

# 8

## Explosionsschutz *Explosion protection*



## Umfassender Ex-Schutz

*Comprehensive explosion protection*



1



2



3

Abb. 1 – Ex-Kabelverschraubung LevelEx AC  
Fig. 1 – LevelEx AC Ex cable gland

Abb. 2 – LevelEx Kabelverschraubung Ex d  
Fig. 2 – LevelEx cable gland Ex d

Abb. 3 – blueglobe HT AC in Ex-Ausführung  
Fig. 3 – blueglobe HT AC – Ex version

## Für Gas- und Staub-Umgebungen

Für die Verwendung in Ex-Bereichen bietet PFLITSCH ein breites Kabelverschraubungssortiment, zertifiziert nach der aktuellen ATEX-Richtlinie 2014/34/EU

- für die Einsatzbereiche „G“ (Gas) und „D“ (Dust) in der Gerätekategorie II,
- in den Zündschutzarten „e“ (erhöhte Sicherheit), „d“ (druckfeste Kapselung) und „t“ (Schutz durch Gehäuse)
- einsetzbar in den Zonen 1 und 2 sowie den Zonen 20, 21 und 22.

Für die Zündschutzarten „e“ und „t“ bietet das UNI Dicht System Ex-Kabelverschraubungen aus Messing und Edelstahl in M10 bis M80 bzw. Pg 7 bis Pg 48. Auch die blueglobe aus Messing und Edelstahl sowie in Kunststoff aus Polycarbonat ist in den Größen M10 bis M85 ATEX zertifiziert.

Eine Besonderheit sind die ATEX-zertifizierten EMV-Kabelverschraubungen für eine Kombination von Ex-Schutz und umfassendem EMV-Schutz.

In den Zündschutzarten „d“ und „e“ und „t“ bietet PFLITSCH die LevelEx Serie an.

Die LevelEx für nicht armierte Kabel verfügt dank des speziellen kaskadierenden Dichtprinzips über große Dichtbereiche, eine hohe Druckdichtigkeit und eine anwenderfreundliche Montage.

Die LevelEx TRI gewährleistet zusätzlich einen sicheren EMV-Schutz und ist sehr kompakt.

Die LevelEx AC überzeugt durch eine einfache, schnelle und sichere Montage. Durch zwei gegenüberliegende Sichtfenster ist die Position der Armierungsdrähte einsehbar. Eine erneute Demontage zu Kontrollzwecken ist dadurch nicht erforderlich.

Die gesamte LevelEx Serie bietet einen großen Temperatureinsatzbereich von –60 °C bis +130 °C. Internationale Zulassungen wie nach ATEX, IECEx, EAC, CCC, Kosha, DNV und UL runden das Portfolio ab.

Darüber hinaus hat PFLITSCH für die Zündschutzarten „d“, „e“ und „t“ umfangreiches Zubehör bestehend aus Adaptern, Blindstopfen, Erweiterungen und Reduzierungen im Programm.

Angesichts der gestiegenen Schutzart-Anforderungen an Gehäuse ist eine Luftzirkulation im Gehäuseinneren vorgeschrieben. Hier bietet PFLITSCH einen Entlüftungsstutzen für die Zündschutzart „e“ (erhöhte Sicherheit).

Weitere Lösungen für armierte und nicht armierte Kabel von M16 bis M100 bzw. auf Anfrage mit Pg-, Zoll- oder NPT-Anschlussgewinde finden sie in einer eigenen Produktinformation.

## For gas and dust environments

For use in hazardous areas, PFLITSCH offers a wide range of cable glands, certified in accordance with the current ATEX Directive 2014/34/EU

- for the application areas "G" (Gas) and "D" (Dust) in equipment class II,
- in protection types "e" (increased safety), "d" (flameproof enclosure) and "t" (protection by enclosure)
- applicable in zones 1 and 2 as well as zones 20, 21 and 22.

For the protection types "e" and "t", the UNI Dicht system offers Ex cable glands made of brass and stainless steel in M10 to M80 or Pg 7 to Pg 48. blueglobe made of brass and stainless steel as well as in polycarbonate plastic is also ATEX certified in sizes M10 to M85.

A special feature are the ATEX-certified EMC cable glands for a combination of explosion protection and comprehensive EMC protection.

PFLITSCH offers the LevelEx series in the protection types "d" and "e" and "t".

Thanks to the special cascading sealing principle, the LevelEx for non-armoured cables has large sealing areas, high pressure tightness and ease of assembly.

The LevelEx TRI additionally ensures safe EMC protection and is very compact.

The LevelEx AC convinces with its simple, quick and safe installation. The position of the armour wires can be seen through two opposite viewing windows. This means that it is not necessary to disassemble the unit again for inspection purposes.

The entire LevelEx series offers a wide temperature application range from –60 °C to +130 °C. International approvals such as ATEX, IECEx, EAC, CCC, Kosha, DNV and UL round off the portfolio.

PFLITSCH also has a comprehensive range of accessories consisting of adapters, blanking plugs, extensions and reducers for ignition protection types "d", "e" and "t".

In view of the increased protection class requirements for enclosures, air circulation inside the enclosure is mandatory. Here, PFLITSCH offers a vent for protection type "e" (increased safety).

Further solutions for armoured and non-armoured cables from M16 to M100 or on request with Pg, inch or NPT connection thread can be found in a separate product information.



Abb. 1 – Hochtemperatur-Eigenschaften, kombiniert mit Ex-Schutz: blueglobe HT Ex

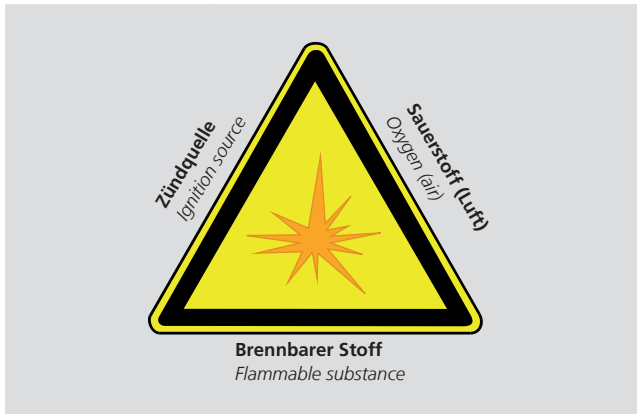
Fig. 1 – High-temperature characteristics combined with explosion protection: blueglobe HT ex

Abb. 2 – Ex-Kabelverschraubung aus Messing mit geschlossenem Dichteinsatz  
Fig. 2 – Ex cable gland made of brass with closed sealing insert

Abb. 3 – Zwei gegenüberliegende Sichtfenster zur Kontrolle der Armierungsdrähtepositionierung  
Fig. 3 – Two opposite viewing windows to check the armour wire positioning

## Voraussetzungen für eine Explosion

What causes an explosion



Eine Explosion kann entstehen, wenn drei Faktoren zeitlich und örtlich zusammentreffen („Explosionsdreieck“):

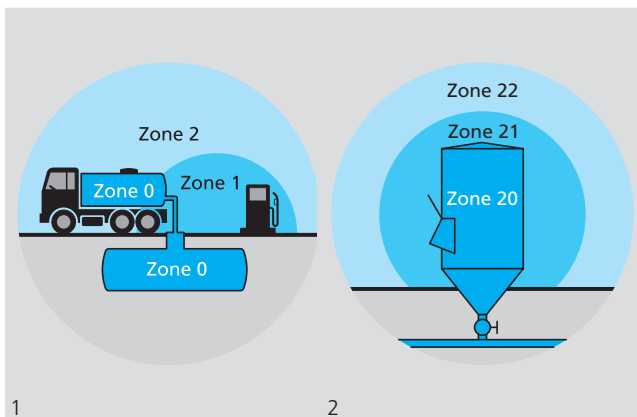
1. Brennbarer Stoff in ausreichender Konzentration
2. Sauerstoff (Luft)
3. Effektive Zündquelle

An explosion can occur if three factors are overlapping in time and space (“explosion triangle”):

1. Flammable substance in sufficient concentration
2. Oxygen (air)
3. Effective ignition source

## Explosionsgefährdete Bereiche – Zonen

Potentially explosive atmospheres – zones



Gasexplosionsgefährdete Bereiche (s. Zonen Abb. 1) werden nach der Häufigkeit des Auftretens und der Dauer des Vorhandenseins einer explosionsfähigen Gasatmosphäre aufgeteilt.

Durch explosionsfähige Staubatmosphären gefährdete Bereiche (s. Zonen Abb. 2) werden aufgrund der Häufigkeit und der Dauer des Auftretens der explosionsfähigen Staub-Luft-Gemische in Zonen unterteilt.

Explosive gas atmospheres are classified in terms of zones (see Fig. 1) on the basis of the frequency and duration of the occurrence of an explosive gas atmosphere.

Explosive dust atmospheres are classified in terms of zones (see Fig. 2) on the basis of the frequency and duration of explosive dust/air mixtures.

| Brennbarer Stoff<br>Flammable substance | Einteilung explosionsgefährdeter Bereiche<br>Classification of explosive atmospheres | Verhalten der explosionsfähigen Atmosphäre<br>Behaviour of explosive atmosphere                                                                                                                                 |
|-----------------------------------------|--------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Gas                                     | <b>Zone 0</b>                                                                        | Ist ständig, langfristig oder häufig vorhanden<br><i>Is present continuously, or for long periods or frequently</i>                                                                                             |
|                                         | <b>Zone 1</b>                                                                        | Tritt im Normalbetrieb gelegentlich auf<br><i>Is likely to occur in normal operation</i>                                                                                                                        |
|                                         | <b>Zone 2</b>                                                                        | Tritt im Normalbetrieb normalerweise nicht auf oder aber nur kurzzeitig<br><i>Is not likely to occur in normal operation and, if it occurs, will only exist for a short time</i>                                |
| Staub<br>Dust                           | <b>Zone 20</b>                                                                       | Ist in Form einer Wolke ständig, langfristig oder häufig vorhanden<br><i>Is present in a cloud continuously, or for long periods or frequently</i>                                                              |
|                                         | <b>Zone 21</b>                                                                       | Tritt im Normalbetrieb in Form einer Wolke auf<br><i>Is likely to occur in a cloud in normal operation</i>                                                                                                      |
|                                         | <b>Zone 22</b>                                                                       | Tritt im Normalbetrieb in Form einer Wolke normalerweise nicht auf oder aber nur kurzzeitig<br><i>Is not likely to occur in a cloud in normal operation and, if it occurs, will only exist for a short time</i> |

## Gerätegruppen – Gerätekategorien – Geräteschutzniveaus

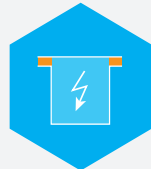
Equipment groups – equipment categories – equipment protection levels

| Bedingung und Einteilung<br>Requirements and classification |                                                                                      | Kennzeichnung des Betriebsmittels<br>Marking of equipment                              |                                                                                              |                                                                                                                         |                                                                                                                                                      |                                                                                             |
|-------------------------------------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------|
| Brennbarer Stoff<br>Flammable substance                     | Einteilung explosionsgefährdeter Bereiche<br>Classification of explosive atmospheres | Gerätegruppe gemäß RL 2014/34/EU<br>Equipment group as defined in Directive 2014/34/EC | Gerätekategorie gemäß RL 2014/34/EU<br>Equipment category as defined in Directive 2014/34/EC | Gerätegruppe gemäß EN IEC 60079-0<br>EN ISO 80079-36<br>Equipment group as defined in EN IEC 60079-0<br>EN ISO 80079-36 | Geräteschutzniveau (EPL) gemäß EN IEC 60079-0<br>EN ISO 80079-36<br>Equipment protection level (EPL) as defined in EN IEC 60079-0<br>EN ISO 80079-36 | Zündschutzart gemäß EN IEC 60079-0<br>Ignition protection type as defined in EN IEC 60079-0 |
| Gas                                                         | Zone 0                                                                               | II                                                                                     | 1G                                                                                           | II                                                                                                                      | Ga                                                                                                                                                   | ia, ma                                                                                      |
|                                                             | Zone 1                                                                               | II                                                                                     | 2G/1G                                                                                        | II                                                                                                                      | Gb/Ga                                                                                                                                                | d, q, o, e, ib, mb, px, py                                                                  |
|                                                             | Zone 2                                                                               | II                                                                                     | 3G/2G/1G                                                                                     | II                                                                                                                      | Gc/Gb/Ga                                                                                                                                             | pz, ic, nC, nA, mc, nR                                                                      |
|                                                             | Zone 20                                                                              | II                                                                                     | 1D                                                                                           | III                                                                                                                     | Da                                                                                                                                                   | ia, ta, ma                                                                                  |
|                                                             | Zone 21                                                                              | II                                                                                     | 2D/1D                                                                                        | III                                                                                                                     | Db/Da                                                                                                                                                | tb, pb, ib, mb                                                                              |
|                                                             | Zone 22                                                                              | II                                                                                     | 3D/2D/1D                                                                                     | III                                                                                                                     | Dc/Db/Da                                                                                                                                             | tc, pc, ic, mc                                                                              |
| Staub<br>Dust                                               |                                                                                      |                                                                                        |                                                                                              |                                                                                                                         |                                                                                                                                                      |                                                                                             |
|                                                             |                                                                                      |                                                                                        |                                                                                              |                                                                                                                         |                                                                                                                                                      |                                                                                             |
| Methan,<br>Kohlenstaub<br>Methane,<br>carbon dust           | Bergbau<br>Mining                                                                    | I                                                                                      | M1                                                                                           | I                                                                                                                       | Ma                                                                                                                                                   |                                                                                             |
|                                                             | Bergbau<br>Mining                                                                    | I                                                                                      | M2/M1                                                                                        | I                                                                                                                       | Mb/Ma                                                                                                                                                |                                                                                             |

## Schutzkonzepte

Protection concepts

| Allgemeine Anforderungen<br>General requirements                                                                             | Norm<br>Standard                        |
|------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------|
| <b>Elektrische Betriebsmittel für gasexplosionsgefährdete Bereiche</b><br>Electrical equipment for explosive gas atmospheres | <b>EN 60079-0</b><br><b>IEC 60079-0</b> |

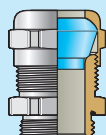
| Spezifische Anforderungen<br>Specific requirements                                                                                                                                          | Norm<br>Standard                            | Zone              | Schutzprinzip<br>Protection principle                                                                                             | Symbol                                                                                |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|-------------------|-----------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------|
| <b>Erhöhte Sicherheit „e“</b><br><b>Elektrische Betriebsmittel für gasexplosionsgefährdete Bereiche</b><br>Increased safety “e”<br>Electrical equipment for explosive gas atmospheres       | <b>EN IEC 60079-7</b><br><b>IEC 60079-7</b> | <b>1, 2</b>       | <b>Vermeidung von Funken und unzulässig hohen Temperaturen</b><br>Prevents high temperatures and sparks                           |  |
| <b>Druckfeste Kapselung „d“</b><br><b>Elektrische Betriebsmittel für gasexplosionsgefährdete Bereiche</b><br>Flameproof enclosure “d”<br>Electrical equipment for explosive gas atmospheres | <b>EN 60079-1</b><br><b>IEC 60079-1</b>     | <b>1, 2</b>       | <b>Übertragung einer Explosion nach außen wird ausgeschlossen</b><br>Prevents transmission of explosion outside                   |  |
| <b>Gehäuse „t“</b><br><b>Geräte-Staubexplosionsschutz in explosionsfähiger Atmosphäre</b><br>Protection by enclosure “t”<br>Equipment dust ignition protection in explosive atmospheres     | <b>EN 60079-31</b><br><b>IEC 60079-31</b>   | <b>20, 21, 22</b> | <b>Ex-Staubatmosphäre wird von der Zündquelle ferngehalten</b><br>Parts immersed in oil to isolate from explosive dust atmosphere |  |

## Auswahlhilfe der PFLITSCH Ex-Kabelverschraubungen

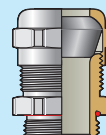
*Selection guide of PFLITSCH  
Ex cable glands*

