

GEMÜ 4232

Travel sensor for linear actuators

EN

Operating instructions



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1 General information

1.1 Information

- The descriptions and instructions apply to the standard versions. For special versions not described in this document the basic information contained herein applies in combination with any additional special documentation.
- Correct installation, operation, maintenance and repair work ensure faultless operation of the product.
- Should there be any doubts or misunderstandings, the German version is the authoritative document.
- Contact us at the address on the last page for staff training information.

1.2 Symbols used

The following symbols are used in this document:

Symbol	Meaning
●	Tasks to be performed
►	Response(s) to tasks
–	Lists

1.3 Warning notes



Wherever possible, warning notes are organised according to the following scheme:



SIGNAL WORD	
Possible symbol for the specific danger	Type and source of the danger <ul style="list-style-type: none"> ► Possible consequences of non-observance. ● Measures for avoiding danger.


Warning notes are always marked with a signal word and sometimes also with a symbol for the specific danger.

The following signal words and danger levels are used:


 DANGER	
	Imminent danger! <ul style="list-style-type: none"> ► Non-observance can cause death or severe injury.

 WARNING	
	Potentially dangerous situation! <ul style="list-style-type: none"> ► Non-observance can cause death or severe injury.

 CAUTION	
	Potentially dangerous situation! <ul style="list-style-type: none"> ► Non-observance can cause moderate to light injury.

NOTICE	
	Potentially dangerous situation! <ul style="list-style-type: none"> ► Non-observance can cause damage to property.

The following symbols for the specific dangers can be used within a warning note:

Symbol	Meaning
	Danger of explosion

2 Safety information

The safety information in this document refers only to an individual product. Potentially dangerous conditions can arise in combination with other plant components, which need to be considered on the basis of a risk analysis. The operator is responsible for the production of the risk analysis and for compliance with the resulting precautionary measures and regional safety regulations.

The document contains fundamental safety information that must be observed during commissioning, operation and maintenance. Non-compliance with these instructions may cause:

- Personal hazard due to electrical, mechanical and chemical effects.
- Hazard to nearby equipment.
- Failure of important functions.
- Hazard to the environment due to the leakage of dangerous materials.

The safety information does not take into account:

- Unexpected incidents and events, which may occur during installation, operation and maintenance.
- Local safety regulations which must be adhered to by the operator and by any additional installation personnel.

Prior to commissioning:

1. Transport and store the product correctly.
2. Do not paint the bolts and plastic parts of the product.
3. Carry out installation and commissioning using trained personnel.
4. Provide adequate training for installation and operating personnel.
5. Ensure that the contents of the document have been fully understood by the responsible personnel.
6. Define the areas of responsibility.
7. Observe the safety data sheets.
8. Observe the safety regulations for the media used.

During operation:

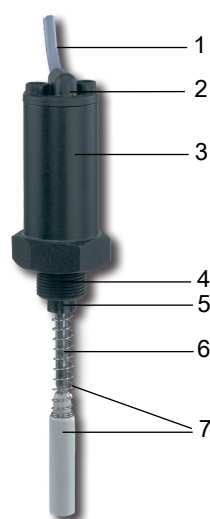
9. Keep this document available at the place of use.
10. Observe the safety information.
11. Operate the product in accordance with this document.
12. Operate the product in accordance with the specifications.
13. Maintain the product correctly.
14. Do not carry out any maintenance work and repairs not described in this document without consulting the manufacturer first.

In cases of uncertainty:

15. Consult the nearest GEMÜ sales office.

3 Product description

3.1 Construction



Item	Name	Materials
1	Cable	LIYY
2	Cover	Depending on design, PP 30% glass fibre reinforced, PVDF or PP
3	Housing	Depending on design, anodized aluminium, PVDF or PP
4	Threaded piece	Depending on design, anodized aluminium (SS for explosion-protected design), PVDF or PP
5	Bushing with internal lip ring	Bushing PP, lip ring PUR
6	Spindle	1.4104
7	Mounting kit	Material depending on design (specific to valve)

3.2 Description


The GEMÜ 4232 travel sensor is intended for the attachment to valves with linear actuators and is used to determine the valve position. It is used as a travel sensor for the GEMÜ 1434 µPos, GEMÜ 1435 ePos and GEMÜ 1436 cPos intelligent positioners, which can be connected using either the open cable ends or an M12 cable connector (depending on the design and/or selection of the controller).

