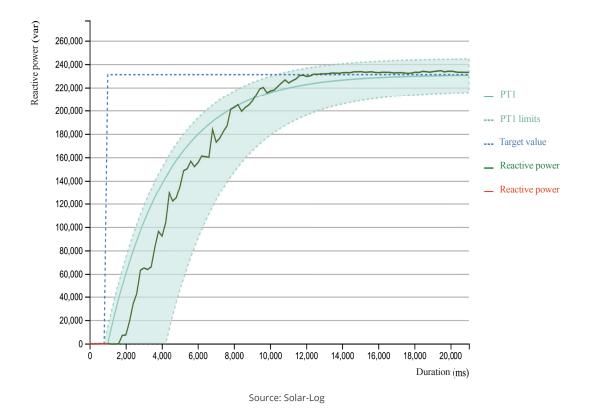
In this test, 2 defined active power levels are approached and recorded. The gradient set in the configuration is used for this.

## **Reactive power**

- Characteristic curve
  This test runs through the stages of the configured characteristic curve
- cos(PHI) jump
  In this test, the power factors -0.95, -0.98, 1, 0.98 and 0.95 are approached by default and the measured values are recorded. The default values can be adjusted if required.
- PT1 Recording
  Two power factors are approached in order to test the correct function of the gradient. The factors are approached via a PT1 curve.
- ATTENTION CHECK: Reactive power to the inverter
  Recording of the conversion to check any ramps or delays set in the WR.

## **Direct marketing**

- Hold system output 0 % 0 % for 10 minutes.
- Hold the system output at 100 % 100 % for 10 minutes.
- The respective PAC, consumption and gridfeed values are recorded at the individual breakpoints. (for consumption meter mode: consumption (VB3), for mode 2 Ri consumption meter consumption and gridfeed).



### Articel number

Solar-Log™ PM Pro Analyzer 257271