### Ex e „erhöhte Sicherheit“

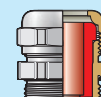
*Ex e „increased safety“*



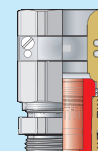
blueglobe



blueglobe HT



UNI Ex Dicht

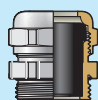


UNI Ex Klemm Dicht  
UNI Ex Clamping Dicht

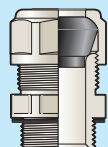
|                                                                                            |                                                                      |                                                             |                                                             |                                                           |                                                           |
|--------------------------------------------------------------------------------------------|----------------------------------------------------------------------|-------------------------------------------------------------|-------------------------------------------------------------|-----------------------------------------------------------|-----------------------------------------------------------|
| <b>ATEX-Zulassung</b><br><i>ATEX standards</i>                                             |                                                                      | PTB 06 ATEX 1036X                                           | PTB 11 ATEX 1007X                                           | PTB 14 ATEX 1011X                                         | PTB 14 ATEX 1012                                          |
| <b>IECEX-Zulassung</b><br><i>IECEX standards</i>                                           |                                                                      | IECEX PTB 10.0004X                                          | IECEX PTB 11.0019X                                          | IECEX PTB 14.0021X                                        | IECEX PTB 14.0022                                         |
| <b>Zündschutzart</b><br><i>Ignition protection types</i>                                   |                                                                      | eb, tb                                                      | eb, tb                                                      | eb, tb                                                    | eb, tb                                                    |
| <b>Schutzart IP</b><br><i>Type of protection</i>                                           |                                                                      | IP 66, IP 68 bis 15 bar<br><i>IP 66, IP 68 up to 15 bar</i> | IP 66, IP 68 bis 15 bar<br><i>IP 66, IP 68 up to 15 bar</i> | IP 66, IP 68 bis 5 bar<br><i>IP 66, IP 68 up to 5 bar</i> | IP 66, IP 68 bis 5 bar<br><i>IP 66, IP 68 up to 5 bar</i> |
| <b>Betriebstemperaturbereich</b><br><i>Operating temperature range</i>                     |                                                                      | –20 °C / +60 °C                                             | –55 °C / +160 °C                                            | –20 °C / +60 °C                                           | –20 °C / +60 °C                                           |
| <b>Ausführung armierte Kabel</b><br><i>Version armoured cables</i>                         |                                                                      | ✓                                                           | ✓                                                           |                                                           |                                                           |
| <b>Ausführung nicht-armierte Kabel</b><br><i>Version non-armoured cables</i>               |                                                                      | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
| <b>Material Verschraubungskörper</b><br><i>Material gland body</i>                         | <b>Messing vernickelt</b><br><i>Nickel-plated</i>                    | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
|                                                                                            | <b>Edelstahl 1.4305</b><br><i>Stainless steel AISI 303</i>           | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
|                                                                                            | <b>Edelstahl 1.4404</b><br><i>Stainless steel AISI 316L</i>          |                                                             |                                                             |                                                           |                                                           |
|                                                                                            | <b>Edelstahl 1.4571</b><br><i>Stainless steel AISI 316Ti</i>         | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
|                                                                                            | <b>Polycarbonat "PC"</b><br><i>Polycarbonate "PC"</i>                |                                                             |                                                             |                                                           |                                                           |
| <b>Material Dichteinsatz</b><br><i>Material sealing insert</i>                             | <b>TPE</b><br><i>TPE</i>                                             | ✓                                                           |                                                             | ✓                                                         | ✓                                                         |
|                                                                                            | <b>Silikon</b><br><i>Silicone</i>                                    |                                                             | ✓                                                           |                                                           |                                                           |
| <b>Anschlussgewindeart</b><br><i>Type of connection</i>                                    | <b>Metrisch</b><br><i>Metric</i>                                     | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
|                                                                                            | <b>Pg</b><br><i>Pg</i>                                               |                                                             |                                                             | ✓                                                         | ✓                                                         |
|                                                                                            | <b>NPT</b><br><i>NPT</i>                                             |                                                             |                                                             | ✓                                                         | ✓                                                         |
| <b>Anschlussgewindelänge lang</b><br><i>Connection thread length</i>                       |                                                                      | ✓                                                           | ✓                                                           | ✓                                                         | ✓                                                         |
| <b>Ausführung erhöhte Zugentlastung "zu"</b><br><i>Version enhanced strain relief "zu"</i> |                                                                      |                                                             |                                                             | ✓                                                         | ✓                                                         |
| <b>Ausführung Mehrfach-Dichteinsatz</b><br><i>Version multiple sealing insert</i>          |                                                                      |                                                             |                                                             | ✓                                                         |                                                           |
| <b>Ausführung EMV</b><br><i>Version EMC</i>                                                | <b>"TRI" (Federkontaktierung)</b><br><i>"TRI" (spring contact)</i>   | ✓                                                           | ✓                                                           |                                                           |                                                           |
|                                                                                            | <b>"AC" (Klemmring)</b><br><i>"AC" (clamping ring)</i>               | ✓                                                           | ✓                                                           |                                                           |                                                           |
|                                                                                            | <b>"HF" (Federkontaktierung)</b><br><i>"HF" (spring contact)</i>     |                                                             |                                                             | ✓                                                         | ✓                                                         |
|                                                                                            | <b>"IRIS" (Federkontaktierung)</b><br><i>"IRIS" (spring contact)</i> |                                                             |                                                             | ✓                                                         |                                                           |
|                                                                                            | <b>"EMV" (Konuskontaktierung)</b><br><i>"EMV" (conical contact)</i>  |                                                             |                                                             | ✓                                                         |                                                           |
| <b>Ausführung Schlauchanschluss "SVD"</b><br><i>Version hose connector "SVD"</i>           |                                                                      |                                                             |                                                             | ✓                                                         |                                                           |
| <b>Detailed information on Page</b>                                                        |                                                                      | 267                                                         | 273                                                         | 277                                                       | 289                                                       |

✓ Zutreffend  
Yes

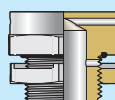
**Ex e „erhöhte Sicherheit“**  
*Ex e „increased safety“*



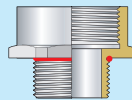
**UNI Ex Silikon**  
**UNI Ex Silicone**



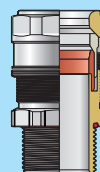
blueglobe PC HT



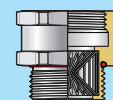
## Entlüftungsstutzen *Breather drain*



**Zubehör Ex e**  
**Accessories Ex e**



**Serie LevelEx**  
*LevelEx series*



**Zubehör Ex d**  
***Accessories Ex d***

[illegible]

\* O-Ring – Nitrile  
\* *O-ring – Nitrile*

\*\* O-Ring – Silikon  
\*\* *O-ring – Silicone*

## blueglobe PC HT Kabelverschraubung Ex eb / Ex ta

blueglobe PC HT cable gland Ex eb / Ex ta



Abb. 1  
Fig. 1

### Werkstoff

|                |         |        |           |
|----------------|---------|--------|-----------|
| Verschraubung: | PC      | Farbe: | grau      |
|                | PCn     | Farbe: | schwarz   |
|                | PCa     | Farbe: | blau (DS) |
| Dichteinsatz:  | Silikon | Farbe: | Schwarz   |
| Flachdichtung: | TPE     | Farbe: | Schwarz   |



### Explosionsschutz

|                                                                |                                                                                                                   |
|----------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                 | Gas Staub Explosionsgeschützt – „e“ Schutz durch Gehäuse – „t“ Schutzart EN 60529: IP 66, IP 68 (10 bar, 60 min.) |
| Gerätegruppe/Kategorie:                                        | II 2 G/ II 1D                                                                                                     |
| Einsetzbar in:                                                 | Zone 1, Zone 2, Zone 20, 21 und 22 (leitender Staub)                                                              |
| Normen:                                                        | EN IEC 60079-0:2018<br>EN IEC 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                          |
| Kennzeichnung Zulassungsnummer und Kennzeichen der Prüfstelle: | IBExU 24 ATEX 1050 X xx CE 0637<br>xx = Größe Anschlussgewinde                                                    |
| Kennzeichnung Gas:                                             | II 2G Ex eb IIC Gb                                                                                                |
| Kennzeichnung Staub:                                           | II 1D Ex tb IIIC Da                                                                                               |
| Weitere Zertifikate:                                           | IECEx – IECEx IBE 24.0013X                                                                                        |

Die **Kabelverschraubung blueglobe PC HT Ex eb / Ex ta** steht für unterschiedliche Anwendungsfälle in verschiedenen Ausführungen als Komplettverschraubung zur Verfügung.

### Betriebstemperaturbereich:

Dichtelemente: Silikon –20 °C bis +60 °C

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

M-Gewinde Standard, EN 60423

M-Gewinde lang, 15 mm, EN 60423

### Besondere Bedingungen:

Es dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten. Die Schutzart IP 66/IP 68 wird nur bei sachgerechtem Einbau von Dichtung und Kabel- und Leitungseinführungen erreicht. Die Hinweise des Herstellers sind zu beachten. Die Kabel- und Leitungseinführungen in Größe M16 bis M32 ist für niedrige mechanische Gefährdung geeignet.

### Polycarbonat

Metrisches Anschlussgewinde nach EN 60423

Mit Flachdichtung aus TPE

Schutzart IP 66, IP 68 (10 bar, 60 Min.)

Polycarbonate

Metric connection thread according to EN 60423

With flat sealing ring made of TPE

Type of protection IP 66, IP 68 (10 bar, 60 min.)

### Material

|                 |          |         |           |
|-----------------|----------|---------|-----------|
| Gland:          | PC       | Colour: | gray      |
|                 | PCn      | Colour: | black     |
|                 | PCa      | Colour: | blue (DS) |
| Sealing insert: | Silicone | Colour: | black     |
| Flat sealing:   | TPE      | Colour: | black     |



### Explosion protection

|                                                 |                                                                                                                           |
|-------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                       | Gas Dust Increased safety – “e” Protection by enclosure – “t” Type of protection EN 60529: IP 66, IP 68 (10 bar, 60 min.) |
| Equipment group/category:                       | II 2 G/ II 1D                                                                                                             |
| For use in:                                     | Zone 1, zone 2, zones 20, 21 and 22 (conductive dust)                                                                     |
| Standards:                                      | EN IEC 60079-0:2018<br>EN IEC 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                                  |
| Marking, certificate number and test centre ID: | IBExU 24 ATEX 1050 X xx CE 0637<br>xx = size of connection thread                                                         |
| Gas marking:                                    | II 2G Ex eb IIC Gb                                                                                                        |
| Dust marking:                                   | II 1D Ex tb IIIC Da                                                                                                       |
| Other certificates:                             | IECEx – IECEx IBE 24.0013X                                                                                                |

The **blueglobe PC HT Ex eb / Ex ta cable gland** is available as an all-in-one gland in different versions for different applications.

### Operating temperature range:

Sealing elements: silicone –20 °C up to +60 °C

The Ex cable gland **can be purchased with different connection thread types and lengths:**

M thread standard, EN 60423

M thread long, 15 mm, EN 60423

### Special conditions:

Only fixed cables may be inserted. The operator must ensure appropriate strain relief. IP 66/IP 68 protection is only attained if the seal and the cable glands are properly assembled. The manufacturer's instructions should be observed. Cable glands of size M16 up to M32 have been tested for low risk of mechanical hazards.

# blueglobe PC HT Kabelverschraubung Ex eb / Ex ta

blueglobe PC HT cable gland Ex eb / Ex ta



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Polycarbonat**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit Flachdichtung aus TPE**  
**Schutzart IP 66, IP 68 (10 bar, 60 Min.)**

Polycarbonate  
Metric connection thread according to EN 60423  
With flat sealing ring made of TPE  
Type of protection IP 66, IP 68 (10 bar, 60 min.)

**i Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm**  
Available on request: 15 mm connection thread

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour  | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|------------------|--------------------------------------------------------------|
| PC                                                    | Grau<br>Grey                       |                                         | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -20 °C / +60 °C                                              |
| PC                                                    | Schwarz<br>Black                   | n                                       | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -20 °C / +60 °C                                              |

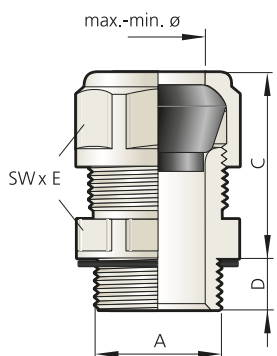


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no.                                         | Dichtbereich<br>Sealing range | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width                                          |
|-----------------------------------------------------|---------|--------------------------------------------------------------|-------------------------------|----------------------------|--------------------------------------------------------------------------|
|                                                     |         | Ausführung bitte ergänzen<br>Please indicate product details |                               |                            |                                                                          |
| A                                                   | D<br>mm | Grau/Grey =<br>Schwarz/Black = n                             | max./min. ø<br>mm             | C<br>mm                    | SW <sub>1</sub> x E <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub><br>mm |
| M16x1,5                                             | 6,0     | bg 216PC                                                     | HTex 10,0 – 6,0               | 28,0                       | 20x22,8/20x22,2 50                                                       |
| M20x1,5                                             | 6,0     | bg 220PC                                                     | HTex 14,0 – 6,0               | 33,0                       | 24x27/20x22,2 50                                                         |
| M25x1,5                                             | 6,0     | bg 225PC                                                     | HTex 20,0 – 12,5              | 35,0                       | 30x34/20x22,2 50                                                         |
| M32x1,5                                             | 6,0     | bg 232PC                                                     | HTex 25,0 – 15,0              | 34,0                       | 36x41/20x22,2 25                                                         |
| M40x1,5                                             | 6,0     | bg 240PC                                                     | HTex 32,0 – 20,0              | 39,0                       | 45x49,5/20x22,2 10                                                       |

81000 IT00700

# blueglobe PC HT Kabelverschraubung Ex eb / Ex ta für eigensichere Stromkreise Ex i

blueglobe PC HT cable gland Ex e / Ex ta for intrinsically safe circuits Ex i



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Polycarbonat**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit Flachdichtung aus TPE**  
**Schutzart IP 66, IP 68 (10 bar, 60 Min.)**

Polycarbonate  
Metric connection thread according to EN 60423  
With flat sealing ring made of TPE  
Type of protection IP 66, IP 68 (10 bar, 60 min.)

**i Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm**  
Available on request: 15 mm connection thread

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour  | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|------------------|--------------------------------------------------------------|
| PC                                                    | Blau<br>Blue                       | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -20 °C / +60 °C                                              |

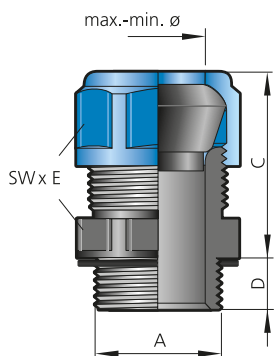


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich ohne Inlet<br>Sealing range without inlet | Dichtbereich mit Inlet<br>Sealing range with inlet | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |
|-----------------------------------------------------|---------|----------------------|-------------------------------|--------------------------------------------------------|----------------------------------------------------|----------------------------|---------------------------------|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                                      | max./min. ø<br>mm                                  | C<br>mm                    | SW x E<br>mm                    |
| M16x1,5                                             | 6,0     | bg 216PCa            | HTex 10,0 – 6,0               | 10,0 – 7,0                                             | 7,0 – 6,0                                          | 28,0                       | 20x22,8 50                      |
| M20x1,5                                             | 6,0     | bg 220PCa            | HTex 14,0 – 6,0               | 14,0 – 9,0                                             | 9,0 – 6,0                                          | 33,0                       | 24x27 50                        |
| M25x1,5                                             | 6,0     | bg 225PCa            | HTex 20,0 – 12,5              | 20,0 – 16,0                                            | 16,0 – 12,5                                        | 35,0                       | 30x34 50                        |
| M32x1,5                                             | 6,0     | bg 232PCa            | HTex 25,0 – 15,0              | 25,0 – 20,0                                            | 20,0 – 15,0                                        | 34,0                       | 36x41 25                        |
| M40x1,5                                             | 6,0     | bg 240PCa            | HTex 32,0 – 20,0              | 32,0 – 26,0                                            | 26,0 – 20,0                                        | 39,0                       | 45x49,5 10                      |

81200 IT15000

## Ex-Zulassung: Typ blueglobe

Ex approval: Type blueglobe



Abb. 1  
Fig. 1

### Werkstoff

|                |                      |                        |  |
|----------------|----------------------|------------------------|--|
| Verschraubung: | Messing<br>Edelstahl | vernickelt<br>1.4305   |  |
| Dichteinsatz:  | TPE                  | Farbe: Blau (RAL 5012) |  |
| O-Ring:        | HNBR                 | Farbe: Schwarz         |  |
|                | Silikon              | Farbe: Rot             |  |

### Explosionsschutz

|                                                                |                                                                                                                  |                                                                                                     |
|----------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                 | Gas<br>Staub                                                                                                     | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68 bis 15 bar |
| Gerätegruppe/Kategorie:                                        | II 2 G/ II 2D                                                                                                    |                                                                                                     |
| Einsetzbar in:                                                 | Zone 1, Zone 2, Zone 21 und 22<br>(leitender Staub)                                                              |                                                                                                     |
| Normen:                                                        | EN IEC 60079-0:2018<br>EN 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                             |                                                                                                     |
| Kennzeichnung Zulassungsnummer und Kennzeichen der Prüfstelle: | PTB 06 ATEX 1036X xx CE 0637<br>xx = Größe Anschlussgewinde                                                      |                                                                                                     |
| Kennzeichnung Gas:                                             | II 2G Ex eb IIC Gb                                                                                               |                                                                                                     |
| Kennzeichnung Staub:                                           | II 2D Ex tb IIIC Db                                                                                              |                                                                                                     |
| Kennzeichnung kleiner Ex-Geräte:*                              | II 2G/II 2D CE 0637                                                                                              |                                                                                                     |
| Weitere Zertifikate:                                           | IECEx – IECEx PTB 10.0004X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000348<br>UKCA – CML 22UKEX3130X |                                                                                                     |

\* Kennzeichnung auf Kabelverschraubung bis Größe M16.

Die **Kabelverschraubung blueglobe Ex eb / Ex tb** steht für unterschiedliche Anwendungsfälle in verschiedenen Ausführungen als Komplettverschraubung zur Verfügung.

### Betriebstemperaturbereich:

TPE –20 °C bis +60 °C

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

M-Gewinde Standard, EN 60423

M-Gewinde lang, 15 mm, EN 60423

### Besondere Bedingungen:

Es dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten.

Die Kabel- und Leitungsdurchführungen mit niedriger Schlagenergie sind so anzubringen, dass sie vor Stoßenergie mechanisch geschützt sind.

### Varianten:

- blueglobe Ex eb / Ex tb
- blueglobe TRI EMV-Kabelverschraubung Ex eb / Ex tb
- blueglobe AC Kabelverschraubung Ex eb / Ex tb (für stahlarmierte Kabel)

### Variants:

- blueglobe Ex eb / Ex tb
- blueglobe TRI EMC cable gland Ex eb / Ex tb
- blueglobe AC cable gland Ex eb / Ex tb (for steel-armoured cables)

### Material

|                 |                          |                           |  |
|-----------------|--------------------------|---------------------------|--|
| Gland:          | Brass<br>Stainless steel | Nickel-plated<br>AISI 303 |  |
| Sealing insert: | TPE                      | Colour: blue (RAL 5012)   |  |
| O-ring:         | HNBR<br>Silicone         | Colour: black<br>red      |  |

### Explosion protection

|                                                 |                                                                                                                  |                                                                                                                   |
|-------------------------------------------------|------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                       | Gas<br>Dust                                                                                                      | Increased safety – “e”<br>Protection by enclosure – “t”<br>Type of protection EN 60529: IP 66, IP 68 up to 15 bar |
| Equipment group/category:                       | II 2 G/ II 2D                                                                                                    |                                                                                                                   |
| For use in:                                     | Zone 1, zone 2, zones 21 and 22<br>(conductive dust)                                                             |                                                                                                                   |
| Standards:                                      | EN IEC 60079-0:2018<br>EN 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                             |                                                                                                                   |
| Marking, certificate number and test centre ID: | PTB 06 ATEX 1036X xx CE 0637<br>xx = size of connection thread                                                   |                                                                                                                   |
| Gas marking:                                    | II 2G Ex eb IIC Gb                                                                                               |                                                                                                                   |
| Dust marking:                                   | II 2D Ex tb IIIC Db                                                                                              |                                                                                                                   |
| Marking on small explosion-proof devices:*      | II 2G/II 2D CE 0637                                                                                              |                                                                                                                   |
| Other certificates:                             | IECEx – IECEx PTB 10.0004X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000348<br>UKCA – CML 22UKEX3130X |                                                                                                                   |

\* Marking on cable gland up to size M16.

