



# IECEx Certificate of Conformity

## INTERNATIONAL ELECTROTECHNICAL COMMISSION IEC Certification System for Explosive Atmospheres

for rules and details of the IECEx Scheme visit [www.iecex.com](http://www.iecex.com)

Certificate No.:	<b>IECEx PTB 14.0036</b>	Page 1 of 6	<u>Certificate history:</u>
Status:	<b>Current</b>	Issue No: 2	Issue 1 (2021-05-11) Issue 0 (2017-08-08)
Date of Issue:	<b>2023-03-15</b>		
Applicant:	<b>ROSE Systemtechnik GmbH</b> Erbeweg 13 - 15 32457 Porta Westfalica Germany		
Equipment:	<b>Power distribution, switch and control gear assembly type 92. XX XX XX, R0.XXX XXX XXX, R9. XXX XXX XXX</b>		
Optional accessory:			
Type of Protection:	<b>"nA", "nC", "db", "eb", "ec", "ia", "mb" "op is" "op pr"</b>		
Marking:	<b>Ex db eb ec ia [ia Ga] mb nA nC [op is] op pr IIC T6...T4 Gc</b> <b>Ex tc IIC T85°C...T135°C Dc</b>		

Approved for issue on behalf of the IECEx  
Certification Body:

**Dr. Ing. Detlev Markus**

Position:

**Head of Department "Explosion Protection in Energy Technology"**

Signature:  
(for printed version)

Date:  
(for printed version)

**16.03.23**

1. This certificate and schedule may only be reproduced in full.
2. This certificate is not transferable and remains the property of the issuing body.
3. The Status and authenticity of this certificate may be verified by visiting [www.iecex.com](http://www.iecex.com) or use of this QR Code.



Certificate issued by:

**Physikalisch-Technische Bundesanstalt (PTB)**  
Bundesallee 100  
38116 Braunschweig  
Germany





# IECEx Certificate of Conformity

Certificate No.: IECEx PTB 14.0036

Page 2 of 6

Date of issue: 2023-03-15

Issue No: 2

Manufacturer: **ROSE Systemtechnik GmbH**  
Erbeweg 13 - 15  
32457 Porta Westfalica  
Germany

Manufacturing locations: **ROSE Systemtechnik GmbH**  
Erbeweg 13 - 15  
32457 Porta Westfalica  
Germany

**Mecano Components Co., Ltd/012**  
No. 1001, Jiaqian Road, Nanxiang,  
Jiading District  
Shanghai P.R.C. 201802  
China

**Phoenix Mecano nv**  
Karrewegstraat 124  
Deinze 9800  
Belgium

## See following pages for more locations

This certificate is issued as verification that a sample(s), representative of production, was assessed and tested and found to comply with the IEC Standard list below and that the manufacturer's quality system, relating to the Ex products covered by this certificate, was assessed and found to comply with the IECEx Quality system requirements. This certificate is granted subject to the conditions as set out in IECEx Scheme Rules, IECEx 02 and Operational Documents as amended

### STANDARDS :

The equipment and any acceptable variations to it specified in the schedule of this certificate and the identified documents, was found to comply with the following standards

**IEC 60079-0:2017** Explosive atmospheres - Part 0: Equipment - General requirements  
Edition:7.0

**IEC 60079-1:2014-06** Explosive atmospheres - Part 1: Equipment protection by flameproof enclosures "d"  
Edition:7.0

**IEC 60079-11:2011** Explosive atmospheres - Part 11: Equipment protection by intrinsic safety "i"  
Edition:6.0

**IEC 60079-15:2017** Explosive atmospheres - Part 15: Equipment protection by type of protection "n"  
Edition:5.0

**IEC 60079-15:2010** Explosive atmospheres - Part 15: Equipment protection by type of protection "n"  
Edition:4

**IEC 60079-18:2017** Explosive atmospheres - Part 18: Protection by encapsulation "m"  
Edition:4.1

**IEC 60079-28:2015** Explosive atmospheres - Part 28: Protection of equipment and transmission systems using optical radiation  
Edition:2

**IEC 60079-31:2022-01** Explosive atmospheres - Part 31: Equipment dust ignition protection by enclosure "t"  
Edition:3.0

**IEC 60079-7:2017** Explosive atmospheres - Part 7: Equipment protection by increased safety "e"  
Edition:5.1

This Certificate **does not** indicate compliance with safety and performance requirements other than those expressly included in the Standards listed above.