3.3 Function

GEMÜ 4232 is a travel sensor for detecting the position of globe and diaphragm valves with linear actuators. It is a potentiometer with a passive resistance element (support material and a resistance track of conductive plastic) and a passive wiper.

It serves as a position sensor for the intelligent GEMÜ 1434, GEMÜ 1435 and GEMÜ 1436 positioners.

4 Intended use

 DANGER	
	Danger of explosion <ul style="list-style-type: none"> ▶ Danger of death or severe injury. ● Only use the product in potentially explosive zones confirmed in the declaration of conformity.
	 WARNING
Improper use of the product <ul style="list-style-type: none"> ▶ Risk of severe injury or death. ▶ Manufacturer liability and guarantee will be void. ● Only use the product in accordance with the operating conditions specified in the contract documentation and in this document. 	

The product GEMÜ 4232 is designed for fitting to a GEMÜ valve in order to detect the position of linear actuators electrically. The product works as an analogue travel sensor system based on a resistance value (potentiometer) that changes linearly with the stroke position. The product is positively connected with the actuator spindle by means of a mounting kit (spring, operating bush). The measurement signals (resistance value) can be checked using the electrical connections.

4.1 Product without special function X or Z

The product is not intended for use in potentially explosive areas.

4.2 Product with special function X

With the special version X order option, the product is intended for use in potentially explosive areas in zone 1 with gases, mists or vapours and zone 21 with combustible dusts in accordance with EU Directive 2014/34/EU (ATEX).

The product has the following explosion protection marking:

ATEX

Gas:  II 2G Ex ib IIB T4 Gb

Dust:  II 2D Ex ib IIIC T130 °C Db

Certificate: IBExU20ATEX1045

- EN IEC 60079-0:2018
- EN 60079-11:2012

IECEx

Gas: Ex ib IIB T4 Gb

Dust: Ex ib IIIC T130 °C Db

Certificate: IECEx IBE 20.0027 X

The product has been developed in compliance with the following harmonised standards:

- IEC 60079-0:2017 (edition 7)
- EN 60079-11:2011 (edition 6)

Use of the product is permissible in the following ambient temperature ranges: -10 °C to +70 °C

The explosion-protected design is marked with index X.

4.3 Product with special function Z

The product with the special version Z order option is intended for use in potentially explosive areas of zone 2 with gases, mists or vapours and zone 22 with combustible dusts in accordance with EU Directive 2014/34/EU (ATEX).

The product has the following explosion protection marking:

ATEX

Gas:  II 3G Ex ec nC IIC T4 Gc X

Dust:  II 3D Ex tc IIIC T80°C Dc X

The product has been developed in compliance with the following harmonised standards:

- EN IEC 60079-0:2018
- EN IEC 60079-7:2015/A1:2018
- EN IEC 60079-15:2019
- EN 60079-31:2014

Use of the product is permissible in the following ambient temperature ranges: -10 °C to +70 °C

The explosion-protected design is marked with index Z.

For use in potentially explosive areas, the following conditions or operation limits must be observed:

Special conditions for use:

- The housing must be installed protected from mechanical influences.
- Connection cables and connectors must be protected from damage.

RFID chips must not be read out in potentially explosive areas.

5 Order data

The order data provide an overview of standard configurations.

Please check the availability before ordering. Other configurations available on request.

The travel length depends on the necessary mounting kit.

Note: A valve specific mounting kit is required for assembly. For designing the mounting kit, the valve type, nominal size, control function and actuator size must be stated.