The **blueglobe Ex eb / Ex tb cable gland** is available as an all-in-one gland in different versions for different applications.

### Operating temperature range:

TPE –20 °C up to +60 °C

The Ex cable gland **can be purchased with different connection thread types and lengths:**

M thread standard, EN 60423

M thread long, 15 mm, EN 60423

### Special conditions:

Only fixed cables may be inserted. The operator must ensure appropriate strain relief.

Cable glands with low impact energy should be mounted in such a way that they are mechanically protected against the kinetic energy of impact.

**blueglobe Ex eb / Ex tb**

RoHS       



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 15 bar**

*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 15 bar*

**M10 mit O-Ring-Nut am Gewinde**  
*M10 with o-ring groove at the thread*

| Werkstoff Verschraubungskörper<br><i>Material gland body</i> | Ausführung/Farbe<br><i>Version/colour</i> | Werkstoff Dichteinsatz<br><i>Material sealing insert</i> | Farbe<br><i>Colour</i> | Temperaturbereich min./max.<br><i>Temperature range (min./max.)</i> |
|--------------------------------------------------------------|-------------------------------------------|----------------------------------------------------------|------------------------|---------------------------------------------------------------------|
| Messing<br>Brass                                             | Vernickelt<br>Nickel-plated               | TPE                                                      | Blau<br>Blue           | -20 °C / +60 °C                                                     |

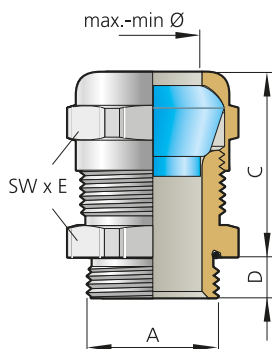


Abb. 3 – mit Inlet  
Fig. 3 – With inlet

| Anschlussgewinde/<br>-länge<br><i>Connection thread/length</i> |         | Art.-Nr.<br><i>Art. no.</i> | Dichtbereich<br><i>Sealing range</i> | Dichtbereich<br>ohne Inlet<br><i>Sealing range<br/>without inlet</i> | Dichtbereich<br>mit Inlet<br><i>Sealing range<br/>with inlet</i> | Bauhöhe<br><i>Mounting<br/>height</i> | Schlüssel-<br>weite<br><i>Spanner<br/>width</i> |    |
|----------------------------------------------------------------|---------|-----------------------------|--------------------------------------|----------------------------------------------------------------------|------------------------------------------------------------------|---------------------------------------|-------------------------------------------------|----|
| A                                                              | D<br>mm |                             | max./min. ø<br>mm                    | max./min. ø<br>mm                                                    | max./min. ø<br>mm                                                | C<br>mm                               | SW x E<br>mm                                    |    |
| M10x1,0                                                        | 6,0     | bg 210msex*                 | 6,0– 2,5                             | 6,0– 3,0                                                             | 3,0– 2,5                                                         | 20,0                                  | 13x14,2                                         | 50 |
| M12x1,5                                                        | 5,0     | bg 212msex                  | 8,0– 3,0                             | 8,0– 5,0                                                             | 5,0– 3,0                                                         | 21,0                                  | 17x18,9                                         | 50 |
| M16x1,5                                                        | 6,0     | bg 216msex                  | 11,0– 5,0                            | 11,0– 7,0                                                            | 7,0– 5,0                                                         | 25,0                                  | 20x22,2                                         | 50 |
| M20x1,5                                                        | 6,5     | bg 220msex                  | 14,0– 6,0                            | 14,0– 9,0                                                            | 9,0– 6,0                                                         | 29,5                                  | 24x26,5                                         | 50 |
| M25x1,5                                                        | 7,5     | bg 225msex                  | 20,0– 12,0                           | 20,0– 16,0                                                           | 16,0– 12,0                                                       | 30,0                                  | 30x33                                           | 50 |
| M32x1,5                                                        | 8,0     | bg 232msex                  | 25,0– 17,0                           | 25,0– 20,0                                                           | 20,0– 17,0                                                       | 32,0                                  | 36x39,5                                         | 25 |
| M40x1,5                                                        | 8,0     | bg 240msex                  | 32,0– 21,0                           | 32,0– 26,0                                                           | 26,0– 21,0                                                       | 35,0                                  | 45x48                                           | 10 |
| M50x1,5                                                        | 10,0    | bg 250msex                  | 42,0– 32,0                           | 42,0– 35,0                                                           | 35,0– 32,0                                                       | 39,0                                  | 57x61                                           | 5  |
| M63x1,5                                                        | 10,0    | bg 263msex                  | 54,0– 42,0                           | 54,0– 46,0                                                           | 46,0– 42,0                                                       | 40,0                                  | 68x72                                           | 5  |
| M75x1,5                                                        | 15,0    | bg 275msex                  | 65,0– 55,0                           | 65,0– 58,0                                                           | 58,0– 55,0                                                       | 48,0                                  | 81x87                                           | 5  |
| M85x2,0                                                        | 15,0    | bg 285msex                  | 77,0– 66,0                           | 77,0– 70,0                                                           | 70,0– 66,0                                                       | 49,0                                  | 95x102                                          | 1  |

\* Schutzart IP 66.

\* Type of protection IP 66.

| Anschlussgewinde/<br>-länge<br><i>Connection thread/length</i> |         | Art.-Nr.<br><i>Art. no.</i> | Dichtbereich<br><i>Sealing range</i> | Dichtbereich<br>ohne Inlet<br><i>Sealing range<br/>without inlet</i> | Dichtbereich<br>mit Inlet<br><i>Sealing range<br/>with inlet</i> | Bauhöhe<br><i>Mounting<br/>height</i> | Schlüssel-<br>weite<br><i>Spanner<br/>width</i> |    |
|----------------------------------------------------------------|---------|-----------------------------|--------------------------------------|----------------------------------------------------------------------|------------------------------------------------------------------|---------------------------------------|-------------------------------------------------|----|
| A                                                              | D<br>mm |                             | max./min. ø<br>mm                    | max./min. ø<br>mm                                                    | max./min. ø<br>mm                                                | C<br>mm                               | SW x E<br>mm                                    |    |
| M10x1,0                                                        | 15,0    | bg 810msex*                 | 6,0– 2,5                             | 6,0– 3,0                                                             | 3,0– 2,5                                                         | 20,0                                  | 13x14,2                                         | 50 |
| M12x1,5                                                        | 15,0    | bg 812msex                  | 8,0– 3,0                             | 8,0– 5,0                                                             | 5,0– 3,0                                                         | 21,0                                  | 17x18,9                                         | 50 |
| M16x1,5                                                        | 15,0    | bg 816msex                  | 11,0– 5,0                            | 11,0– 7,0                                                            | 7,0– 5,0                                                         | 25,0                                  | 20x22,2                                         | 50 |
| M20x1,5                                                        | 15,0    | bg 820msex                  | 14,0– 6,0                            | 14,0– 9,0                                                            | 9,0– 6,0                                                         | 29,5                                  | 24x26,5                                         | 50 |
| M25x1,5                                                        | 15,0    | bg 825msex                  | 20,0– 12,0                           | 20,0– 16,0                                                           | 16,0– 12,0                                                       | 30,0                                  | 30x33                                           | 50 |
| M32x1,5                                                        | 15,0    | bg 832msex                  | 25,0– 17,0                           | 25,0– 20,0                                                           | 20,0– 17,0                                                       | 32,0                                  | 36x39,5                                         | 25 |
| M40x1,5                                                        | 15,0    | bg 840msex                  | 32,0– 21,0                           | 32,0– 26,0                                                           | 26,0– 21,0                                                       | 35,0                                  | 45x48                                           | 10 |
| M50x1,5                                                        | 15,0    | bg 850msex                  | 42,0– 32,0                           | 42,0– 35,0                                                           | 35,0– 32,0                                                       | 39,0                                  | 57x61                                           | 5  |
| M63x1,5                                                        | 15,0    | bg 863msex                  | 54,0– 42,0                           | 54,0– 46,0                                                           | 46,0– 42,0                                                       | 40,0                                  | 68x72                                           | 5  |

**Anzugsdrehmomente siehe Technischer Anhang, Seite 434**  
*For tightening torques, see Technical Appendix, page 434*

**blueglobe Ex eb / Ex tb – Edelstahl 1.4305**

blueglobe Ex eb / Ex tb – Stainless steel AISI 303



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl 1.4305**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 15 bar**

*Stainless steel AISI 303*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 up to 15 bar*

**i** Die Druckschraube mit aufgeprägter Ziffer „1“ entspricht Edelstahl 1.4305.  
The pressure screw with number "1" impressed equals stainless steel AISI 303.

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| VA 1.4305<br>AISI 303                                 | Blank                              | TPE                                               | Blau<br>Blue    | -20 °C / +60 °C                                              |

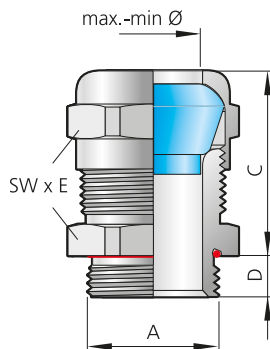


Abb. 3 – mit Inlet  
Fig. 3 – With inlet

| Anschlussgewinde/<br>-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range<br>max./min. ø<br>mm | Dichtbereich<br>ohne Inlet<br>Sealing range<br>without inlet<br>max./min. ø<br>mm | Dichtbereich<br>mit Inlet<br>Sealing range<br>with inlet<br>max./min. ø<br>mm | Bauhöhe<br>Mounting<br>height<br>C<br>mm | Schlüssel-<br>weite<br>Spanner<br>width<br>SW x E<br>mm |    |
|---------------------------------------------------------|---------|----------------------|----------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------|------------------------------------------|---------------------------------------------------------|----|
| A                                                       | D<br>mm |                      |                                                    |                                                                                   |                                                                               |                                          |                                                         |    |
| M10x1,0                                                 | 6,0     | bg 210VAex*          | 6,0 – 2,5                                          | 6,0 – 3,0                                                                         | 3,0 – 2,5                                                                     | 20,0                                     | 13x14,2                                                 | 50 |
| M12x1,5                                                 | 5,0     | bg 212VAex           | 8,0 – 3,0                                          | 8,0 – 5,0                                                                         | 5,0 – 3,0                                                                     | 21,0                                     | 17x18,9                                                 | 50 |
| M16x1,5                                                 | 6,0     | bg 216VAex           | 11,0 – 5,0                                         | 11,0 – 7,0                                                                        | 7,0 – 5,0                                                                     | 25,0                                     | 20x22,2                                                 | 50 |
| M20x1,5                                                 | 6,5     | bg 220VAex           | 14,0 – 6,0                                         | 14,0 – 9,0                                                                        | 9,0 – 6,0                                                                     | 29,5                                     | 24x26,5                                                 | 50 |
| M25x1,5                                                 | 7,5     | bg 225VAex           | 20,0 – 12,0                                        | 20,0 – 16,0                                                                       | 16,0 – 12,0                                                                   | 30,0                                     | 30x33                                                   | 50 |
| M32x1,5                                                 | 8,0     | bg 232VAex           | 25,0 – 17,0                                        | 25,0 – 20,0                                                                       | 20,0 – 17,0                                                                   | 32,0                                     | 36x39,5                                                 | 25 |
| M40x1,5                                                 | 8,0     | bg 240VAex           | 32,0 – 21,0                                        | 32,0 – 26,0                                                                       | 26,0 – 21,0                                                                   | 35,0                                     | 45x48                                                   | 10 |
| M50x1,5                                                 | 10,0    | bg 250VAex           | 42,0 – 32,0                                        | 42,0 – 35,0                                                                       | 35,0 – 32,0                                                                   | 39,0                                     | 57x60                                                   | 5  |
| M63x1,5                                                 | 10,0    | bg 263VAex           | 54,0 – 42,0                                        | 54,0 – 46,0                                                                       | 46,0 – 42,0                                                                   | 40,0                                     | 68x72                                                   | 5  |
| M75x1,5                                                 | 15,0    | bg 275VAex           | 65,0 – 55,0                                        | 65,0 – 58,0                                                                       | 58,0 – 55,0                                                                   | 47,0                                     | 81x87                                                   | 5  |
| M85x2,0                                                 | 15,0    | bg 285VAex           | 77,0 – 66,0                                        | 77,0 – 70,0                                                                       | 70,0 – 66,0                                                                   | 49,0                                     | 95x102                                                  | 1  |

\* Schutzart IP 66.  
\* Type of protection IP 66.

| Anschlussgewinde/<br>-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range<br>max./min. ø<br>mm | Dichtbereich<br>ohne Inlet<br>Sealing range<br>without inlet<br>max./min. ø<br>mm | Dichtbereich<br>mit Inlet<br>Sealing range<br>with inlet<br>max./min. ø<br>mm | Bauhöhe<br>Mounting<br>height<br>C<br>mm | Schlüssel-<br>weite<br>Spanner<br>width<br>SW x E<br>mm |    |
|---------------------------------------------------------|---------|----------------------|----------------------------------------------------|-----------------------------------------------------------------------------------|-------------------------------------------------------------------------------|------------------------------------------|---------------------------------------------------------|----|
| A                                                       | D<br>mm |                      |                                                    |                                                                                   |                                                                               |                                          |                                                         |    |
| M10x1,0                                                 | 15,0    | bg 810VAex*          | 6,0 – 2,5                                          | 6,0 – 3,0                                                                         | 3,0 – 2,5                                                                     | 20,0                                     | 13x14,2                                                 | 50 |
| M12x1,5                                                 | 15,0    | bg 812VAex           | 8,0 – 3,0                                          | 8,0 – 5,0                                                                         | 5,0 – 3,0                                                                     | 21,0                                     | 17x18,9                                                 | 50 |
| M16x1,5                                                 | 15,0    | bg 816VAex           | 11,0 – 5,0                                         | 11,0 – 7,0                                                                        | 7,0 – 5,0                                                                     | 25,0                                     | 20x22,2                                                 | 50 |
| M20x1,5                                                 | 15,0    | bg 820VAex           | 14,0 – 6,0                                         | 14,0 – 9,0                                                                        | 9,0 – 6,0                                                                     | 29,5                                     | 24x26,5                                                 | 50 |
| M25x1,5                                                 | 15,0    | bg 825VAex           | 20,0 – 12,0                                        | 20,0 – 16,0                                                                       | 16,0 – 12,0                                                                   | 30,0                                     | 30x33                                                   | 50 |
| M32x1,5                                                 | 15,0    | bg 832VAex           | 25,0 – 17,0                                        | 25,0 – 20,0                                                                       | 20,0 – 17,0                                                                   | 32,0                                     | 36x39,5                                                 | 25 |
| M40x1,5                                                 | 15,0    | bg 840VAex           | 32,0 – 21,0                                        | 32,0 – 26,0                                                                       | 26,0 – 21,0                                                                   | 35,0                                     | 45x48                                                   | 10 |
| M50x1,5                                                 | 15,0    | bg 850VAex           | 42,0 – 32,0                                        | 42,0 – 35,0                                                                       | 35,0 – 32,0                                                                   | 39,0                                     | 57x60                                                   | 5  |
| M63x1,5                                                 | 15,0    | bg 863VAex           | 54,0 – 42,0                                        | 54,0 – 46,0                                                                       | 46,0 – 42,0                                                                   | 40,0                                     | 68x72                                                   | 5  |

**i** Anzugsdrehmomente siehe Technischer Anhang, Seite 434  
For tightening torques, see Technical Appendix, page 434

# blueglobe Ex eb / Ex tb – Edelstahl 1.4571

blueglobe Ex eb / Ex tb – Stainless steel AISI 316Ti

RoHS       



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl 1.4571**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 15 bar**

*Stainless steel AISI 316Ti*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 up to 15 bar*

**i** Die Druckschraube mit aufgeprägter Ziffer „2“ entspricht Edelstahl 1.4571.  
The pressure screw with number “2” impressed equals stainless steel AISI 316Ti

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| VA 1.4571<br>AISI 316Ti                               | Blank                              | TPE                                               | Blau<br>Blue    | -20 °C / +60 °C                                              |