### TEST & ASSESSMENT REPORTS:

A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in:

Test Report:

DE/PTB/ExTR14.0043/02



# IECEx Certificate of Conformity

Certificate No.: **IECEx PTB 14.0036**

Page 3 of 6

Date of issue: **2023-03-15**

Issue No: 2

Quality Assessment Report:

[DE/EPS/QAR17.0003/52](#)





# IECEx Certificate of Conformity

Certificate No.: **IECEx PTB 14.0036**

Page 4 of 6

Date of issue: **2023-03-15**

Issue No: 2

## **EQUIPMENT:**

Equipment and systems covered by this Certificate are as follows:

The power distribution, switch and control gear assembly, type 92. XX XX XX, R0.XXX XXX XXX, R9. XXX XXX XXX, consists of a sheet steel or stainless steel enclosure designed to Increased Safety "ec" or Protection by Enclosure "tc" type of protection, which can be provided with flanges, if necessary. It is used to accommodate field bus distributors and terminals, and can be provided with actuator elements and pilot lamps, if necessary. 'Ex' cable glands are used for connection.

All installed and attached components are tested and certified with a separate examination certificate.

Technical Data, Nomenclature and Notes for manufacturing and operation see Annex.

**SPECIFIC CONDITIONS OF USE: NO**



# IECEx Certificate of Conformity

Certificate No.: **IECEx PTB 14.0036**

Page 5 of 6

Date of issue: **2023-03-15**

Issue No: 2

## DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)

- Update to the current version of the standards
- Update to the Ex code marking based on the possible built-in Ex components
- Adoption of the changes of the empty enclosure (extended temperature range for the gasket, extended conductor size)



# IECEX Certificate of Conformity

Certificate No.: **IECEX PTB 14.0036**

Page 6 of 6

Date of issue: **2023-03-15**

Issue No: 2

**Additional manufacturing locations:**

**Phoenix Mecano Kecskemét**  
Szent István krt. 24  
Kecskemét 6000  
**Hungary**

**Phoenix Mecano B.V.**  
Havenstraat 100  
7005 AG Doetinchem  
**Netherlands**

**Phoenix Mecano Saudi Arabia LLC**  
Building no 3267  
King Abdul Aziz Road Unit No 1  
Dharan  
Dammam 3451  
**Saudi Arabia**

**Phoenix Mecano S.E. Asia Pte. Ltd.**  
53 Ubi Ave 3#04-01  
Colourscan Building  
Singapore 408863  
**Singapore**

**PHOENIX MECANO (INDIA) PRIVATE  
LIMITED**  
Pirangut Industrial Area, Post Ghotawade  
Plot 388, Village Bhare, Taluka Mulshi  
Pune 412115  
**India**

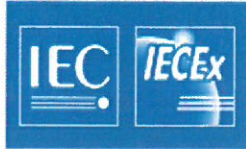
**Phoenix Mecano Inc.**  
7330 Executive Way  
Frederick MD 21704  
**United States of America**

**Rose Systemtechnik Middle East**  
B.o. Box 8993  
Sharjah  
**United Arab Emirates**

**Phoenix Mecano India Pvt. Ltd**  
Plant III, Gat No 408, 410 & 412  
Village - Urse, Taluka-Maval  
Talegaon Urse, Road  
Pune 410506  
**India**

**Annex:**

[COCA 14.0036-02.pdf](#)



Attachment to Certificate  
IECEx PTB 14.0036 Issue 2



Applicant: ROSE Systemtechnik GmbH  
Erbeweg 13-15  
32457 Porta Westfalica  
Germany

Electrical Apparatus: Power distribution, switch and control gear assembly  
Type 92.XX XX XX, R0.XXX XXX XXX, R9. XXX XXX XXX

### Description

The power distribution, switch and control gear assembly, type 92. XX XX XX, R0.XXX XXX XXX, R9. XXX XXX XXX, consists of a sheet steel or stainless steel enclosure designed to Increased Safety "e" or Protection by Enclosure "tb" type of protection, which can be provided with flanges, if necessary. It is used to accommodate field bus distributors and terminals and can be provided with actuator elements and pilot lamps, if necessary. 'Ex' cable glands are used for connection.

