



**BUREAU
VERITAS**

Certificate of compliance

Applicant: KACO new energy GmbH
Carl-Zeiss-Str. 1
74172 Neckarsulm
Germany

Product: Photovoltaic inverter

Model: Powador 30.0 TL3, Powador 33.0 TL3, Powador 36.0 TL3,
Powador 37.5 TL3, Powador 39.0 TL3, Powador 40.0 TL3,
Powador 48.0 TL3 Park
See annex for detailed model description

Use in accordance with regulations:

The inverters are tested for functional safety, grid protection, specified environmental influences and efficiency. For detailed information, please watch the corresponding test reports.

Applied rules and standards:

IEC 61727:(2004-12) Ed. 2.0 – Photovoltaic (PV) systems - Characteristics of the utility interface
IEC 62116:(2008-09) Ed. 1.0 – Test procedure of islanding prevention measures for utility-interconnected photovoltaic inverters
IEC 62109-1:(2010-04) Ed. 1.0 – Safety of power converters for use in photovoltaic power systems – Part 1 General requirements
IEC 62109-2:(2011-06) Ed. 1.0 – Safety of power converters for use in photovoltaic power systems – Part 2 Particular requirements for inverters
IEC 60068-2-1:(2007-03) Ed. 6.0 – Environmental testing - Part 2-1: Tests – Test A: Cold
IEC 60068-2-2:(2007-07) Ed. 5.0 – Environmental testing - Part 2-2: Tests - Test B: Dry heat
IEC 60068-2-14:(2009-01) Ed. 6.0 – Environmental testing - Part 2-14: Tests - Test N: Change of temperature
IEC 60068-2-30:(2005-08) Ed. 3.0 – Environmental testing - Part 2-30: Tests - Test Db: Damp heat, cyclic (12 h + 12 h cycle)
IEC 60068-2-75 (1997-08) Ed. 1.0 – Hammer tests (IEC 62262:2002 – IK code)
IEC 61683 (1999-11) Ed. 1.0 – Power conditioners – Procedure for measuring efficiency

At the time of issue of this certificate the safety concept of an aforementioned representative product corresponds to the valid safety specifications for the specified use in accordance with regulations.

Report number: 10TH0307
ECL-ENV-TR-13-026-V01.00 KACO 48.0 TL3

Certificate number: U16-0260

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Certification body

Dieter Zitzmann

Certification body of Bureau Veritas Consumer Products Services Germany GmbH
Accredited according to DIN EN ISO/IEC 17065



Additional models

Extract from test report: N/A

Report Nr.: 10TH0307

Model / Type

Powador 30.0 TL3 - M - INT
Powador 30.0 TL3 - XL - INT
Powador 30.0 TL3 - XL - INT - SPD 1+2
Powador 30.0 TL3 - XL - F - INT
Powador 30.0 TL3 - XL - F - SPD 1+2

Powador 33.0 TL3 - M - INT
Powador 33.0 TL3 - XL - INT
Powador 33.0 TL3 - XL - INT - SPD 1+2
Powador 33.0 TL3 - XL - F - INT
Powador 33.0 TL3 - XL - F - SPD 1+2

Powador 36.0 TL3 - M - INT
Powador 36.0 TL3 - M1
Powador 36.0 TL3 - XL - INT
Powador 36.0 TL3 - XL - INT - SPD 1+2
Powador 36.0 TL3 - XL - F - INT
Powador 36.0 TL3 - XL - F - SPD 1+2

Powador 39.0 TL3 - M - INT
Powador 39.0 TL3 - M1
Powador 39.0 TL3 - XL - INT
Powador 39.0 TL3 - XL - INT - SPD 1+2
Powador 39.0 TL3 - XL - F - INT
Powador 39.0 TL3 - XL - F - SPD 1+2
Powador 39.0 TL3 - M - ZA

Powador 40.0 TL3 - M - INT
Powador 40.0 TL3 - XL - INT
Powador 40.0 TL3 - XL - INT - SPD 1+2
Powador 40.0 TL3 - XL - F - INT
Powador 40.0 TL3 - XL - F - SPD 1+2

Powador 48.0 TL3 - M - INT - Park
Powador 48.0 TL3 - XL - INT - Park
Powador 48.0 TL3 - XL - INT - SPD 1+2
Powador 48.0 TL3 - XL - F - INT - Park
Powador 48.0 TL3 - XL - F - SPD 1+2 - Park