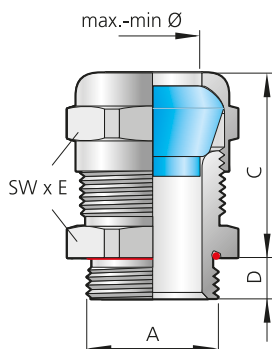


Abb. 3 – mit Inlet  
Fig. 3 – With inlet

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich ohne Inlet<br>Sealing range without inlet | Dichtbereich mit Inlet<br>Sealing range with inlet | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                     |
|-----------------------------------------------------|---------|----------------------|-------------------------------|--------------------------------------------------------|----------------------------------------------------|----------------------------|---------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                                      | max./min. ø<br>mm                                  | C<br>mm                    | SW x E<br>mm                    |  |
| M12x1,5                                             | 5,0     | bg 212V4Aex          | 8,0 – 3,0                     | 8,0 – 5,0                                              | 5,0 – 3,0                                          | 21,0                       | 17x18,9                         | 50                                                                                  |
| M16x1,5                                             | 6,0     | bg 216V4Aex          | 11,0 – 5,0                    | 11,0 – 7,0                                             | 7,0 – 5,0                                          | 25,0                       | 20x22,2                         | 50                                                                                  |
| M20x1,5                                             | 6,5     | bg 220V4Aex          | 14,0 – 6,0                    | 14,0 – 9,0                                             | 9,0 – 6,0                                          | 29,5                       | 24x26,5                         | 50                                                                                  |
| M25x1,5                                             | 7,5     | bg 225V4Aex          | 20,0 – 12,0                   | 20,0 – 16,0                                            | 16,0 – 12,0                                        | 30,0                       | 30x33                           | 50                                                                                  |
| M32x1,5                                             | 8,0     | bg 232V4Aex          | 25,0 – 17,0                   | 25,0 – 20,0                                            | 20,0 – 17,0                                        | 32,0                       | 36x39,5                         | 25                                                                                  |
| M40x1,5                                             | 8,0     | bg 240V4Aex          | 32,0 – 21,0                   | 32,0 – 26,0                                            | 26,0 – 21,0                                        | 35,0                       | 45x48                           | 10                                                                                  |
| M50x1,5                                             | 10,0    | bg 250V4Aex          | 42,0 – 32,0                   | 42,0 – 35,0                                            | 35,0 – 32,0                                        | 39,0                       | 57x60                           | 5                                                                                   |
| M63x1,5                                             | 10,0    | bg 263V4Aex          | 54,0 – 42,0                   | 54,0 – 46,0                                            | 46,0 – 42,0                                        | 40,0                       | 68x72                           | 5                                                                                   |
| M75x1,5                                             | 15,0    | bg 275V4Aex          | 65,0 – 55,0                   | 65,0 – 58,0                                            | 58,0 – 55,0                                        | 47,0                       | 81x87                           | 5                                                                                   |
| M85x2,0                                             | 15,0    | bg 285V4Aex          | 77,0 – 66,0                   | 77,0 – 70,0                                            | 70,0 – 66,0                                        | 49,0                       | 95x102                          | 1                                                                                   |

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich ohne Inlet<br>Sealing range without inlet | Dichtbereich mit Inlet<br>Sealing range with inlet | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                       |
|-----------------------------------------------------|---------|----------------------|-------------------------------|--------------------------------------------------------|----------------------------------------------------|----------------------------|---------------------------------|---------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                                      | max./min. ø<br>mm                                  | C<br>mm                    | SW x E<br>mm                    |  |
| M12x1,5                                             | 15,0    | bg 812V4Aex          | 8,0 – 3,0                     | 8,0 – 5,0                                              | 5,0 – 3,0                                          | 21,0                       | 17x18,9                         | 50                                                                                    |
| M16x1,5                                             | 15,0    | bg 816V4Aex          | 11,0 – 5,0                    | 11,0 – 7,0                                             | 7,0 – 5,0                                          | 25,0                       | 20x22,2                         | 50                                                                                    |
| M20x1,5                                             | 15,0    | bg 820V4Aex          | 14,0 – 6,0                    | 14,0 – 9,0                                             | 9,0 – 6,0                                          | 29,5                       | 24x26,5                         | 50                                                                                    |
| M25x1,5                                             | 15,0    | bg 825V4Aex          | 20,0 – 12,0                   | 20,0 – 16,0                                            | 16,0 – 12,0                                        | 30,0                       | 30x33                           | 50                                                                                    |
| M32x1,5                                             | 15,0    | bg 832V4Aex          | 25,0 – 17,0                   | 25,0 – 20,0                                            | 20,0 – 17,0                                        | 32,0                       | 36x39,5                         | 25                                                                                    |
| M40x1,5                                             | 15,0    | bg 840V4Aex          | 32,0 – 21,0                   | 32,0 – 26,0                                            | 26,0 – 21,0                                        | 35,0                       | 45x48                           | 10                                                                                    |
| M50x1,5                                             | 15,0    | bg 850V4Aex          | 42,0 – 32,0                   | 42,0 – 35,0                                            | 35,0 – 32,0                                        | 39,0                       | 57x60                           | 5                                                                                     |
| M63x1,5                                             | 15,0    | bg 863V4Aex          | 54,0 – 42,0                   | 54,0 – 46,0                                            | 46,0 – 42,0                                        | 40,0                       | 68x72                           | 5                                                                                     |

**i** Anzugsdrehmomente siehe Technischer Anhang, Seite 434  
For tightening torques, see Technical Appendix, page 434

**blueglobe TRI EMV-Kabelverschraubung Ex eb / Ex tb**

blueglobe TRI EMC cable gland Ex eb / Ex tb



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 15 bar**

Brass, nickel-plated  
Metric connection thread according to EN 60423  
With o-ring made of HNBR  
Type of protection IP 66, IP 68 up to 15 bar

**i** Es sind zwei Montagevarianten möglich (siehe Abbildung Variante A und B). Bei Variante B kann der max. Kabeldurchmesser durch den unteren Durchlass (G) eingeschränkt sein.  
Two installation methods are possible (see figure illustrating methods A and B). With method B, the maximum cable diameter may be restricted by the lower passage (G).

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | TPE                                               | Blau<br>Blue    | -20 °C / +60 °C                                              |

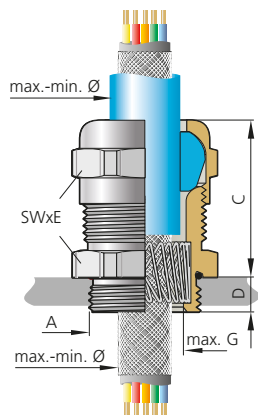


Abb. 3 – Variante A: abgesetzter Außenmantel  
Fig. 3 – Method A: offset outer sheath

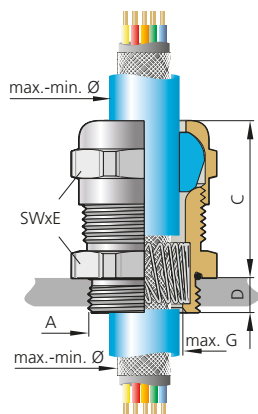


Abb. 4 – Variante B: durchgängiger Außenmantel  
Fig. 4 – Method B: continuous outer sheath

| Anschlussgewinde/<br>-länge<br>Connection thread/<br>length |      | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich<br>ohne Inlet<br>Sealing range<br>without inlet | Dichtbereich<br>mit Inlet<br>Sealing range<br>with inlet | Schirmbe-<br>reich<br>Screening<br>range | Durchlass<br>Passage | Bauhöhe<br>Mounting<br>height | Schlüs-<br>selweite<br>Spanner<br>width |                                                                                     |
|-------------------------------------------------------------|------|----------------------|-------------------------------|--------------------------------------------------------------|----------------------------------------------------------|------------------------------------------|----------------------|-------------------------------|-----------------------------------------|-------------------------------------------------------------------------------------|
| A                                                           | D    |                      | max./min. ø<br>mm             | max./min. ø<br>mm                                            | max./min. ø<br>mm                                        | max./min. ø<br>mm                        | max. G<br>mm         | C<br>mm                       | SW x E<br>mm                            |  |
| M12x1,5                                                     | 5,0  | bg 212ms triex       | 8,0 – 5,0                     | 8,0 – 5,0                                                    |                                                          | 5,0 – 3,0                                | 5,0                  | 21,0                          | 17x18,9                                 | 50                                                                                  |
| M16x1,5                                                     | 6,0  | bg 216ms triex       | 11,0 – 7,0                    | 11,0 – 7,0                                                   |                                                          | 9,0 – 5,0                                | 9,0                  | 25,0                          | 20x22,2                                 | 50                                                                                  |
| M20x1,5                                                     | 6,5  | bg 220ms triex       | 14,0 – 9,0                    | 14,0 – 9,0                                                   |                                                          | 12,0 – 7,0                               | 12,0                 | 29,5                          | 24x26,5                                 | 50                                                                                  |
| M25x1,5                                                     | 7,5  | bg 225ms triex       | 20,0 – 12,0                   | 20,0 – 16,0                                                  | 16,0 – 12,0                                              | 16,0 – 10,0                              | 16,0                 | 30,0                          | 30x33                                   | 25                                                                                  |
| M32x1,5                                                     | 8,0  | bg 232ms triex       | 25,0 – 17,0                   | 25,0 – 20,0                                                  | 20,0 – 17,0                                              | 20,0 – 13,0                              | 20,0                 | 32,0                          | 36x39,5                                 | 25                                                                                  |
| M40x1,5                                                     | 15,0 | bg 240ms triex       | 32,0 – 21,0                   | 32,0 – 26,0                                                  | 26,0 – 21,0                                              | 28,0 – 20,0                              | 28,0                 | 35,0                          | 45x48                                   | 10                                                                                  |
| M50x1,5                                                     | 15,0 | bg 250ms triex       | 42,0 – 32,0                   | 42,0 – 35,0                                                  | 35,0 – 32,0                                              | 37,0 – 28,0                              | 37,0                 | 39,0                          | 57x61                                   | 5                                                                                   |
| M63x1,5                                                     | 20,0 | bg 263ms triex       | 54,0 – 42,0                   | 54,0 – 46,0                                                  | 46,0 – 42,0                                              | 46,0 – 37,0                              | 46,0                 | 40,0                          | 68x72                                   | 5                                                                                   |
| M75x1,5                                                     | 20,0 | bg 275ms triex       | 65,0 – 55,0                   | 65,0 – 58,0                                                  | 58,0 – 55,0                                              | 58,0 – 46,0                              | 58,0                 | 47,0                          | 81x87                                   | 5                                                                                   |
| M85x2,0                                                     | 20,0 | bg 285ms triex       | 77,0 – 66,0                   | 77,0 – 70,0                                                  | 70,0 – 66,0                                              | 65,0 – 58,0                              | 65,0                 | 49,0                          | 95x102                                  | 1                                                                                   |

**i** M12 bis M20 werden ohne Inlet ausgeliefert. M25 bis M50: gekürztes Inlet.  
M12 up to M20 are supplied without an inlet; M25 to M50 have a shortened inlet.

**i** Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm und Ausführung in Edelstahl  
Available on request: connection thread length 15 mm and in stainless steel

**i** blueglobe TRI wird nur komplett geliefert. Montageanleitungen siehe Technischer Anhang.  
blueglobe TRI only available as a complete gland. For assembly instructions, see Technical Appendix.

**i** Die hier aufgeführten Artikel sind nur eine Auswahl aus unserem Gesamtprogramm. Weitere Ausführungen auf Anfrage.  
The products listed here are merely a selection of products from our complete range. Other versions on request.

**i** Für das Einführen des Kabels wird für den oberen Schirmbereich die Verwendung einer Montagehülse empfohlen, siehe Seite 209.  
We recommend using an assembly sleeve to feed the cable at the top of the screening range, see page 209.

**i** Anzugsdrehmomente siehe Technischer Anhang, Seite 434  
For tightening torques, see Technical Appendix, page 434

# blueglobe AC Kabelverschraubung Ex eb / Ex tb (für stahlarmierte Kabel)

blueglobe AC cable gland Ex eb / Ex tb (for armoured cables)



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 15 bar**

Brass, nickel-plated  
Metric connection thread according to EN 60423  
With o-ring made of HNBR  
Type of protection IP 66, IP 68 up to 15 bar

**i Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm und Ausführung in Edelstahl**  
Available on request: connection thread length 15 mm and in stainless steel

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | TPE                                               | Blau<br>Blue    | -20 °C / +60 °C                                              |

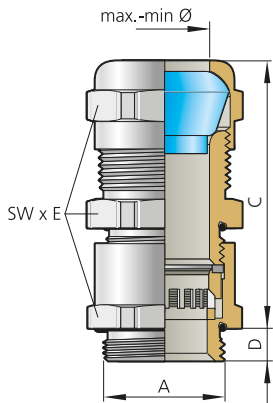


Abb. 3 – mit Inlet  
Fig. 3 – With inlet

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich ohne Inlet<br>Sealing range without inlet | Dichtbereich mit Inlet<br>Sealing range with inlet | Klemmbereich<br>Clamping range | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |    |
|-----------------------------------------------------|---------|----------------------|-------------------------------|--------------------------------------------------------|----------------------------------------------------|--------------------------------|----------------------------|---------------------------------|----|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                                      | max./min. ø<br>mm                                  | max./min. ø<br>mm              | C<br>mm                    | SW x E<br>mm                    |    |
| M20x1,5                                             | 6,5     | 220bg220msAC13ex     | 14,0 – 9,0                    | 14,0 – 9,0                                             |                                                    | 13,0 – 9,0                     | 51,0                       | 24x26,5                         | 25 |
|                                                     |         | 220bg225msAC15ex     | 20,0 – 12,0                   | 20,0 – 16,0                                            | 16,0 – 12,0                                        | 15,0 – 10,0                    | 51,0                       | 30x33                           | 25 |
| M25x1,5                                             | 7,5     | 225bg225msAC17ex     | 20,0 – 16,0                   | 20,0 – 16,0                                            |                                                    | 17,0 – 14,0                    | 52,0                       | 30x33                           | 25 |
|                                                     |         | 232bg232msAC23ex     | 25,0 – 20,0                   | 25,0 – 20,0                                            |                                                    | 23,0 – 19,0                    | 59,0                       | 36x39,5                         | 10 |
| M32x1,5                                             | 8,0     | 232bg240msAC27ex     | 32,0 – 21,0                   | 32,0 – 26,0                                            | 26,0 – 21,0                                        | 27,0 – 23,0                    | 62,0                       | 45x48                           | 10 |
|                                                     |         | 240bg240msAC31ex     | 32,0 – 26,0                   | 32,0 – 26,0                                            |                                                    | 31,0 – 28,0                    | 62,0                       | 45x48                           | 10 |
| M40x1,5                                             | 8,0     | 250bg250msAC36ex     | 42,0 – 32,0                   | 42,0 – 35,0                                            | 35,0 – 32,0                                        | 36,0 – 30,0                    | 65,0                       | 57x61                           | 10 |
|                                                     |         | 250bg250msAC40ex     | 42,0 – 35,0                   | 42,0 – 35,0                                            |                                                    | 40,0 – 34,0                    | 65,0                       | 57x61                           | 10 |
| M63x1,5                                             | 10,0    | 263bg263msAC46ex     | 54,0 – 42,0                   | 54,0 – 46,0                                            | 46,0 – 42,0                                        | 46,0 – 39,0                    | 67,0                       | 68x72                           | 5  |
|                                                     |         | 263bg263msAC51ex     | 54,0 – 46,0                   | 54,0 – 46,0                                            |                                                    | 51,0 – 45,0                    | 70,0                       | 68x72                           | 5  |
| M75x1,5                                             | 15,0    | 275bg275msAC61ex     | 65,0 – 55,0                   | 65,0 – 58,0                                            | 58,0 – 54,0                                        | 61,0 – 50,0                    | 86,0                       | 81x87                           | 5  |
| M85x2,0                                             | 15,0    | 285bg285msAC70ex     | 77,0 – 66,0                   | 77,0 – 70,0                                            | 70,0 – 65,0                                        | 70,0 – 60,0                    | 87,0                       | 95x102                          | 1  |
|                                                     |         | 285bg285msAC78ex     | 77,0 – 66,0                   | 77,0 – 70,0                                            | 70,0 – 65,0                                        | 74,0 – 70,0                    | 89,0                       | 95x102                          | 1  |

**i blueglobe AC wird nur komplett geliefert. Montageanleitung siehe Technischer Anhang.** blueglobe AC only available as a complete gland. For assembly instructions, see Technical Appendix

| Beschreibung                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | Description                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p><b>AC (Armoured Cable)-Kabelverschraubung zum Anschluss von stahlarmierten Kabeln und Leitungen</b></p> <p><b>Bauart:</b><br/>Die blueglobe AC ist eine Kabelverschraubung aus vernickeltem Messing mit der Kabelabdichtung der bewährten blueglobe. Sie gewährleistet die Schutzart IP 68, kombiniert mit der Schirmauflagemöglichkeit für „Armoured Cables“ nach britischem Standard. Die Kontaktierung der Kabelarmierung erfolgt durch einen Messingklemmring, der von außen gegen die Armierung drückt. Dadurch verkürzt sich die Montagezeit erheblich, da ein streng definiertes Ablängen und Aufspießen der Armierung sowie deren Einfädeln zwischen Erdungskonen entfällt. Die blueglobe AC gibt es mit metrischem Anschlussgewinde.</p> <p><b>Produktvorteile:</b></p> <ul style="list-style-type: none"> <li>- Leichte Montage</li> <li>- Kabelaußendurchmesser zwischen 9 mm und 77 mm</li> <li>- Hohe Schutzart</li> </ul> <p><b>Anwendungen:</b></p> <ul style="list-style-type: none"> <li>- Hochspannungskabel</li> <li>- Starkstromkabel</li> <li>- Frei verlegte Leitungen</li> </ul> | <p><b>AC (armoured cable) gland for connecting steel-armoured cables and leads</b></p> <p><b>Design:</b><br/>The blueglobe AC is a nickel-plated brass cable gland with the cable seal of the proven blueglobe. It guarantees the IP 68 type of protection, combined with the option of a shield connection for armoured cables to the British Standard. The cable armoring is contacted by means of a brass clamping ring which presses against the armoring from outside. This considerably reduces assembly time, as trimming to a precisely defined length, splaying the armoring and threading between earthing cones are no longer necessary. The blueglobe AC is available with metric connection threads.</p> <p><b>Advantages:</b></p> <ul style="list-style-type: none"> <li>- Easy assembly</li> <li>- For cable outside diameters between 9 mm and 77 mm</li> <li>- High type of protection</li> </ul> <p><b>Applications:</b></p> <ul style="list-style-type: none"> <li>- High-voltage cables</li> <li>- Power cables</li> <li>- Loose-lying cables</li> </ul> |

**i Anzugsdrehmomente siehe Technischer Anhang, Seite 434** For tightening torques, see Technical Appendix, page 434

## Ex-Zulassung: Typ blueglobe HT

Ex approval: Type blueglobe HT



Abb. 1  
Fig. 1

### Werkstoff

|                |           |                |
|----------------|-----------|----------------|
| Verschraubung: | Messing   | vernickelt     |
| Dichteinsatz:  | Edelstahl | 1.4305         |
| O-Ring:        | Silikon   | Farbe: Schwarz |
|                |           | Farbe: Rot     |

### Explosionsschutz

|                                                                   |                                                                                                                  |                                                                                                     |
|-------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                                                     | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68 bis 15 bar |
| Gerätegruppe/Kategorie:                                           | II 2 G/ II 2D                                                                                                    |                                                                                                     |
| Einsetzbar in:                                                    | Zone 1, Zone 2, Zone 21 und 22<br>(leitender Staub)                                                              |                                                                                                     |
| Normen:                                                           | EN IEC 60079-0:2018<br>EN IEC 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                         |                                                                                                     |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 11 ATEX 1007 X xx CE 0637<br>xx = Größe Anschlussgewinde                                                     |                                                                                                     |
| Kennzeichnung Gas:                                                | II 2G Ex eb IIC Gb                                                                                               |                                                                                                     |
| Kennzeichnung Staub:                                              | II 2D Ex tb IIIC Db                                                                                              |                                                                                                     |
| Kennzeichnung<br>kleiner Ex-Geräte:*                              | II 2G/II 2D CE 0637                                                                                              |                                                                                                     |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 11.0019X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000362<br>UKCA – CML 22UKEX3131X |                                                                                                     |

\* Kennzeichnung auf Kabelverschraubung bis Größe M16.