Order codes

1 Type	Code
Travel sensor for linear actuators	4232

2 Fieldbus	Code
Without	000

3 Accessory	Code
Accessory	Z

4 Housing material	Code
PP, polypropylene	05
Anodized aluminium	14
PVDF, polyvinylidene fluoride	20

5 Travel length	Code
Potentiometer, 30 mm length	030
Potentiometer, 50 mm length	050
Potentiometer, 75 mm length	075

6 Cable length	Code
2 m cable, 3-pin	02M0
5 m cable, 3-pin	05M0
10 m cable, 3-pin	10M0
20 m cable, 3-pin	20M0

7 Cable connection	Code
Open wires with cable ends	0000
M12 cable connector, straight	4001

8 Special version	Code
Without	
ATEX/IECEx ib for zone 1/21 intrinsic safety ignition protection	X
ATEX nC, eC/tC for zone 2/22 Ex eC, nC, tC ignition protection	Z

Order example

Ordering option	Code	Description
1 Type	4232	Travel sensor for linear actuators
2 Fieldbus	000	Without
3 Accessory	Z	Accessory
4 Housing material	14	Anodized aluminium
5 Travel length	030	Potentiometer, 30 mm length
6 Cable length	05M0	5 m cable, 3-pin
7 Cable connection	0000	Open wires with cable ends
8 Special specification		Without

6 Technical data

6.1 Temperature

Ambient temperature: -10 – 80 °C
Special version X and Z: -10 to 70 °C

Storage temperature: -10 – 80 °C

6.2 Product compliance

Explosion protection: ATEX (2014/34/EU) and IECEx, order code special version X or Z

Code X marking: **Intrinsic safety (Ex i) ignition protection**

ATEX

Gas:  II 2G Ex ib IIB T4 Gb

Dust:  II 2D Ex ib IIIC T130 °C Db

Certificate: IBExU20ATEX1045

IECEx

Gas: Ex ib IIB T4 Gb

Dust: Ex ib IIIC T130 °C Db

Certificate: IECEx IBE 20.0027 X

Operation in potentially explosive areas only in conjunction with a safety barrier complying with ATEX which is designed for operating passive resistor elements or potentiometers and for which separate operating instructions apply.

In addition, the supplied limit resistor must be installed in the wiper cable between the safety barrier and travel sensor.

Code Z marking: **Increased safety (Ex e) ignition protection in combination with non-incendive (Ex n) and (dust) protection by enclosure (Ex t)**

ATEX

Gas:  II 3G Ex ec nC IIC T4 Gc X

Dust:  II 3D Ex tc IIIC T80°C Dc X

Potential equalisation: **Special version code X and Z**

The travel sensor must be integrated into the system's potential equalization via the pre-assembled earthing kit.

The potential equalization connection's maximum permissible resistance limit value is defined as $R \leq 100 \Omega$.

During the plant-specific maintenance cycle, the potential equalization connection must be checked to ensure that it has been connected correctly and that the maximum resistance limit value has not been exceeded.

6.3 Mechanical data

Protection class: IP 64 in accordance with EN 60529 – housing material anodized aluminium (code 14)
IP 65 in accordance with EN 60529 – housing material PVDF, PP (code 20)

Weight:

Travel sensor length	Material		
	Aluminium (code 14)		PP (code 05) PVDF (code 20)
	Standard	Special version (code X and Z)	Standard
30 mm (Code 030)	110	170	140
50 mm (Code 050)	125	180	150
75 mm (Code 075)	140	190	160

Weight in g

Weight specifications include 2 m of cable with open ends and cable ends.

Additional weight in each case:

25 g per additional metre of cable

20 g with M12 cable connector (cable connection code 4001)

Service life: 10 x 10⁶ operations

Installation position: Optional

Min. stroke: Dependent on the connected device

Max. stroke:

Travel sensor version		
Code 030	Code 050	Code 075
30 mm	50.2 mm	74.4 mm

6.4 Electrical data**Duty cycle:** Continuous duty**Electrical connection:** Open wires with multicore cable ends (code 0000)
M12 cable plug A-coded, straight, 5-pin, plastic (code 4001)**Supply voltage U_v :** max. 42 V DC
(does not apply to code X special version – the intrinsically safe characteristic values apply here)
The travel sensor is generally supplied by the connected positioners (GEMÜ 1434, 1435 or 1436).