All installed and attached components are tested and certified with a separate examination certificate.

### Nomenclature

92.	**	**	**
1	2	3	4

1	Type, material sheet steel or stainless steel
2	Height or product line (see below)
3	Width or number depending on product line
4	Depth or number depending on product line

R	*	*	*	*	*	*	*	*	*
	1	2	3	4	5	6	7	8	9

1	0	Ex empty enclosure, Material: 1.4301
	9	Ex empty enclosure, Material: 1.4404
2	Enclosure size	
3	Cover design	
4	Cover mounting	
5	Hinge design	
6	Gasket	
7	External mounting brackets	
8	Flange configuration	
9	Mounting plate mounted	



### Technical data

Enclosure	
min	100 x 100 x 61 mm
max	1200 x 2000 x 1000 mm
Enclosure with flanges	
min	120 x 120 x 90 mm
max	1200 x 2000 x 1000 mm
Ambient temperature*	-60 °C to +130 °C with glass window -60 °C to +130 °C with silicone gasket -60 °C to +130 °C with HF Gasket (EMV) -40 °C to +90 °C with PU foam -20 °C to +85 °C with CR gasket -50 °C to +85 °C with PC window -60 °C to +90 °C with bus bars
Protection against contact, foreign bodies and water:	IP 66 acc. to IEC 60529
Rated voltage**	max. 1500 V
Rated current**	max. 630 A
Conductor size	max. 300 mm <sup>2</sup>
Protective cross section	max. 150 mm <sup>2</sup>

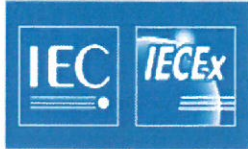
\* The actual ambient temperature range of the device is determined by the temperature class and the actual total power dissipation and is also indicated on the marking plate.

\*\* The rated values are maximum values; the actual electrical values depend on the electrical equipment incorporated. Within the scope of these maximum permissible values and with due regard to the standards, the manufacturer specifies the final rated values dependent on the system conditions, mode of operation, utilization category, etc. The characteristic values of the intrinsically safe circuits are to be given by the manufacturer on his own responsibility. Further technical details have been specified in the test documents.

The composition of the symbol specifying the type of protection depends on the types of protection of the components used.

The maximum permissible ambient temperature range of the control box can be limited by the maximum permissible ambient temperature ranges of the separately certified components inside.





Additional advices

1. The empty enclosure with a coating must not be used in areas affected by charge-producing processes, mechanical friction and separation processes, electron emission (e.g. in the vicinity of electrostatic coating equipment), and pneumatically conveyed dust.
2. Components attached or installed (terminal compartments, bushings, Ex-type cable glands, connectors) shall be of a technical standard that at least complies with the specifications on the cover sheet, and they shall have a separate examination certificate. The operating conditions specified in the component certificates must definitely be complied with, and the operating instructions must include a note to inform the operating company of this equipment.
3. For repair of separately certified components, the IECEx Examination for these components must be observed.
4. Equipment of the type of protection intrinsic safety "i" according to IEC 60079-11 is to be installed in such a way that the distances, creepage distances and clearances between intrinsically safe circuits and non-intrinsically safe circuits required according to IEC 60079-14 are complied with.
5. When more than one intrinsically safe circuit is used, the rules for interconnection are to be observed.
6. Degree of protection IP66 will be safeguarded only when sealing and cable entry fittings are properly fitted. The manufacturer's instructions must be followed.
7. Installation of the components in the electrical apparatus shall be made such that the local temperatures will be within the operating temperature range.