Die **Kabelverschraubung blueglobe HT Ex eb / Ex tb** steht für unterschiedliche Anwendungsfälle in verschiedenen Ausführungen als Komplettverschraubung zur Verfügung.

### Betriebstemperaturbereich:

Dichtelemente: Silikon –55 °C bis +160 °C  
in Verbindung mit Bolzen BOBg... –55 °C bis + 90 °C

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

M-Gewinde Standard, EN 60423

M-Gewinde lang, 15 mm, EN 60423

### Besondere Bedingungen:

Es dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten.

### Varianten:

- blueglobe HT Ex eb / Ex tb
- blueglobe TRI HT EMV-Kabelverschraubung Ex eb / Ex tb
- blueglobe HT AC Kabelverschraubung Ex eb / Ex tb (für stahlarmierte Kabel)

### Variants:

- blueglobe HT Ex eb / Ex tb
- blueglobe TRI HT EMC cable gland Ex eb / Ex tb
- blueglobe HT AC cable gland Ex eb / Ex tb (for steel-armoured cables)

### Material

|                 |                 |               |
|-----------------|-----------------|---------------|
| Gland:          | Brass           | Nickel-plated |
|                 | Stainless steel | AISI 303      |
| Sealing insert: | Silicone        | Colour: black |
| O-ring          | Silicone        | Colour: red   |

### Explosion protection

|                                                    |                                                                                                                  |                                                                                                                   |
|----------------------------------------------------|------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                                                      | Increased safety – „e“<br>Protection by enclosure – „t“<br>Type of protection EN 60529: IP 66, IP 68 up to 15 bar |
| Equipment group/category:                          | II 2 G/ II 2D                                                                                                    |                                                                                                                   |
| For use in:                                        | Zone 1, zone 2, zones 21 and 22<br>(conductive dust)                                                             |                                                                                                                   |
| Standards:                                         | EN IEC 60079-0:2018<br>EN IEC 60079-7:2015 + A1:2018<br>EN 60079-31:2014                                         |                                                                                                                   |
| Marking, certificate number<br>and test centre ID: | PTB 11 ATEX 1007X xx CE 0637<br>xx = size of connection thread                                                   |                                                                                                                   |
| Gas marking:                                       | II 2G Ex eb IIC Gb                                                                                               |                                                                                                                   |
| Dust marking:                                      | II 2D Ex tb IIIC Db                                                                                              |                                                                                                                   |
| Marking on small<br>explosion-proof devices:*      | II 2G/II 2D CE 0637                                                                                              |                                                                                                                   |
| Other certificates:                                | IECEx – IECEx PTB 11.0019X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000362<br>UKCA – CML 22UKEX3131X |                                                                                                                   |

\* Marking on cable gland up to size M16.

The **blueglobe HT Ex eb / Ex tb cable gland** is available as an all-in-one gland in different versions for different applications.

### Operating temperature range:

Sealing elements: silicone –55 °C up to +160 °C  
In conjunction with bolts BOBg... –55 °C up to + 90 °C

The Ex cable gland **can be purchased with different connection thread types and lengths:**

M thread standard, EN 60423

M thread long, 15 mm, EN 60423

### Special conditions:

Only fixed cables may be inserted. The operator must ensure appropriate strain relief.

**blueglobe HT Ex eb / Ex tb**

RoHS       



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 15 bar**

*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 up to 15 bar*

**i** Bei den zweiteiligen HT-Dichteinsätzen M32 bis M40 ist vor dem Anziehen der Druckschraube das Inlet exakt zu positionieren.  
*The two-piece HT sealing insert (M32 up to M40) must be positioned exactly before tightening the pressure screw.*

| Werkstoff Verschraubungskörper<br><i>Material gland body</i> | Ausführung/Farbe<br><i>Version/colour</i> | Werkstoff Dichteinsatz<br><i>Material sealing insert</i> | Farbe<br><i>Colour</i> | Temperaturbereich min./max.<br><i>Temperature range (min./max.)</i> |
|--------------------------------------------------------------|-------------------------------------------|----------------------------------------------------------|------------------------|---------------------------------------------------------------------|
| Messing<br>Brass                                             | Vernickelt<br>Nickel-plated               | Silikon HT<br>Silicone HT                                | Schwarz<br>Black       | -55 °C / +160 °C                                                    |

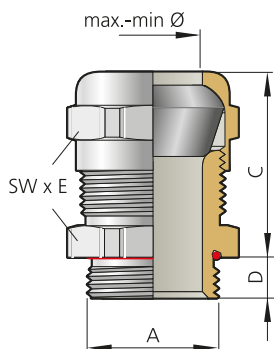


Abb. 3 - ohne Inlet  
Fig. 3 - Without inlet

| Anschlussgewinde/-länge<br><i>Connection thread/length</i> |         | Art.-Nr.<br><i>Art. no.</i> | Dichtbereich<br><i>Sealing range</i> | Dichtbereich ohne Inlet<br><i>Sealing range without inlet</i> | Dichtbereich mit Inlet<br><i>Sealing range with inlet</i> | Bauhöhe<br><i>Mounting height</i> | Schlüsselweite<br><i>Spanner width</i> |                                                                                     |
|------------------------------------------------------------|---------|-----------------------------|--------------------------------------|---------------------------------------------------------------|-----------------------------------------------------------|-----------------------------------|----------------------------------------|-------------------------------------------------------------------------------------|
| A                                                          | D<br>mm |                             | max./min. ø<br>mm                    | max./min. ø<br>mm                                             | max./min. ø<br>mm                                         | C<br>mm                           | SW x E<br>mm                           |  |
| M12x1,5                                                    | 5,0     | bg 212ms 5HTex              | 5,0 – 4,0                            | 5,0 – 4,0                                                     |                                                           | 21,0                              | 17x18,9                                | 50                                                                                  |
|                                                            |         | bg 212ms 8HTex              | 8,0 – 5,0                            | 8,0 – 5,0                                                     |                                                           | 21,0                              | 17x18,9                                | 50                                                                                  |
| M16x1,5                                                    | 6,0     | bg 216msHTex                | 11,0 – 4,0                           | 11,0 – 7,0                                                    | 7,0 – 4,0                                                 | 25,0                              | 20x22,2                                | 50                                                                                  |
| M20x1,5                                                    | 6,5     | bg 220msHTex                | 14,0 – 5,0                           | 14,0 – 9,0                                                    | 9,0 – 5,0                                                 | 29,5                              | 24x26,5                                | 50                                                                                  |
| M25x1,5                                                    | 7,5     | bg 225msHTex                | 20,0 – 11,0                          | 20,0 – 16,0                                                   | 16,0 – 11,0                                               | 30,0                              | 30x33                                  | 50                                                                                  |
| M32x1,5                                                    | 8,0     | bg 232msHTex                | 25,0 – 15,0                          | 25,0 – 20,0                                                   | 20,0 – 15,0                                               | 32,0                              | 36x39,5                                | 25                                                                                  |
| M40x1,5                                                    | 8,0     | bg 240msHTex                | 32,0 – 21,0                          | 32,0 – 26,0                                                   | 26,0 – 21,0                                               | 35,0                              | 45x48                                  | 10                                                                                  |

| Anschlussgewinde/-länge<br><i>Connection thread/length</i> |         | Art.-Nr.<br><i>Art. no.</i> | Dichtbereich<br><i>Sealing range</i> | Dichtbereich ohne Inlet<br><i>Sealing range without inlet</i> | Dichtbereich mit Inlet<br><i>Sealing range with inlet</i> | Bauhöhe<br><i>Mounting height</i> | Schlüsselweite<br><i>Spanner width</i> |                                                                                       |
|------------------------------------------------------------|---------|-----------------------------|--------------------------------------|---------------------------------------------------------------|-----------------------------------------------------------|-----------------------------------|----------------------------------------|---------------------------------------------------------------------------------------|
| A                                                          | D<br>mm |                             | max./min. ø<br>mm                    | max./min. ø<br>mm                                             | max./min. ø<br>mm                                         | C<br>mm                           | SW x E<br>mm                           |  |
| M16x1,5                                                    | 15,0    | bg 816msHTex                | 11,0 – 4,0                           | 11,0 – 7,0                                                    | 7,0 – 4,0                                                 | 25,0                              | 20x22,2                                | 50                                                                                    |
| M20x1,5                                                    | 15,0    | bg 820msHTex                | 14,0 – 5,0                           | 14,0 – 9,0                                                    | 9,0 – 5,0                                                 | 29,5                              | 24x26,5                                | 50                                                                                    |
| M25x1,5                                                    | 15,0    | bg 825msHTex                | 20,0 – 11,0                          | 20,0 – 16,0                                                   | 16,0 – 11,0                                               | 30,0                              | 30x33                                  | 50                                                                                    |
| M32x1,5                                                    | 15,0    | bg 832msHTex                | 25,0 – 15,0                          | 25,0 – 20,0                                                   | 20,0 – 15,0                                               | 32,0                              | 36x39,5                                | 25                                                                                    |
| M40x1,5                                                    | 15,0    | bg 840msHTex                | 32,0 – 20,0                          | 32,0 – 26,0                                                   | 26,0 – 20,0                                               | 35,0                              | 45x48                                  | 10                                                                                    |

**i** Ausführung in Edelstahl und Messing bleifrei auf Anfrage  
*Versions in stainless steel and lead-free brass available on request*

**i** Anzugsdrehmomente siehe Technischer Anhang, Seite 434  
*For tightening torques, see Technical Appendix, page 434*

# blueglobe TRI HT EMV-Kabelverschraubung Ex eb / Ex tb

blueglobe TRI HT EMC cable gland Ex eb / Ex tb



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 15 bar**

Brass, nickel-plated  
Metric connection thread according to EN 60423  
With o-ring made of silicone  
Type of protection IP 66, IP 68 up to 15 bar

**i** Es sind zwei Montagevarianten möglich (siehe Abbildung Variante A und B). Bei Variante B kann der max. Kabeldurchmesser durch den unteren Durchlass (G) eingeschränkt sein.  
Two installation methods are possible (see figure illustrating methods A and B). With method B, the maximum cable diameter may be restricted by the lower passage (G).

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour  | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -55 °C / +160 °C                                             |

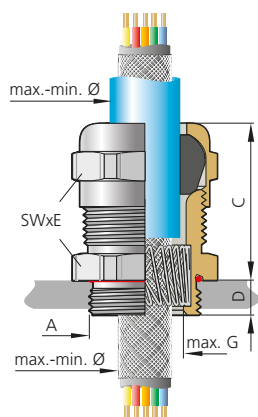


Abb. 3 – Variante A: abgesetzter Außenmantel  
Fig. 3 – Method A: offset outer sheath

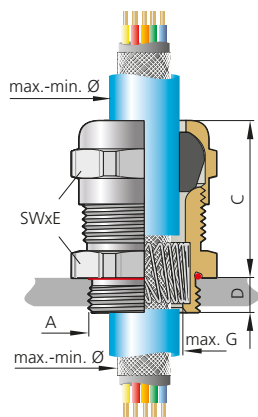


Abb. 4 – Variante B: durchgängiger Außenmantel  
Fig. 4 – Method B: continuous outer sheath

| Anschlussgewinde/<br>-länge<br>Connection thread/<br>length | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich<br>ohne Inlet<br>Sealing range<br>without inlet | Dichtbereich<br>mit Inlet<br>Sealing range<br>with inlet | Schirmbe-<br>reich<br>Screening<br>range | Durchlass<br>Passage | Bauhöhe<br>Mounting<br>height | Schlüs-<br>selweite<br>Spanner<br>width |    |
|-------------------------------------------------------------|----------------------|-------------------------------|--------------------------------------------------------------|----------------------------------------------------------|------------------------------------------|----------------------|-------------------------------|-----------------------------------------|----|
|                                                             |                      |                               |                                                              |                                                          |                                          |                      |                               |                                         |    |
| A                                                           | D<br>mm              | max./min. ø<br>mm             | max./min. ø<br>mm                                            | max./min. ø<br>mm                                        | max./min. ø<br>mm                        | max. G<br>mm         | C<br>mm                       | SW x E<br>mm                            |    |
| M12x1,5                                                     | 5,0                  | bg 212ms tri HTex             | 8,0 – 5,0                                                    | 8,0 – 5,0                                                | 5,0 – 3,0                                | 5,0                  | 21,0                          | 17x18,9                                 | 50 |
| M16x1,5                                                     | 6,0                  | bg 216ms tri HTex             | 11,0 – 7,0                                                   | 11,0 – 7,0                                               | 9,0 – 5,0                                | 9,0                  | 25,0                          | 20x22,2                                 | 50 |
| M20x1,5                                                     | 6,5                  | bg 220ms tri HTex             | 14,0 – 9,0                                                   | 14,0 – 9,0                                               | 12,0 – 7,0                               | 12,0                 | 29,5                          | 24x26,5                                 | 50 |
| M25x1,5                                                     | 7,5                  | bg 225ms tri HTex             | 20,0 – 11,0                                                  | 20,0 – 16,0                                              | 16,0 – 10,0                              | 16,0                 | 30,0                          | 30x33                                   | 25 |
| M32x1,5                                                     | 8,0                  | bg 232ms tri HTex             | 25,0 – 15,0                                                  | 25,0 – 20,0                                              | 20,0 – 15,0                              | 20,0                 | 32,0                          | 36x39,5                                 | 25 |
| M40x1,5                                                     | 15,0                 | bg 240ms tri HTex             | 32,0 – 21,0                                                  | 32,0 – 26,0                                              | 26,0 – 21,0                              | 28,0                 | 35,0                          | 45x48                                   | 10 |

**i** M12 bis M20 werden ohne Inlet und M25 wird mit angespritztem Inlet ausgeliefert. M32 bis M40 haben ein loses Inlet.  
M12 up to M20 are supplied without an inlet, M25 with an injection-moulded inlet and M32 to M63 with a separate inlet.

**i** Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm und Ausführung in Edelstahl  
Available on request: connection thread length 15 mm and in stainless steel

**i** blueglobe TRI wird nur komplett geliefert. Montageanleitungen siehe Technischer Anhang.  
blueglobe TRI only available as a complete gland. For assembly instructions, see Technical Appendix.

**i** Bei den zweiteiligen HT-Dichteinsätzen M32 bis M40 ist vor dem Anziehen der Druckschraube das Inlet exakt zu positionieren.  
The two-piece HT sealing insert (M32 up to M40) must be positioned exactly before tightening the pressure screw.

**i** Für das Einführen des Kabels wird für den oberen Schirmbereich die Verwendung einer Montagehülse empfohlen, siehe Seite 209.  
We recommend using an assembly sleeve to feed the cable at the top of the screening range, see page 209.