	Travel sensor version		
	Code 030	Code 050	Code 075
Linearity:	$\pm 0.2 \%$	$\pm 0.25 \%$	$\pm 0.1 \%$
Repeatability:	$> 10 \mu\text{m}$	$> 10 \mu\text{m}$	$> 10 \mu\text{m}$
Nominal resistance:	3 k Ω	5 k Ω	5 k Ω

Safety-relevant values: Special version code X**A)** $U_i = 30 \text{ V}$ $I_i = 100 \text{ mA}$ $P_i = 700 \text{ mW}$

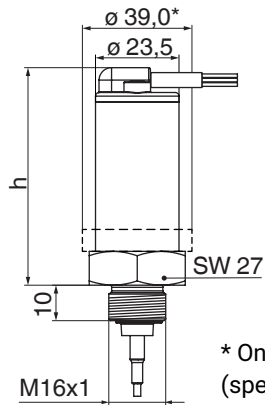
These values refer to the two supply cables (white and green wires), which need to be protected with a two-channel safety barrier.

B) $U_i = 16 \text{ V}$ $I_i = 200 \text{ mA}$ $P_i = 600 \text{ mW}$

These values refer to the wiper cable (brown wire), which needs to be protected with a single-channel safety barrier. The supplied limit resistor must also be wired.

7 Dimensions

7.1 Housing material aluminium

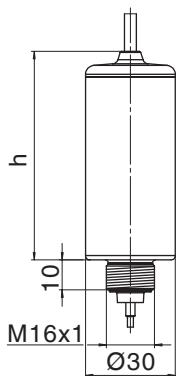


* Only explosion-protected designs
(special version X and Z)

Travel sensor length (code)	h	
	Standard	ATEX design (code Z)
030	62.2	67.2
050	84.2	89.2
075	109.2	114.2

Dimensions in mm

7.2 Housing material PVDF or PP



Travel sensor length (code)	h
030	69.6
050	91.6
075	116.6

Dimensions in mm

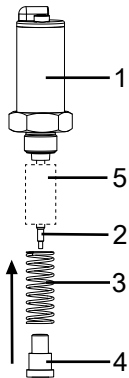
8 Manufacturer's information

8.1 Delivery

- Check that all parts are present and check for any damage immediately upon receipt.

The product's performance is tested at the factory. The scope of delivery is apparent from the dispatch documents and the design from the order number.

8.2 Scope of delivery



Item	Name
1	Travel sensor
2	Spindle
Items 3–6 are not included in the travel sensor's scope of supply, but are part of a mounting kit that needs to be ordered separately.	
3	Spring
4	Operating bush
5	Guide bush*
6	Threaded adapter* (not pictured)

*Enclosed depending on design

GEMÜ 4232 is assembled using a mounting kit 4243S01Z... consisting of a spring, an operating bush and a threaded adapter. The mounting kit is specific to the valve and must be ordered separately.

8.3 Packaging

The product is packaged in a cardboard box which can be recycled as paper.

8.4 Transport

1. Only transport the product by suitable means. Do not drop. Handle carefully.
2. After the installation dispose of transport packaging material according to relevant local or national disposal regulations / environmental protection laws.

8.5 Storage

1. Store the product free from dust and moisture in its original packaging.
2. Avoid UV rays and direct sunlight.
3. Do not exceed the maximum storage temperature (see chapter "Technical data").
4. Do not store solvents, chemicals, acids, fuels or similar fluids in the same room as GEMÜ products and their spare parts.

9 Installation

9.1 Linear travel sensor mounting kit assembly

⚠ CAUTION

Pretensioned spring!

- Damage to the device.
- Slowly release the tension in the spring.

⚠ CAUTION

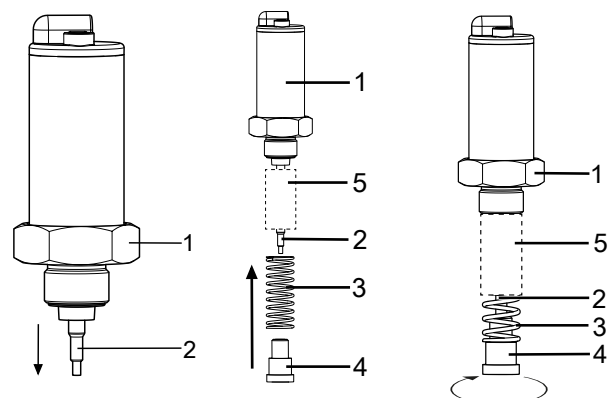
Do not scratch the spindle!

- A damaged spindle surface may cause failure of the travel sensor.

