

TÜV NORD EnSys GmbH & Co. KG • Postfach 54 02 20 • 22502 Hamburg

ENERCON GmbH  
WRD Innovationszentrum  
Borsigstraße 26  
26607 Aurich  
Deutschland

**Standort Hamburg**  
Große Bahnstraße 31  
22525 Hamburg  
Telefon +49 40 8557-0  
Telefax +49 40 8557-2429  
[TNEnsys@tuev-nord.de](mailto:TNEnsys@tuev-nord.de)  
[www.tuev-nord.de](http://www.tuev-nord.de)

TÜV®

Your reference, your message of	Our reference	Telephone, Name	Date
helmut.feldmann@enercon.de	Your email from 2021-10-19	+49 40 8557-2092 Mr. Kägeler	2021-12-02

**Confirmation letter: Type Certificate according to IEC 61400-22 – IEC 61400-1 Ed.3/ Ed.4 and Type Approval according to DIBt 2012**

**Wind turbine: E-160 EP5 E3; 5.56 MW ; Rotor Blade LM78.3 P2; HH min. 98m - max. 166m; 50/60 Hz; Design lifetime: 20 years for IEC IIIA, 25 years for IEC S**

**Configurations: E-160 EP5-E3-ST-98-FB-C-01; E-160 EP5 E3-HT-166-ES-C-01; E-160 EP5 E3-HST-120-FB-C-01**

To whom it may concern:

We, TÜV NORD EnSys GmbH & Co. KG (TÜV NORD) hereby confirm that we have been requested by ENERCON to conduct an evaluation of the E-160 EP5 E3; 5.56 MW; Rotor Blade LM78.3 P2; wind turbine.

The E-160 EP5 E3 is a technical development of the ENERCON E-160 EP5 E2. The certification shall be conducted in accordance to the certification scheme of IEC 61400-22 “Wind turbines – Part 22: Conformity testing and certification”, first edition, 2010-05 in combination

Company headquarters  
**TÜV NORD EnSys GmbH & Co. KG**  
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[TNEnsys@tuev-nord.de](mailto:TNEnsys@tuev-nord.de)  
[www.tuev-nord.de](http://www.tuev-nord.de)

County Court: Hamburg, HRA 100227  
VAT No.: DE813992777, Tax No.: 27/628/00023  
Commerzbank AG, Hamburg  
BIC Swift-Code: COBADEFF  
IBAN-Code: DE03 2004 0000 0409 2920 00  
Deutsche Bank AG, Hannover  
BIC Swift-Code: DEUTDE2H  
IBAN-Code: DE95 2507 0070 0068 0710 00

Fully Liable Partner  
TÜV NORD SysTec  
Verwaltungsgesellschaft mbH, Hamburg  
County Court Hamburg, HRB 90231

Managing Director  
Dr. Jörg Aign  
Jan Radtke



## TÜV NORD EnSys GmbH & Co. KG

with IEC 61400-1 “Wind Turbines – Part 1: Design requirements”, Third edition, 2005-08 and Amendment 1, 2010-10, IEC 61400-1 “Wind Turbines – Part 1: Design requirements”, Edition 4.0, 2019-02 and DIBt 2012 for the respective Type Approval.

The scope contains also the evaluation of loads, safety system and manuals, machinery and structural components, nacelle cover and spinner, rotor blades, electrical components and tower internals.

The following target dates for the milestones (based on ENERCON document submittal schedule D02292086-3.0) are scheduled and agreed for the completion of type certification and can be confirmed from TÜV NORD on the assumption of positive evaluation results.

- Evaluation Reports of the loads as well as the electro technical components:  
Target date: 2021-10-29
- Evaluation Report of the rotor blade: Target date: 2021-11-05
- Evaluation Report of the operation- and safety system as well as the manuals:  
Target date: 2021-11-12
- Evaluation Report on the mechanical components (incl. structure, nacelle and hub cover): Target date: 2021-11-26
- Final Design Evaluation Conformity Statement of the 98m tower:  
Target date: 2021-12-08
- Manufacturing Evaluation: Target date: March 2022
- Type Testing: Target date: May 2022
- Final Type Certificate 98m and 120m tower: Target date: June 2022

In case of questions or remarks, please do not hesitate to contact us.

Yours sincerely

TÜV NORD EnSys GmbH & Co. KG  
Project Management

Nils Kägeler

TÜV NORD EnSys GmbH & Co. KG • P.O. Box 54 02 20 • 22502 Hamburg • Germany

ENERCON GmbH  
Mr. Tim Keller  
Borsigstraße 26  
26607 Aurich  
Germany

**Location Hamburg**  
Große Bahnstraße 31  
22525 Hamburg, Germany  
Phone +49 40 8557-0  
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[TNE Sys@tuev-nord.de](mailto:TNE Sys@tuev-nord.de)  
[www.tuev-nord.de](http://www.tuev-nord.de)

TÜV

Copy (ext.):  
Tim.Keller-  
EXTERNAL@enercon.de

Copy (int.):

Your Reference	Our Reference	Phone, Name	Date
E-160 EP5 E3 R1	2022-0084	+49 40 8557-1593 Ms. Barmwater	24.08.2022

## Confirmation Letter on Certification of E-160 EP5 E3 R1 Wind Turbine

To whom it may concern

We, TÜV NORD EnSys GmbH & Co. KG (TÜV NORD), hereby confirm that we have been requested by ENERCON GmbH to conduct the Certification of the wind turbine E-160 EP5 E3 R1 with the towers ST-99-FB-C-01, ST-99-FB-C-02 and HST-120-FB-C-01 based on the TÜV NORD offer no. 2022-0084.

From our current state of knowledge and the substantial experience of working together with ENERCON, we assume that the certification can be issued without major challenges as we are expecting a smooth certification process.

In case of any questions, please do not hesitate to contact us.

Yours sincerely

TÜV NORD EnSys GmbH & Co. KG  
Project Management

Julia Barmwater

Company headquarters  
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22525 Hamburg, Germany  
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