**i** Anzugsdrehmomente siehe Technischer Anhang, Seite 434  
For tightening torques, see Technical Appendix, page 434

# blueglobe HT AC Kabelverschraubung Ex eb / Ex tb (für stahlarmierte Kabel)

blueglobe HT AC cable gland Ex eb / Ex tb (for steel-armoured cables)



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 15 bar**

Brass, nickel-plated  
Metric connection thread according to EN 60423  
With o-ring made of silicone  
Type of protection IP 66, IP 68 up to 15 bar

**i Auf Anfrage erhältlich: Anschlussgewindelänge 15 mm und Ausführung in Edelstahl**  
Available on request: connection thread length 15 mm and in stainless steel

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour  | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -55 °C / +160 °C                                             |

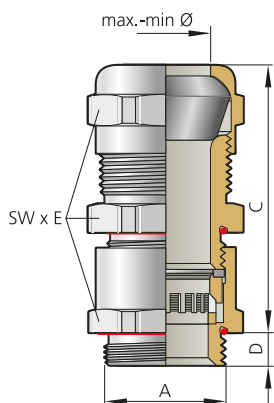


Abb. 3 – ohne Inlet  
Fig. 3 – Without inlet

| Anschlussgewinde/<br>-länge<br>Connection thread/length | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Dichtbereich<br>ohne Inlet<br>Sealing range<br>without inlet | Dichtbereich<br>mit Inlet<br>Sealing range<br>with inlet | Klemmbereich<br>Clamping range | Bauhöhe<br>Mounting<br>height | Schlüssel-<br>weite<br>Spanner<br>width |
|---------------------------------------------------------|----------------------|-------------------------------|--------------------------------------------------------------|----------------------------------------------------------|--------------------------------|-------------------------------|-----------------------------------------|
| A                                                       | D<br>mm              | max./min. Ø<br>mm             | max./min. Ø<br>mm                                            | max./min. Ø<br>mm                                        | max./min. Ø<br>mm              | C<br>mm                       | SW x E<br>mm                            |
| M20x1,5                                                 | 6,5                  | 220bg220msHTAC13ex            | 14,0 – 9,0                                                   | 14,0 – 9,0                                               | 13,0 – 9,0                     | 51,0                          | 24x26,5                                 |
|                                                         |                      | 220bg225msHTAC15ex            | 20,0 – 11,0                                                  | 20,0 – 16,0                                              | 16,0 – 11,0                    | 51,0                          | 30x33                                   |
| M25x1,5                                                 | 7,5                  | 225bg225msHTAC17ex            | 20,0 – 16,0                                                  | 20,0 – 16,0                                              | 17,0 – 14,0                    | 52,0                          | 30x33                                   |
| M32x1,5                                                 | 8,0                  | 232bg232msHTAC23ex            | 25,0 – 20,0                                                  | 25,0 – 20,0                                              | 23,0 – 19,0                    | 59,0                          | 36x39,5                                 |
|                                                         |                      | 232bg240msHTAC27ex            | 32,0 – 20,0                                                  | 32,0 – 26,0                                              | 26,0 – 20,0                    | 62,0                          | 45x48                                   |
| M40x1,5                                                 | 8,0                  | 240bg240msHTAC31ex            | 32,0 – 26,0                                                  | 32,0 – 26,0                                              | 31,0 – 28,0                    | 62,0                          | 45x48                                   |

**i blueglobe AC wird nur komplett geliefert. Montageanleitung siehe Technischer Anhang.**  
blueglobe AC only available as a complete gland. For assembly instructions, see Technical Appendix

**i Bei den zweiteiligen HT-Dichteinsätzen M32 bis M40 ist vor dem Anziehen der Druckschraube das Inlet exakt zu positionieren.**  
The two-piece HT sealing insert (M32 up to M40) must be positioned exactly before tightening the pressure screw.

| Beschreibung                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | Description                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p><b>Bauart:</b><br/>Die blueglobe HT AC ist eine Kabelverschraubung aus vernickeltem Messing mit der Kabelabdichtung der bewährten blueglobe. Sie gewährleistet die Schutzart IP 68, kombiniert mit der Schirmauflage-möglichkeit für „Armoured Cables“ nach britischem Standard. Die Kontaktierung der Kabelarmierung erfolgt durch einen Messing-klemmring, der von außen gegen die Armierung drückt. Dadurch verkürzt sich die Montagezeit erheblich, da ein streng definiertes Ablängen und Aufspießen der Armierung sowie deren Einfädeln zwischen Erdungskonen entfällt. Die blueglobe HT AC gibt es mit metrischem Anschlussgewinde.</p> <p><b>Produktvorteile:</b></p> <ul style="list-style-type: none"> <li>- Leichte Montage</li> <li>- Kabelaußendurchmesser zwischen 9 mm und 32 mm</li> <li>- Hohe Schutzart</li> </ul> <p><b>Anwendungen:</b></p> <ul style="list-style-type: none"> <li>- Hochspannungskabel</li> <li>- Starkstromkabel</li> <li>- Frei verlegte Leitungen</li> </ul> | <p>AC (armoured cable) gland for connecting steel-armoured cables</p> <p><b>Design:</b><br/>The blueglobe HT AC is a nickel-plated brass cable gland with the cable seal of the proven blueglobe. It guarantees the IP 68 type of protection, combined with the option of connecting a shield for armoured cables to the British Standard. The cable armoring is contacted by means of a brass clamping ring which presses against the armoring from outside. This considerably reduces assembly time, as trimming to a precisely defined length, splicing the armoring and threading between earthing cones are no longer necessary. The blueglobe HT AC is available with metric connection threads.</p> <p><b>Advantages:</b></p> <ul style="list-style-type: none"> <li>- Easy assembly</li> <li>- For cable outside diameters between 9 mm and 32 mm</li> <li>- High type of protection</li> </ul> <p><b>Applications:</b></p> <ul style="list-style-type: none"> <li>- High-voltage cables</li> <li>- Power cables</li> <li>- Loose-lying cables</li> </ul> |

**i Anzugsdrehmomente siehe Technischer Anhang, Seite 434**  
For tightening torques, see Technical Appendix, page 434

## Ex-Zulassung: Typ UNI Ex Dicht

Ex approval: Type UNI Ex Dicht



Abb. 1  
Fig. 1

### Werkstoff

|                                                   |                             |                                                                                    |
|---------------------------------------------------|-----------------------------|------------------------------------------------------------------------------------|
| Verschraubung:                                    | Messing<br>Edelstahl<br>TPE | Blank, vernickelt<br>VA 1.4305 (VA 1.4571 auf Anfrage)<br>Farbe: UNI Farbcode (FC) |
| Dichteinsatz:<br>Anschlussge-<br>winde Dichtring: | HNBR<br>Silikon             | Farbe: Schwarz<br>Farbe: Rot                                                       |

### Explosionsschutz

|                                                                   |                                                                                        |                                                                                                                    |
|-------------------------------------------------------------------|----------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                           | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68 bis 5 bar<br>II 2 G/II 2D |
| Gerätegruppe/Kategorie:<br>Einsetzbar in:                         |                                                                                        | Zone 1, Zone 2, Zone 21 und 22<br>(leitender Staub)                                                                |
| Normen:                                                           |                                                                                        | EN IEC 60079-0:2018,<br>EN IEC 60079-7:2015, EN 60079-31:2014                                                      |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 14 ATEX 1011X xx <b>CE</b> 0637<br>xx = Größe Anschlussgewinde                     |                                                                                                                    |
| Kennzeichnung Gas:                                                | II 2G Ex eb IIC Gb                                                                     |                                                                                                                    |
| Kennzeichnung Staub:                                              | II 2D Ex tb IIIC Db                                                                    |                                                                                                                    |
| Kennzeichnung<br>extrem kleiner Bauteile:*                        | II 2G/II 2D <b>CE</b> 0637                                                             |                                                                                                                    |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 14.0021X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000359 |                                                                                                                    |

\* Kennzeichnung auf Kabelverschraubung bis Größe M16.

Die **Kabelverschraubung UNI Ex Dicht** steht für unterschiedliche Anwendungsfälle in verschiedenen Ausführungen zur Verfügung:

- Standard
- Mehrfach
- Abgeschirmte Leitungen mit Federkontaktierung
- Abgeschirmte Leitungen mit Konuskontaktierung

### Betriebstemperaturbereich:

TPE –20 °C bis +60 °C

Eine Verschraubung ist komplett in den Varianten mit Einfach-, Mehrfach- und geschlossenem Dichteinsatz lieferbar.

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

- M-Gewinde Standard, EN 60423
- M-Gewinde lang, 15 mm, EN 60423
- Pg-Gewinde Standard
- Pg-Gewinde lang, 15 mm
- NPT-Gewinde auf Anfrage

### Besondere Bedingungen:

Es dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten. Die Schutzart IP 66/IP 68 wird nur bei sachgerechtem Einbau von Dichtung und Kabel- und Leitungseinführungen erreicht. Die Hinweise des Herstellers sind zu beachten. Die Typen mit niedriger Stoßenergie sind so in das Gehäuse einzubauen, dass sie vor Stoßenergie mechanisch geschützt sind.

### Varianten:

- **UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb**
- **UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb (Mehrfach-Dichteinsatz)**
- **UNI Ex Dicht EMV-Kabelverschraubung Ex eb / Ex tb**
- **UNI Ex Dicht SVD-Schutzschlauch Kabelverschraubung Ex eb / Ex tb**

### Variants:

- **UNI Ex Dicht cable gland Ex eb / Ex tb**
- **UNI Ex Dicht cable gland Ex eb / Ex tb (multiple sealing insert)**
- **UNI Ex Dicht EMV cable gland Ex eb / Ex tb**
- **UNI Ex Dicht SVD hose cable gland Ex eb / Ex tb**

### Material

|                                    |                          |                                                          |
|------------------------------------|--------------------------|----------------------------------------------------------|
| Gland:                             | Brass<br>Stainless steel | Blank, nickel-plated<br>AISI 303 (AISI 316Ti on request) |
| Sealing insert:                    | TPE                      | Colour: UNI colour code (CC)                             |
| Connection<br>thread sealing ring: | HNBR<br>Silicone         | Colour: black<br>Colour: red                             |

### Explosion protection

|                                                    |                                                                                        |                                                                                                                                     |
|----------------------------------------------------|----------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                            | Increased safety – “e”<br>Protection by enclosure – “t”<br>Type of protection EN 60529: IP 66,<br>IP 68 up to 5 bar<br>II 2 G/II 2D |
| Equipment group/category:<br>For use in:           |                                                                                        | zone 1, zone 2, zones 21 and 22<br>(conductive dust)                                                                                |
| Standards:                                         |                                                                                        | EN IEC 60079-0:2018,<br>EN IEC 60079-7:2015, EN 60079-31:2014                                                                       |
| Marking, certificate number<br>and test centre ID: | PTB 14 ATEX 1011X xx <b>CE</b> 0637<br>xx = size of connection thread                  |                                                                                                                                     |
| Gas marking:                                       | II 2G Ex eb IIC Gb                                                                     |                                                                                                                                     |
| Dust marking:                                      | II 2D Ex tb IIIC Db                                                                    |                                                                                                                                     |
| Marking on<br>extremely small components:*         | II 2G/II 2D <b>CE</b> 0637                                                             |                                                                                                                                     |
| Other certificates:                                | IECEx – IECEx PTB 14.0021X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000359 |                                                                                                                                     |

\* Marking on cable gland up to size M16.

The **UNI Ex Dicht** cable gland is available in different versions for different applications:

- Standard
- Multiple
- Shielded cables with spring contact
- Shielded cables with cone contact.

### Operating temperature range:

TPE –20 °C to +60 °C

Complete glands are available in variants with simple, multiple and closed sealing inserts.

The Ex cable gland can be purchased with **different connection thread types and lengths:**

- M thread standard, EN 60423
- M thread long, 15 mm, EN 60423
- Pg thread standard
- Pg thread long, 15 mm
- NPT thread on request

### Special conditions:

Only fixed cables may be inserted. The operator must ensure appropriate strain relief. IP 66/IP 68 protection is only attained if the seal and the cable glands are properly assembled. The manufacturer's instructions should be observed. Types with low impact energy should be mounted in such a way that they are mechanically protected against the kinetic energy of impact.

# UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb

UNI Ex Dicht cable gland Ex eb / Ex tb

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**

Brass, nickel-plated  
Metric connection thread according to EN 60423  
With o-ring made of HNBR  
Type of protection IP 66, IP 68 up to 10 bar

**Gewinde-Varianten:** **Standard-Maß D** **= Art.-Nr. 22052...**  
**Thread variants:** **15 mm Länge** **= Art.-Nr. 82052...**  
**Standard size D** **= Art. no. 22052...**  
**15 mm length** **= Art. no. 82052...**

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | d                                       | TPE                                               | s. FC<br>See CC | -20 °C / +60 °C                                              |

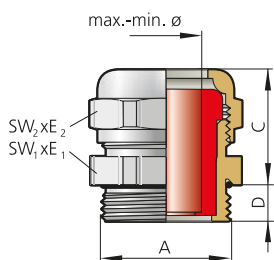


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |      | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |    |
|-----------------------------------------------------|------|----------------------|-------------------------------|----------------------------|---------------------------------|----|
| A                                                   | D    |                      | max./min. ø                   | C                          | SW x E                          |    |
|                                                     | mm   |                      | mm                            | mm                         | mm                              |    |
| M12x1,5                                             | 5,0  | 21249d7ex-12         | 6,5 – 5,0                     | 20,0                       | 14x15,5                         | 50 |
| M16x1,5                                             | 6,0  | 21650d7ex-12         | 6,5 – 5,0                     | 20,0                       | 18x20/17x18,9                   | 50 |
|                                                     |      | 21650d8ex-12         | 8,0 – 6,0                     | 20,0                       | 18x20/17x18,9                   | 50 |
|                                                     |      | 21650d9ex-12         | 9,5 – 7,5                     | 20,0                       | 18x20/17x18,9                   | 50 |
| M20x1,5                                             | 6,5  | 22052d7ex-12         | 6,5 – 5,0                     | 20,0                       | 22x24,4                         | 50 |
|                                                     |      | 22052d8ex-12         | 8,0 – 6,0                     | 20,0                       | 22x24,4                         | 50 |
|                                                     |      | 22052d9ex-12         | 9,5 – 7,5                     | 20,0                       | 22x24,4                         | 50 |
|                                                     |      | 22052d11ex-12        | 10,5 – 8,0                    | 20,0                       | 22x24,4                         | 50 |
|                                                     |      | 22052d13ex-12        | 13,0 – 10,0                   | 20,0                       | 22x24,4                         | 50 |
| M25x1,5                                             | 7,5  | 22553d7ex-12         | 6,5 – 5,0                     | 21,0                       | 28x31,2/24x26,7                 | 50 |
|                                                     |      | 22553d8ex-12         | 8,0 – 6,0                     | 21,0                       | 28x31,2/24x26,7                 | 50 |
|                                                     |      | 22553d9ex-12         | 9,5 – 7,5                     | 21,0                       | 28x31,2/24x26,7                 | 50 |
|                                                     |      | 22553d11ex-12        | 10,5 – 8,0                    | 21,0                       | 28x31,2/24x26,7                 | 50 |
|                                                     |      | 22553d13ex-12        | 13,0 – 10,0                   | 21,0                       | 28x31,2/24x26,7                 | 50 |
|                                                     |      | 22553d16ex-12        | 15,5 – 12,5                   | 21,0                       | 28x31,2/24x26,7                 | 50 |
| M32x1,5                                             | 8,0  | 23254d11ex-12        | 10,5 – 8,0                    | 26,0                       | 35x38,5/30x33,5                 | 25 |
|                                                     |      | 23254d13ex-12        | 13,0 – 10,0                   | 26,0                       | 35x38,5/30x33,5                 | 25 |
|                                                     |      | 23254d16ex-12        | 15,5 – 12,5                   | 26,0                       | 35x38,5/30x33,5                 | 25 |
|                                                     |      | 23254d18ex-12        | 18,0 – 15,0                   | 26,0                       | 35x38,5/30x33,5                 | 25 |
|                                                     |      | 23254d20ex-12        | 20,5 – 18,0                   | 26,0                       | 35x38,5/30x33,5                 | 25 |
| M40x1,5                                             | 8,0  | 24055d16ex-12        | 15,5 – 12,5                   | 29,0                       | 43x47,3/40x43,5                 | 10 |
|                                                     |      | 24055d18ex-12        | 18,0 – 15,0                   | 29,0                       | 43x47,3/40x43,5                 | 10 |
|                                                     |      | 24055d20ex-12        | 20,5 – 18,0                   | 29,0                       | 43x47,3/40x43,5                 | 10 |
|                                                     |      | 24055d25ex-12        | 25,0 – 21,0                   | 29,0                       | 43x47,3/40x43,5                 | 10 |
|                                                     |      | 24055d28ex-12        | 28,0 – 25,0                   | 29,0                       | 43x47,3/40x43,5                 | 10 |
| M50x1,5                                             | 10,0 | 25056d32ex-12        | 32,0 – 28,0                   | 30,0                       | 54x58/50x54                     | 5  |
|                                                     |      | 25056d34ex-12        | 34,0 – 30,0                   | 30,0                       | 54x58/50x54                     | 5  |
|                                                     |      | 25056d36ex-12        | 36,0 – 33,0                   | 30,0                       | 54x58/50x54                     | 5  |
|                                                     |      | 25057d40ex-12        | 40,0 – 37,0                   | 32,0                       | 57x61                           | 5  |
| M63x1,5                                             | 10,0 | 26358d44ex-12        | 44,0 – 40,0                   | 30,0                       | 68x74/64x69                     | 5  |
| M72x2,0                                             | 16,0 | 27275d51ex-12        | 51,0 – 46,0                   | 58,0                       | 81x87                           | 1  |
| M75x1,5                                             | 15,0 | 275212d47ex-12       | 47,0 – 43,0                   | 46,0                       | 81x87                           | 1  |
|                                                     |      | 275212d52ex-12       | 52,0 – 46,0                   | 47,0                       | 81x87                           | 1  |
| M80x2,0                                             | 15,0 | 280300d57ex-12       | 57,0 – 51,0                   | 61,0                       | 95x102                          | 1  |
|                                                     |      | 280300d70ex-12       | 70,0 – 64,0                   | 61,0                       | 95x102                          | 1  |

**Weitere Ausführungen auf Anfrage**  
Other versions available on request

**UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb**

UNI Ex Dicht cable gland Ex eb / Ex tb

RoHS      



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl 1.4305**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 bis 10 bar**

*Stainless steel AISI 303*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 up to 10 bar*

**i Gewinde-Varianten:** **Standard-Maß D** **= Art.-Nr. 22052...**  
**Thread variants:** **15 mm Länge** **= Art.-Nr. 82052...**  
**Standard size D** **= Art. no. 22052...**  
**15 mm length** **= Art. no. 82052...**

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| VA 1.4305<br>AISI 303                                 | Blank                              | st                                      | TPE                                               | s. FC<br>See CC | -20 °C / +60 °C                                              |