Item	Name
1	Travel sensor
2	Spindle
3	Spring
4	Operating bush
5	Guide bush*
6	Threaded adapter**

*Enclosed depending on design

**If a threaded adapter is included, it must be screwed into the actuator top of the process valve

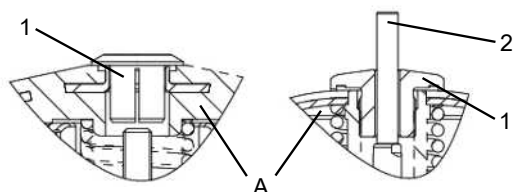


1. Pull the spindle 2 out of the travel sensor 1.
2. If included, push the guide bush 5 taper over the spindle 2 first.
3. Push the spring 3 over the spindle 2 and secure with the operating bush 4.
4. Tighten the operating bush 4 by turning it clockwise.

- Push in the spindle until it pushes against the spring and then slowly release the pressure on the spring.

9.2 Preparations for assembly to the valve

1. Move the actuator to the open position.
2. Remove optical position indicator 2 and / or protective cap 1 from the actuator top.



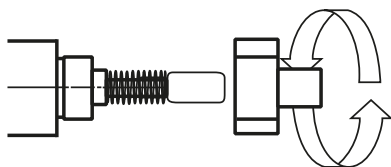
9.3 Installing the adapter

With some mounting kits it is necessary to install an adapter as well. This adapter is enclosed with the required mounting kits. Valves with a normally open and double-acting control function (code 2+3) also include additional O-rings (1+2) (see "Installing the adapter for metal housings (housing material code 14)", page 13).

9.3.1 Installing the adapter for plastic housings (housing material code 05 and 20)

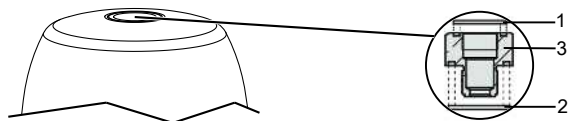
⚠ CAUTION

Tightening with tools can cause the travel sensor to fail!



1. Gently screw the adapter onto the travel sensor by hand (until you feel resistance).
2. Then continue turning it another 30–40°.
3. Check the correct function and recovery.
Press in the spindle as far as possible by hand, then slowly release the spring until the travel sensor spindle is in the initial position. If the spring is not fully released, the adapter needs to be undone anti-clockwise and the procedure repeated until the spindle is safely and fully pushed out of the spring.

9.3.2 Installing the adapter for metal housings (housing material code 14)



1. Move the actuator to the closed position.
2. If enclosed: Place O-rings 1 and 2 into adapter 3.
3. Screw adapter 3 into the actuator opening as far as it will go and tighten.

9.4 Installing the travel sensor on the actuator

NOTICE

Wrong mounting kit

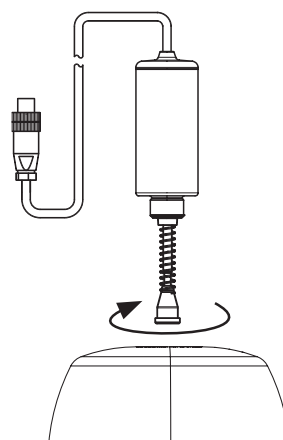
- If the travel sensor cannot be pushed in all the way, the spring is blocking the path because the mounting kit is too long.
- If you cannot feel any initial spring tension, the mounting kit is too short.

9.4.1 Installing the travel sensor with plastic housing

⚠ CAUTION

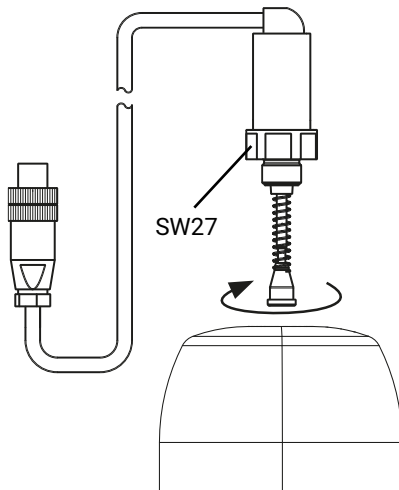
Travel sensor failure!