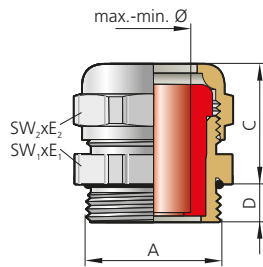


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length<br>A |      | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range<br>max./min. ø<br>mm | Bauhöhe<br>Mounting height<br>C<br>mm | Schlüsselweite<br>Spanner width<br>SW x E<br>mm |                                                                                     |
|----------------------------------------------------------|------|----------------------|----------------------------------------------------|---------------------------------------|-------------------------------------------------|-------------------------------------------------------------------------------------|
| D<br>mm                                                  |      |                      |                                                    |                                       |                                                 |  |
| M12x1,5                                                  | 5,0  | 21249st7ex-12        | 6,5– 5,0                                           | 20,0                                  | 14x15,5                                         | 50                                                                                  |
| M16x1,5                                                  | 6,0  | 21650st7ex-12        | 6,5– 5,0                                           | 20,0                                  | 19x21/17x18,9                                   | 50                                                                                  |
|                                                          |      | 21650st8ex-12        | 8,0– 6,0                                           | 20,0                                  | 19x21/17x18,9                                   | 50                                                                                  |
|                                                          |      | 21650st9ex-12        | 9,5– 7,5                                           | 20,0                                  | 19x21/17x18,9                                   | 50                                                                                  |
| M20x1,5                                                  | 6,0  | 22051st7ex-12        | 6,5– 5,0                                           | 20,0                                  | 22x24,4/20x22,2                                 | 50                                                                                  |
|                                                          |      | 22051st8ex-12        | 8,0– 6,0                                           | 20,0                                  | 22x24,4/20x22,2                                 | 50                                                                                  |
| M20x1,5                                                  | 6,5  | 22052st7ex-12        | 6,5– 5,0                                           | 20,0                                  | 22x24,4                                         | 50                                                                                  |
|                                                          |      | 22052st8ex-12        | 8,0– 6,0                                           | 20,0                                  | 22x24,4                                         | 50                                                                                  |
|                                                          |      | 22052st9ex-12        | 9,5– 7,5                                           | 20,0                                  | 22x24,4                                         | 50                                                                                  |
|                                                          |      | 22052st11ex-12       | 10,5– 8,0                                          | 20,0                                  | 22x24,4                                         | 50                                                                                  |
|                                                          |      | 22052st13ex-12       | 13,0– 10,0                                         | 20,0                                  | 22x24,4                                         | 50                                                                                  |
| M25x1,5                                                  | 7,5  | 22553st7ex-12        | 6,5– 5,0                                           | 21,0                                  | 27x30,5/24x26,7                                 | 50                                                                                  |
|                                                          |      | 22553st8ex-12        | 8,0– 6,0                                           | 21,0                                  | 27x29,5/24x26,7                                 | 50                                                                                  |
|                                                          |      | 22553st9ex-12        | 9,5– 7,5                                           | 21,0                                  | 27x29,5/24x26,7                                 | 50                                                                                  |
|                                                          |      | 22553st11ex-12       | 10,5– 8,0                                          | 21,0                                  | 27x29,5/24x26,7                                 | 50                                                                                  |
|                                                          |      | 22553st13ex-12       | 13,0– 10,0                                         | 21,0                                  | 27x29,5/24x26,7                                 | 50                                                                                  |
|                                                          |      | 22553st16ex-12       | 15,5– 12,5                                         | 21,0                                  | 27x29,5/24x26,7                                 | 50                                                                                  |
| M32x1,5                                                  | 8,0  | 23254st11ex-12       | 10,5– 8,0                                          | 25,0                                  | 36x39,5/30x33,5                                 | 25                                                                                  |
|                                                          |      | 23254st13ex-12       | 13,0– 10,0                                         | 25,0                                  | 36x39,5/30x33,5                                 | 25                                                                                  |
|                                                          |      | 23254st16ex-12       | 15,5– 12,5                                         | 25,0                                  | 36x39,5/30x33,5                                 | 25                                                                                  |
|                                                          |      | 23254st18ex-12       | 18,0– 15,0                                         | 25,0                                  | 36x39,5/30x33,5                                 | 25                                                                                  |
|                                                          |      | 23254st20ex-12       | 20,5– 18,0                                         | 25,0                                  | 36x39,5/30x33,5                                 | 25                                                                                  |
| M40x1,5                                                  | 8,0  | 24055st16ex-12       | 15,5– 12,5                                         | 25,0                                  | 46x51/41x45                                     | 10                                                                                  |
|                                                          |      | 24055st18ex-12       | 18,0– 15,0                                         | 25,0                                  | 46x51/41x45                                     | 10                                                                                  |
|                                                          |      | 24055st20ex-12       | 20,5– 18,0                                         | 25,0                                  | 46x51/41x45                                     | 10                                                                                  |
|                                                          |      | 24055st25ex-12       | 25,0– 21,0                                         | 25,0                                  | 46x51/41x45                                     | 10                                                                                  |
|                                                          |      | 24055st28ex-12       | 28,0– 25,0                                         | 25,0                                  | 46x51/41x45                                     | 10                                                                                  |
| M50x1,5                                                  | 10,0 | 25056st32ex-12       | 32,0– 28,0                                         | 28,0                                  | 55x60,5/50x54                                   | 5                                                                                   |
|                                                          |      | 25056st34ex-12       | 34,0– 30,0                                         | 28,0                                  | 55x60,5/50x54                                   | 5                                                                                   |
|                                                          |      | 25056st36ex-12       | 36,0– 33,0                                         | 28,0                                  | 55x60,5/50x54                                   | 5                                                                                   |
|                                                          |      | 25057st40ex-12       | 40,0– 37,0                                         | 30,0                                  | 60x65                                           | 5                                                                                   |
| M63x1,5                                                  | 10,0 | 26358st44ex-12       | 44,0– 40,0                                         | 30,0                                  | 68x74/65x70                                     | 5                                                                                   |

**i Weitere Ausführungen auf Anfrage**  
*Other versions available on request*

**i Ausführung in Edelstahl V4A auf Anfrage**  
*Stainless steel version AISI 316Ti on request*

# UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb (mit Mehrfach-Dichteinsatz metrisch)

UNI Ex Dicht cable gland Ex eb / Ex tb (with multiple sealing insert, metric)

RoHS      



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**UNI Dicht Ex eb / Ex tb – Messing vernickelt**  
**UNI Dicht Ex eb / Ex tb – Edelstahl**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Schutzart IP 66, IP 68 bis 10 bar, wenn Kabel- $\phi$  = Loch- $\phi$**

UNI Dicht Ex eb / Ex tb – brass, nickel-plated  
 UNI Dicht Ex eb / Ex tb – stainless steel  
 Metric connection thread according to EN 60423  
 Type of protection IP 66, IP 68 up to 10 bar, achievable if cable  $\phi$  = hole  $\phi$

**i Ex-Kabelverschraubungen mit Pg-Anschlussgewinde auf Anfrage lieferbar**  
 Ex cable glands with Pg connection thread available on request

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | d                                       | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |
| VA 1.4305<br>AISI 303                                 | Blank                              | st                                      | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |

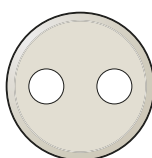
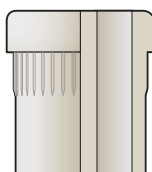


Abb. 3 – Beispiel „2 x 3“  
 2 = Anzahl Bohrungen  
 3 = Bohrungsdurchmesser in mm  
 Fig. 3 – Example “2 x 3”  
 2 = Number of holes  
 3 = Hole diameter in mm

| Anschlussgewinde/-länge  |         | Art.-Nr.                            |                                                              |    |  |
|--------------------------|---------|-------------------------------------|--------------------------------------------------------------|----|--|
| Connection thread/length |         | Art. no.                            |                                                              |    |  |
|                          |         |                                     | Ausführung bitte ergänzen<br>Please indicate product details |    |  |
| A                        | D<br>mm | Messing/Brass<br>VA 1.4305/AISI 303 | = d<br>= st                                                  |    |  |
| M12x1,5                  | 5,0     | 21249                               | m1x4ex-12                                                    | 50 |  |
| M16x1,5                  | 6,0     | 21650                               | m1x3ex-12                                                    | 50 |  |
|                          |         | 21650                               | m1x5ex-12                                                    | 50 |  |
|                          |         | 21650                               | m2x3ex-12                                                    | 50 |  |
| M20x1,5                  | 6,5     | 22051                               | m1x3ex-12                                                    | 50 |  |
|                          |         | 22051                               | m1x4ex-12                                                    | 50 |  |
|                          |         | 22051                               | m1x5ex-12                                                    | 50 |  |
|                          |         | 22051                               | m2x3ex-12                                                    | 50 |  |
|                          |         | 22051                               | m2x5ex-12                                                    | 50 |  |
|                          |         | 22051                               | m3x3ex-12                                                    | 50 |  |
|                          |         | 22051                               | m4x3ex-12                                                    | 50 |  |
|                          |         | 22052                               | m1x3ex-12                                                    | 50 |  |
|                          |         | 22052                               | m1x3,5/1x6ex-12                                              | 50 |  |
|                          |         | 22052                               | m1x4ex-12                                                    | 50 |  |
|                          |         | 22052                               | m1x5ex-12                                                    | 50 |  |
|                          |         | 22052                               | m2x3ex-12                                                    | 50 |  |
|                          |         | 22052                               | m2x4ex-12                                                    | 50 |  |
|                          |         | 22052                               | m2x5ex-12                                                    | 50 |  |
|                          |         | 22052                               | m2x6ex-12                                                    | 50 |  |
|                          |         | 22052                               | m3x3ex-12                                                    | 50 |  |
|                          |         | 22052                               | m3x5,3ex-12                                                  | 50 |  |
|                          |         | 22052                               | m4x1,8ex-12                                                  | 50 |  |
|                          |         | 22052                               | m4x3ex-12                                                    | 50 |  |
|                          |         | 22053                               | m2x5ex-12                                                    | 50 |  |
|                          |         | 22053                               | m2x6ex-12                                                    | 50 |  |
|                          |         | 22053                               | m2x7ex-12                                                    | 50 |  |
|                          |         | 22053                               | m3x6ex-12                                                    | 50 |  |
| M25x1,5                  | 7,5     | 22553                               | m1x5ex-12                                                    | 50 |  |
|                          |         | 22553                               | m1x6/1x8ex-12                                                | 50 |  |
|                          |         | 22553                               | m2x4ex-12                                                    | 50 |  |
|                          |         | 22553                               | m2x5ex-12                                                    | 50 |  |
|                          |         | 22553                               | m2x6ex-12                                                    | 50 |  |
|                          |         | 22553                               | m3x7ex-12                                                    | 50 |  |
|                          |         | 22553                               | m4x6ex-12                                                    | 50 |  |
|                          |         | 22554                               | m2x6ex-12                                                    | 25 |  |
|                          |         | 22554                               | m2x7ex-12                                                    | 25 |  |
|                          |         | 22554                               | m2x8ex-12                                                    | 25 |  |

503001 | IT02130

**UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb (mit Mehrfach-Dichteinsatz metrisch)**

UNI Ex Dicht cable gland Ex eb / Ex tb (with multiple sealing insert, metric)

Fortsetzung von vorheriger Seite  
Continued from previous page

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no.                | Ausführung bitte ergänzen<br>Please indicate product details |    |
|-----------------------------------------------------|---------|-------------------------------------|--------------------------------------------------------------|----|
| A                                                   | D<br>mm | Messing/Brass<br>VA 1.4305/AISI 303 | = d<br>= st                                                  |    |
| M25x1,5                                             | 7,5     | 22554                               | m2x9ex-12                                                    | 25 |
| M32x1,5                                             | 8,0     | 23254                               | m1x7/1x10,5ex-12                                             | 25 |
|                                                     |         | 23254                               | m1x8,5/1x12ex-12                                             | 25 |
|                                                     |         | 23254                               | m1x9/1x10ex-12                                               | 25 |
|                                                     |         | 23254                               | m2x8ex-12                                                    | 25 |
|                                                     |         | 23254                               | m2x9ex-12                                                    | 25 |
|                                                     |         | 23254                               | m3x8ex-12                                                    | 25 |
|                                                     |         | 23254                               | m4x8ex-12                                                    | 25 |
|                                                     |         | 23255                               | m1x7/1x16ex-12                                               | 10 |
|                                                     |         | 23255                               | m1x8/1x14ex-12                                               | 10 |
|                                                     |         | 23255                               | m1x9/1x10ex-12                                               | 10 |
|                                                     |         | 23255                               | m1x9/1x15ex-12                                               | 10 |
|                                                     |         | 23255                               | m1x10/1x12ex-12                                              | 25 |
|                                                     |         | 23255                               | m1x10/1x13ex-12                                              | 10 |
|                                                     |         | 23255                               | m1x10/1x15ex-12                                              | 10 |
|                                                     |         | 23255                               | m2x11ex-12                                                   | 10 |
|                                                     |         | 23255                               | m2x12ex-12                                                   | 10 |
|                                                     |         | 23255                               | m2x13ex-12                                                   | 10 |
|                                                     |         | 23255                               | m2x13,9ex-12                                                 | 10 |
| M40x1,5                                             | 8,0     | 24055                               | m1x5,5/1x9ex-12                                              | 10 |
|                                                     |         | 24055                               | m1x6/1x10ex-12                                               | 10 |
|                                                     |         | 24055                               | m1x7/1x14ex-12                                               | 10 |
|                                                     |         | 24055                               | m1x8,5/1x12ex-12                                             | 10 |
|                                                     |         | 24055                               | m1x9/1x15ex-12                                               | 10 |
|                                                     |         | 24055                               | m1x10/1x13ex-12                                              | 10 |
|                                                     |         | 24055                               | m1x10/1x15ex-12                                              | 10 |
|                                                     |         | 24055                               | m1x12/1x13ex-12                                              | 10 |
|                                                     |         | 24055                               | m2x6,5ex-12                                                  | 10 |
|                                                     |         | 24055                               | m2x9ex-12                                                    | 10 |
|                                                     |         | 24055                               | m2x10ex-12                                                   | 10 |
|                                                     |         | 24055                               | m2x11ex-12                                                   | 10 |
|                                                     |         | 24055                               | m2x13ex-12                                                   | 10 |
|                                                     |         | 24056                               | m1x13/1x19ex-12                                              | 10 |
|                                                     |         | 24056                               | m1x14/1x17ex-12                                              | 10 |
|                                                     |         | 24056                               | m2x15ex-12                                                   | 10 |
| M50x1,5                                             | 10,0    | 25056                               | m1x11/1x21ex-12                                              | 10 |
|                                                     |         | 25056                               | m1x14/1x17ex-12                                              | 5  |
|                                                     |         | 25056                               | m2x9ex-12                                                    | 5  |
|                                                     |         | 25056                               | m2x15ex-12                                                   | 5  |
|                                                     |         | 25057                               | m2x17ex-12                                                   | 5  |
| M63x1,5                                             | 10,0    | 26358                               | m1x30ex-12                                                   | 5  |
|                                                     |         | 26358                               | m1x35ex-12                                                   | 5  |
|                                                     |         | 26358                               | m2x15ex-12                                                   | 5  |
|                                                     |         | 26358                               | m2x16ex-12                                                   | 5  |

**i** Bohrungen müssen auf einem Teilkreis liegen.  
Holes must be arranged on a pitch circle.

**i** Die Produkte auf dieser Seite sind lediglich eine Auswahl aus dem Gesamtprogramm.  
The products listed here are merely a selection of products from our complete range.

**i** Gewinde-Varianten: Standard-Maß D 15 mm Länge  
Thread variants: Standard size D 15 mm length  
= Art.-Nr. 22052...  
= Art.-Nr. 82052...  
= Art. no. 22052...  
= Art. no. 82052...

# UNI Ex Dicht Kabelverschraubung Ex eb / Ex tb (mit geschlossenen Dichteinsätzen)

UNI Ex Dicht cable gland Ex eb / Ex tb (with closed sealing inserts)

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**UNI Dicht Ex eb / Ex tb – Messing vernickelt**  
**UNI Dicht Ex eb / Ex tb – Edelstahl**  
**Metrisches oder Pg-Anschlussgewinde**  
**Schutzart IP 66, IP 68 bis 10 bar**

UNI Dicht Ex eb / Ex tb – brass, nickel-plated  
UNI Dicht Ex eb / Ex tb – stainless steel  
Metric or Pg connection thread  
Type of protection IP 66, IP 68 up to 10 bar

**i Ausführung in Edelstahl V4A auf Anfrage**  
Stainless steel version AISI 316Ti on request

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | d                                       | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |
| VA 1.4305<br>AISI 303                                 | Blank                              | st                                      | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |

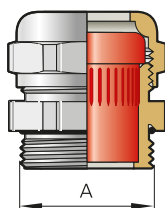


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no.                                         |             | Bauhöhe<br>Mounting height |  | Schlüsselweite<br>Spanner width                                          |    |
|-----------------------------------------------------|---------|--------------------------------------------------------------|-------------|----------------------------|--|--------------------------------------------------------------------------|----|
|                                                     |         | Ausführung bitte ergänzen<br>Please indicate product details |             |                            |  |                                                                          |    |
| A                                                   | D<br>mm | Vernickelt/Nickel-plated<br>Blank                            | = d<br>= st | C<br>mm                    |  | SW <sub>1</sub> x E <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub><br>mm |    |
| M10x1,0                                             | 5,0     | 21049                                                        | gex-12      | 20,0                       |  | 14x15,5                                                                  | 50 |
| M12x1,5                                             | 5,0     | 21249                                                        | gex-12      | 20,0                       |  | 14x15,5                                                                  | 50 |
| M16x1,5                                             | 6,0     | 21650                                                        | gex-12      | 20,0                       |  | 18x20/17x18,9                                                            | 50 |
| M20x1,5                                             | 6,5     | 22052                                                        | gex-12      | 21,0                       |  | 22x24,4                                                                  | 50 |
| M25x1,5                                             | 7,5     | 22553                                                        | gex-12      | 21,0                       |  | 28x31,2/24x26,7                                                          | 50 |
| M32x1,5                                             | 8,0     | 23254                                                        | gex-12      | 25,0                       |  | 35x38,5/30x33,5                                                          | 25 |
| M40x1,5                                             | 8,0     | 24055                                                        | gex-12      | 27,0                       |  | 43x47,3/40x43,5                                                          | 10 |
| M50x1,5                                             | 10,0    | 25056                                                        | gex-12      | 28,0                       |  | 54x58/50x54                                                              | 5  |
| M63x1,5                                             | 10,0    | 26358                                                        | gex-12      | 30,0                       |  | 68x74/64x69                                                              | 5  |

50400 | ITT00820

**UNI Ex HF Dicht Kabelverschraubung Ex eb / Ex tb**

UNI Ex HF Dicht cable gland Ex eb / Ex tb



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**EMV-Kabelverschraubung für abgeschirmte Kabel und Leitungen**  
**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**

*EMC cable gland for shielded cables*  
*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 10 bar*