- **With threaded adapter:** Tightening on the (round) travel sensor housing can cause the travel sensor to fail. Only use the intended adapter spanner flat for tightening.



1. Move the actuator into the OPEN position.
2. Guide the assembled travel sensor as far as it will go into the actuator opening and screw it in clockwise against the initial spring tension.
3. **Without threaded adapter:** Gently tighten the travel sensor on the round housing by hand (until you feel resistance). Then continue turning it another 30–40°.
With threaded adapter: Carefully tighten the travel sensor on the adapter spanner flat with a suitable WAF 27 open-ended spanner (tighten with a max. torque of 2.5 Nm – if no torque can be measured, turn for max. another 90° once you feel resistance).

9.4.2 Installing the travel sensor with metal housing



1. Move the actuator into the OPEN position.
2. Guide the assembled travel sensor into the actuator opening or the adapter as far as it will go and working against the initial spring tension, screw it into place clockwise.
3. Tighten the travel sensor using a suitable WAF 27 open-ended spanner.

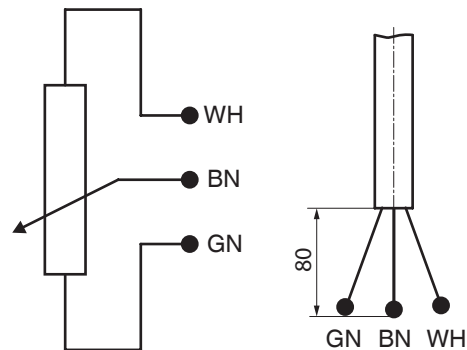
9.5 Connection to the positioner

Connect the travel sensor with the GEMÜ 1434, GEMÜ 1435 or GEMÜ 1436 positioner (see "Electrical connection", page 14).

For use in potentially explosive areas, observe the following installation instructions (see "Installation instructions for explosion-protected design", page 15).

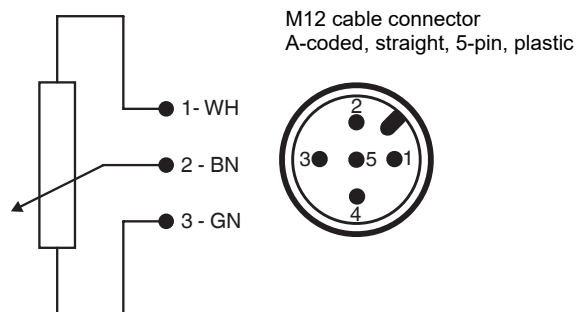
10 Electrical connection

10.1 Design with open wires with cable ends (code 0000)



This design is suitable for connecting to the GEMÜ 1435 positioner (except the GEMÜ 1435 design with M12 cable connector).

10.2 Design with M12 cable connector (code 4001)



This design is suitable for connecting to the GEMÜ 1434, 1436 or 1435 positioner with the M12 cable connector design.

NOTICE

- For special versions X and Z:
The M12 connector must only be connected in the safe area (outside the potentially explosive zone). The enclosed M12 cable connector is only intended for connection to the positioner (the positioners (GEMÜ 1434, 1435 and 1436) are not explosion-protected and must only be installed outside of the potentially explosive zone).

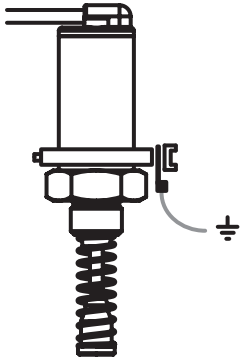
NOTICE

- For special version X:
The electrical connection of the travel sensor to the positioner must be routed via safety barriers (a limit resistor must also be wired) (see "Installation instructions for special version X (wiring instructions for intrinsic safety)", page 15).
In order to wire the safety barriers appropriately, the connection cable for the travel sensor can be cut to length at the point at which the safety barriers are being installed (generally a DIN rail) and the end piece including the fitted M12 cable connector can be used to continue wiring from the safety barriers to the installation position for the positioner.

10.3 Potential equalisation for special version code X and Z

NOTICE

- For safe use in potentially explosive areas, the product must be integrated into the system's potential equalisation.



1. Connect a suitable cable lug (M4) and cable to the marked earthing connection
2. Integrate the GEMÜ 4232 into the system's potential equalisation.

The potential equalisation connection's maximum permissible resistance limit value is $R \leq 100 \text{ Ohm}$.

Check that the potential equalisation connection is set up correctly and that the resistance limit value is not exceeded as part of the plant-specific maintenance cycle.

11 Installation instructions for explosion-protected design

⚠ DANGER



Danger of explosion

- Risk of severe injury or death.
- Only versions that have been approved according to their technical data may be used in potentially explosive environments.

The standard version of the product (without special function X or Z) must not be used in potentially explosive zones.

1. Danger from sparking. Never disconnect the connection cables when live.
2. Do not connect or disconnect the device until the power has been switched off or the area has been classified as non-hazardous.

⚠ WARNING



Danger of explosion

- Non-observance can cause death or severe injury.
- Non-observance will also void the manufacturer's liability and any warranty claims.
- GEMÜ 1434, GEMÜ 1435 or GEMÜ 1436 must not be installed or operated in potentially explosive zones.

11.1 Installation instructions for special version X (wiring instructions for intrinsic safety)

⚠ DANGER



Danger of explosion

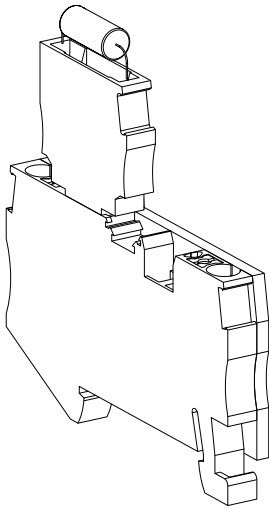
- Risk of severe injury or death.
- The travel sensor with special function X may only be used in potentially explosive zones in combination with compliant safety barriers. These safety barriers need to have been designed specifically for use with passive resistor elements or potentiometers and must have their own operating instructions. The supplied limit resistor must also be wired.

NOTICE

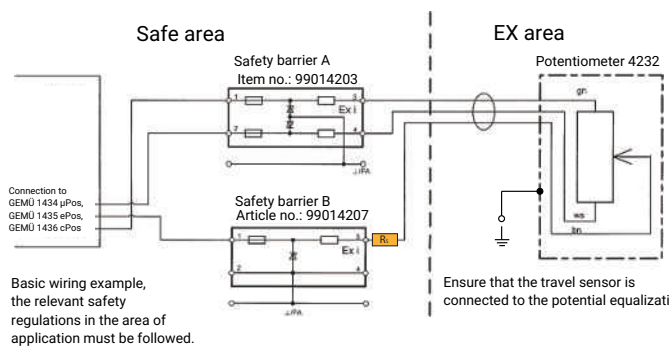
- The correct use of safety barriers creates an intrinsically safe electric circuit between the travel sensor and the safety barriers; the travel sensor cable can be labelled accordingly on the system side. Installation standard IEC 60079-14 for potentially explosive areas must be observed here.

The limit resistor kit supplied with the product comprises a mounting rail module, a component holder, a lateral separator plate and a specified fixed resistor.

The kit must be assembled as illustrated below and must be mounted close to the safety barriers, outside the potentially explosive area, and wired in accordance with the following wiring diagram.



Electrical installation in accordance with the following wiring diagram:



- Connect the travel sensor 4232 to GEMÜ 1434, GEMÜ 1435 or GEMÜ 1436 positioners via suitable (compliant) safety barriers.

The limit resistor R_s supplied with the product must be connected in the brown wiper cable between the safety barrier and travel sensor.

Ensure that the potential equalization of the safety barriers is not connected in a way that is interference-prone.

NOTICE

- The safety barriers shown are an example. Other safety barriers with similar properties that comply with the intrinsically safe characteristic values can be used on-site.

Special conditions for use

- The housing must be installed protected against mechanical influences.
- Connection cables and connectors must be protected from damage.

RFID chips must not be read out in potentially explosive areas.

11.2 Installation instructions for special version Z (wiring instructions for non-incendive operation)

Special conditions for use

- The housing must be installed protected from mechanical influences.
- Connection cables and connectors must be protected from damage.

RFID chips must not be read out in potentially explosive areas.

12 Disposal

1. Pay attention to adhered residual material and gas diffusion from penetrated media.
2. Dispose of all parts in accordance with the disposal regulations/environmental protection laws.

13 Returns

Legal regulations for the protection of the environment and personnel require that the completed and signed return delivery note is included with the dispatch documents. Returned goods can be processed only when this note is completed. If no return delivery note is included with the product, GEMÜ cannot process credits or repair work but will dispose of the goods at the operator's expense.

1. Clean the product.
2. Request a return delivery note from GEMÜ.
3. Complete the return delivery note.
4. Send the product with a completed return delivery note to GEMÜ.

14 Declaration of Incorporation according to 2006/42/EC (Machinery Directive)

Declaration of Incorporation

according to the EC Machinery Directive 2006/42/EC, Annex II, 1.B for partly completed machinery

We, GEMÜ Gebr. Müller Apparatebau GmbH & Co. KG
Fritz-Müller-Straße 6-8
74653 Ingelfingen-Criesbach, Germany

declare that the following product

Make: GEMÜ Travel sensor for linear actuators

Project number: 4232

Commercial name: GEMÜ 4232

meets the following essential requirements of the Machinery Directive 2006/42/EC:

1.3, 1.3.7, 1.5.1, 1.5.2, 1.5.16, 1.6.1, 2.2.1, 3.2.2, 3.3.4, 3.4, 3.4.3

We also declare that the specific technical documentation has been compiled in accordance with part B of Annex VII.

The manufacturer or his authorised representative undertake to transmit, in response to a reasoned request by the national authorities, relevant information on the partly completed machinery. This transmission takes place:

Electronically

Authorised documentation officer **GEMÜ Gebr. Müller Apparatebau GmbH & Co. KG**
Fritz-Müller-Straße 6-8
74653 Ingelfingen, Germany

This does not affect the industrial property rights!

Important note! The partly completed machinery may be put into service only if it was determined, where appropriate, that the machinery into which the partly completed machinery is to be installed meets the provisions of this Directive.

2020-12-11



Joachim Brien
Head of Technical Department

15 EU Declaration of Conformity in accordance with 2014/34/EU (ATEX)



EU Declaration of Conformity

in accordance with 2014/34/EU (ATEX)

We, GEMÜ Gebr. Müller Apparatebau GmbH & Co. KG
Fritz-Müller-Straße 6-8
74653 Ingelfingen-Criesbach, Germany

declare that the product listed below complies with the requirements of directive 2014/34/EU for intended use in potentially explosive areas.

Description of the product: GEMÜ 4232 Code X special version (4232000Z14... ..X)

Explosion protection designation: Gas:  II 2G Ex ib IIB T4 Gb
Dust:  II 2D Ex ib IIIC T130 °C Db
Certificate: IBExU20ATEX1045

Explanations: For special conditions or operation limits see chapter "Correct use" in the operating instructions.

The Essential Safety and Health Requirements are met by compliance with the standards listed below that are applicable for the above mentioned product:

- EN IEC 60079-0:2018
- EN 60079-11:2012

2021-05-12



Joachim Brien
Head of Technical Department

16 EU Declaration of Conformity in accordance with 2014/34/EU (ATEX)

EU Declaration of Conformity

in accordance with 2014/34/EU (ATEX)

We, GEMÜ Gebr. Müller Apparatebau GmbH & Co. KG
Fritz-Müller-Straße 6-8
74653 Ingelfingen-Criesbach, Germany

declare that the product listed below complies with the requirements of directive 2014/34/EU for intended use in potentially explosive areas.

Description of the product: GEMÜ 4232 Code Z special version (4232000Z14... ..Z)

Explosion protection designation: Gas:  II 3G Ex ec nC IIC T4 Gc X
Dust:  II 3D Ex tc IIIC T80°C Dc X

Explanations: For special conditions or operation limits see chapter "Correct use" in the operating instructions.

The Essential Safety and Health Requirements are met by compliance with the standards listed below that are applicable for the above mentioned product:

- EN IEC 60079-0:2018
- EN IEC 60079-7:2015/A1:2018
- EN IEC 60079-15:2019
- EN 60079-31:2014

2021-05-11



Joachim Brien
Head of Technical Department



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Subject to alteration

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