**i** Es sind zwei Montagevarianten möglich (siehe Abbildung Variante A und B). Bei Variante B kann der max. Kabeldurchmesser durch den unteren Durchlass (G) eingeschränkt sein.  
*Two installation methods are possible (see figure illustrating methods A and B). With method B, the maximum cable diameter may be restricted by the lower passage (G).*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | TPE                                               | s. FC<br>See CC | -20 °C / +60 °C                                              |

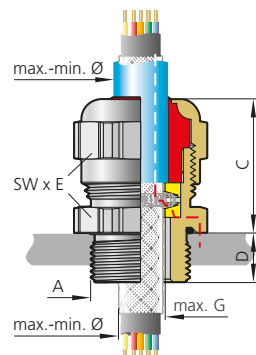


Abb. 3 – Variante A: abgesetzter Außenmantel  
 Fig. 3 – Method A: offset outer sheath

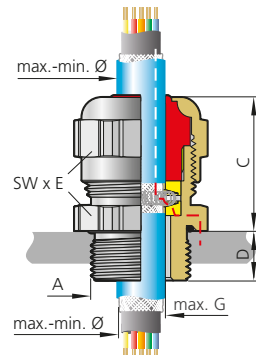


Abb. 4 – Variante B: durchgängiger Außenmantel  
 Fig. 4 – Method B: continuous outer sheath

| Anschlussgewinde/<br>-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Schirmbereich<br>Screening range | Durchlass<br>Passage | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width                                          |
|---------------------------------------------------------|---------|----------------------|-------------------------------|----------------------------------|----------------------|----------------------------|--------------------------------------------------------------------------|
| A                                                       | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                | max. G<br>mm         | C<br>mm                    | SW <sub>1</sub> x E <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub><br>mm |
| M16x1,5                                                 | 6,0     | 2165007S00ex-12      | 6,5– 5,0                      | 4,0– 1,5                         | 4,2                  | 20,0                       | 18x20/17x18,9 50                                                         |
|                                                         |         | 2165007S00exzu-12    | 6,5– 5,0                      | 4,0– 1,5                         | 4,2                  | 39,0                       | 18x20/17x18,9 50                                                         |
|                                                         |         | 2165007S01ex-12      | 6,5– 5,0                      | 6,0– 2,5                         | 7,0                  | 20,0                       | 18x20/17x18,9 50                                                         |
|                                                         |         | 2165007S01exzu-12    | 6,5– 5,0                      | 6,0– 2,5                         | 7,0                  | 39,0                       | 18x20/17x18,9 50                                                         |
|                                                         |         | 2165009S01ex-12      | 9,5– 7,5                      | 6,0– 2,5                         | 7,0                  | 20,0                       | 18x20/17x18,9 50                                                         |
|                                                         |         | 2165009S01exzu-12    | 9,5– 7,5                      | 6,0– 2,5                         | 7,0                  | 39,0                       | 18x20/17x18,9 50                                                         |
| M20x1,5                                                 | 6,0     | 2205107S01ex-12      | 6,5– 5,0                      | 6,0– 2,5                         | 6,5                  | 20,0                       | 22x24,4/20x22,2 50                                                       |
|                                                         |         | 2205107S01exzu-12    | 6,5– 5,0                      | 6,0– 2,5                         | 6,5                  | 39,0                       | 22x24,4/20x22,2 50                                                       |
|                                                         |         | 2205109S03ex-12      | 9,5– 7,5                      | 8,5– 3,5                         | 8,5                  | 20,0                       | 22x24,4/20x22,2 50                                                       |
|                                                         |         | 2205109S03exzu-12    | 9,5– 7,5                      | 8,5– 3,5                         | 8,5                  | 39,0                       | 22x24,4/20x22,2 50                                                       |
|                                                         |         | 2205111S03ex-12      | 10,5– 8,0                     | 8,5– 3,5                         | 8,5                  | 20,0                       | 22x24,4/20x22,2 50                                                       |
| M20x1,5                                                 | 6,5     | 2205209S02ex-12      | 9,5– 7,5                      | 6,5– 3,5                         | 9,0                  | 21,0                       | 22x24,4 50                                                               |
|                                                         |         | 2205209S05ex-12      | 9,5– 7,5                      | 9,5– 6,5                         | 11,0                 | 21,0                       | 22x24,4 50                                                               |
|                                                         |         | 2205211S04ex-12      | 10,5– 8,0                     | 8,0– 3,5                         | 9,0                  | 21,0                       | 22x24,4 50                                                               |
|                                                         |         | 2205211S05ex-12      | 10,5– 8,0                     | 10,5– 6,5                        | 11,0                 | 21,0                       | 22x24,4 50                                                               |
|                                                         |         | 2205213S05ex-12      | 13,0– 10,0                    | 10,5– 6,5                        | 11,0                 | 21,0                       | 22x24,4 50                                                               |
| M25x1,5                                                 | 7,5     | 2255307S03ex-12      | 6,5– 5,0                      | 8,0– 3,0                         | 9,0                  | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255309S03ex-12      | 9,5– 7,5                      | 8,0– 3,0                         | 9,0                  | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255309S05ex-12      | 9,5– 7,5                      | 10,5– 6,5                        | 11,0                 | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255311S04ex-12      | 10,5– 8,0                     | 8,0– 5,0                         | 11,0                 | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255311S05ex-12      | 10,5– 8,0                     | 10,5– 6,5                        | 11,0                 | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255313S04ex-12      | 13,0– 10,0                    | 8,0– 5,0                         | 11,0                 | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         | 2255313S05ex-12      | 13,0– 10,0                    | 10,5– 6,5                        | 11,0                 | 21,0                       | 28x31,2/24x26,7 50                                                       |
|                                                         |         |                      |                               |                                  |                      |                            |                                                                          |
| M32x1,5                                                 | 8,0     | 2325413S05ex-12      | 13,0– 10,0                    | 9,5– 4,5                         | 12,0                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
|                                                         |         | 2325413S07ex-12      | 13,0– 10,0                    | 12,0– 7,0                        | 14,2                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
|                                                         |         | 2325413S08ex-12      | 13,0– 10,0                    | 13,5– 8,0                        | 14,2                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
|                                                         |         | 2325416S08ex-12      | 15,5– 12,5                    | 13,5– 8,0                        | 14,2                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
|                                                         |         | 2325416S09ex-12      | 15,5– 12,5                    | 14,5– 9,0                        | 16,5                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
|                                                         |         | 2325418S09ex-12      | 18,0– 15,0                    | 14,5– 9,0                        | 16,5                 | 25,0                       | 35x38,5/30x33,5 25                                                       |
| M40x1,5                                                 | 8,0     | 2405516S10ex-12      | 15,5– 12,5                    | 17,0– 13,0                       | 17,5                 | 27,0                       | 43x47,3/43x46 10                                                         |
|                                                         |         | 2405518S10ex-12      | 18,0– 15,0                    | 17,0– 13,0                       | 17,5                 | 27,0                       | 43x47,3/43x46 10                                                         |
|                                                         |         | 2405518S18ex-12      | 18,0– 15,0                    | 18,0– 13,0                       | 20,5                 | 27,0                       | 43x47,3/43x46 10                                                         |
|                                                         |         | 2405520S18ex-12      | 20,5– 18,0                    | 18,0– 13,0                       | 20,5                 | 27,0                       | 43x47,3/43x46 10                                                         |
|                                                         |         | 2405520S19ex-12      | 20,5– 18,0                    | 20,0– 15,0                       | 23,0                 | 27,0                       | 43x47,3/43x46 10                                                         |
|                                                         |         | 2405525S19ex-12      | 25,0– 21,0                    | 20,0– 15,0                       | 23,0                 | 27,0                       | 43x47,3/43x46 10                                                         |

# UNI Ex HF Dicht Kabelverschraubung Ex eb / Ex tb

UNI Ex HF Dicht cable gland Ex eb / Ex tb

Fortsetzung von vorheriger Seite  
Continued from previous page

| Anschlussgewinde/<br>-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Schirmbereich<br>Screening range | Durchlass<br>Passage | Bauhöhe<br>Mounting height<br>C | Schlüsselweite<br>Spanner width<br>SW <sub>1</sub> x E <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub> |                                                                                     |
|---------------------------------------------------------|---------|----------------------|-------------------------------|----------------------------------|----------------------|---------------------------------|-------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| A                                                       | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                | max. G<br>mm         | mm                              | mm                                                                                                    |  |
| M50x1,5                                                 | 10,0    | 2505628S13ex-12      | 28,0 – 25,0                   | 25,0 – 18,5                      | 26,0                 | 28,0                            | 54x58/50x54                                                                                           | 5                                                                                   |
|                                                         |         | 2505632S15ex-12      | 32,0 – 28,0                   | 30,5 – 24,0                      | 31,0                 | 28,0                            | 54x58/50x54                                                                                           | 5                                                                                   |
|                                                         |         | 2505634S15ex-12      | 34,0 – 30,0                   | 30,5 – 24,0                      | 31,0                 | 28,0                            | 54x58/50x54                                                                                           | 5                                                                                   |
|                                                         |         | 2505636S15ex-12      | 36,0 – 33,0                   | 30,5 – 24,0                      | 31,0                 | 28,0                            | 54x58/50x54                                                                                           | 5                                                                                   |
|                                                         |         | 2505738S20ex-12      | 38,0 – 35,0                   | 39,0 – 34,0                      | 39,0                 | 42,0                            | 57x61/60x65                                                                                           | 5                                                                                   |
|                                                         |         | 2505740S20ex-12      | 40,0 – 37,0                   | 39,0 – 34,0                      | 39,0                 | 30,0                            | 57x61/60x65                                                                                           | 5                                                                                   |
| M63x1,5                                                 | 10,0    | 2635844S21ex-12      | 44,0 – 40,0                   | 38,0 – 33,0                      | 41,0                 | 30,0                            | 68x74/64x69                                                                                           | 5                                                                                   |
| M75x1,5                                                 | 15,0    | 27521247S22ex-12     | 47,0 – 43,0                   | 48,0 – 39,0                      | 48,5                 | 47,0                            | 81x87                                                                                                 | 1                                                                                   |
|                                                         |         | 27521252S22ex-12     | 52,0 – 46,0                   | 48,0 – 39,0                      | 48,5                 | 47,0                            | 81x87                                                                                                 | 1                                                                                   |
|                                                         |         | 27521258S23ex-12     | 58,0 – 55,0                   | 54,0 – 47,0                      | 55,0                 | 47,0                            | 81x87                                                                                                 | 1                                                                                   |
| M80x2,0                                                 | 15,0    | 28030064S23ex-12     | 64,0 – 59,0                   | 54,0 – 47,0                      | 55,0                 | 60,0                            | 95x102                                                                                                | 1                                                                                   |
|                                                         |         | 28030070S23ex-12     | 70,0 – 64,0                   | 54,0 – 47,0                      | 55,0                 | 60,0                            | 95x102                                                                                                | 1                                                                                   |

50500 | TT02900

**i** **Edelstahl und weitere Ausführungen auf Anfrage**  
Stainless steel and other versions on request

**i** **Erweiterte und reduzierte Varianten auf Anfrage**  
Extended and reduced variants on request

**i** **Gewinde-Varianten:** **Standard-Maß D** **= Art.-Nr. 22052...**  
**15 mm Länge** **= Art.-Nr. 82052...**  
**Thread variants:** **Standard size D** **= Art. no. 22052...**  
**15 mm length** **= Art. no. 82052...**

# UNI Ex IRIS Dicht Kabelverschraubung Ex eb / Ex tb

UNI Ex IRIS Dicht cable gland Ex eb / Ex tb



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**EMV-Kabelverschraubung für abgeschirmte Kabel und Leitungen**  
**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**

*EMC cable gland for shielded cables*  
*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 10 bar*

**i** Es sind zwei Montagevarianten möglich (siehe Abbildung Variante A und B). Bei Variante B kann der max. Kabeldurchmesser durch den unteren Durchlass (G) eingeschränkt sein.  
*Two installation methods are possible (see figure illustrating methods A and B). With method B, the maximum cable diameter may be restricted by the lower passage (G).*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |

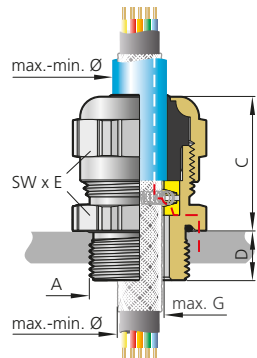


Abb. 3 – Variante A: abgesetzter Außenmantel  
Fig. 3 – Method A: offset outer sheath

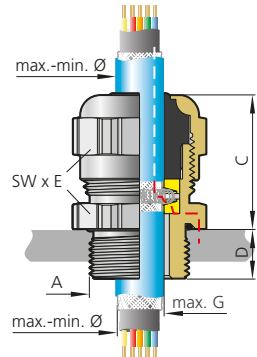


Abb. 4 – Variante B: durchgängiger Außenmantel  
Fig. 4 – Method B: continuous outer sheath

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Schirmbereich<br>Screening range | Durchlass<br>Passage | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                     |
|-----------------------------------------------------|---------|----------------------|-------------------------------|----------------------------------|----------------------|----------------------------|---------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                | max. G<br>mm         | C<br>mm                    | SW x E<br>mm                    |  |
| M16x1,5                                             | 10,0    | 2162207S01ex-12      | 6,5 – 5,0                     | 6,0 – 3,0                        | 9,0                  | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2162209S03ex-12      | 9,0 – 7,5                     | 7,5 – 3,5                        | 9,0                  | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2162209S04ex-12      | 9,0 – 7,5                     | 8,5 – 4,0                        | 11,0                 | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2162211S04ex-12      | 11,0 – 9,0                    | 8,5 – 4,0                        | 11,0                 | 31,0                       | 24x26,7                         | 50                                                                                  |
| M20x1,5                                             | 10,0    | 2202207S01ex-12      | 6,5 – 5,0                     | 6,0 – 3,0                        | 9,0                  | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2202209S03ex-12      | 9,0 – 7,5                     | 7,5 – 3,5                        | 9,0                  | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2202209S04ex-12      | 9,0 – 7,5                     | 8,5 – 4,0                        | 11,0                 | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 2202211S04ex-12      | 11,0 – 9,0                    | 8,5 – 4,0                        | 11,0                 | 31,0                       | 24x26,7                         | 50                                                                                  |
| M25x1,5                                             | 11,0    | 2252809S05ex-12      | 11,0 – 9,0                    | 8,5 – 6,0                        | 12,0                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2252811S05ex-12      | 11,0 – 9,0                    | 9,0 – 6,0                        | 12,0                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2252811S06ex-12      | 11,0 – 9,0                    | 10,5 – 6,0                       | 12,0                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2252814S07ex-12      | 14,0 – 11,0                   | 11,5 – 6,5                       | 14,2                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2252818S07ex-12      | 18,0 – 15,0                   | 13,5 – 8,0                       | 14,2                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2252818S08ex-12      | 18,0 – 15,0                   | 16,5 – 9,5                       | 16,5                 | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 2253218S09ex-12      | 18,0 – 15,0                   | 15,5 – 10,0                      | 15,0                 | 34,0                       | 35x38,5                         | 25                                                                                  |
|                                                     |         | 2253218S10ex-12      | 18,0 – 15,0                   | 17,5 – 12,5                      | 17,5                 | 34,0                       | 35x38,5                         | 25                                                                                  |
| M32x1,5                                             | 13,0    | 2323823S11ex-12      | 23,0 – 20,0                   | 21,0 – 15,0                      | 23,0                 | 39,0                       | 40x43,5                         | 10                                                                                  |
|                                                     |         | 2323826S11ex-12      | 26,0 – 23,0                   | 21,0 – 15,0                      | 23,0                 | 39,0                       | 40x43,5                         | 10                                                                                  |
| M40x1,5                                             | 14,0    | 2404830S12ex-12      | 29,0 – 26,0                   | 25,0 – 19,0                      | 26,0                 | 45,0                       | 50x54                           | 5                                                                                   |
|                                                     |         | 2404830S13ex-12      | 29,0 – 26,0                   | 25,0 – 22,0                      | 31,0                 | 45,0                       | 50x54                           | 5                                                                                   |
|                                                     |         | 2404832S14ex-12      | 32,0 – 30,0                   | 27,0 – 21,0                      | 31,0                 | 45,0                       | 50x54                           | 5                                                                                   |
|                                                     |         | 2404832S15ex-12      | 32,0 – 30,0                   | 30,5 – 24,0                      | 31,0                 | 45,0                       | 50x54                           | 5                                                                                   |
|                                                     |         | 2404835S15ex-12      | 35,0 – 31,0                   | 30,5 – 24,0                      | 31,0                 | 45,0                       | 50x54                           | 5                                                                                   |
| M50x1,5                                             | 15,0    | 2505837S16ex-12      | 37,0 – 33,0                   | 33,0 – 29,0                      | 36,0                 | 50,0                       | 60x65                           | 5                                                                                   |
|                                                     |         | 2505841S16ex-12      | 41,0 – 38,0                   | 33,0 – 29,0                      | 36,0                 | 50,0                       | 60x65                           | 5                                                                                   |
| M63x1,5                                             | 16,0    | 2637545S21ex-12      | 45,0 – 41,0                   | 42,0 – 34,0                      | 42,0                 | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 2637545S22ex-12      | 45,0 – 41,0                   | 48,0 – 40,0                      | 48,5                 | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 2637551S21ex-12      | 51,0 – 46,0                   | 42,0 – 36,0                      | 42,0                 | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 2637551S22ex-12      | 51,0 – 46,0                   | 48,0 – 40,0                      | 48,5                 | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 2637556S22ex-12      | 56,0 – 52,0                   | 48,5 – 42,0                      | 48,5                 | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 2637556S23ex-12      | 56,0 – 52,0                   | 54,0 – 47,0                      | 55,0                 | 58,0                       | 81x87                           | 1                                                                                   |

**i** Edelstahl und weitere Ausführungen auf Anfrage  
Stainless steel and other versions on request

# UNI Ex EMV Dicht Kabelverschraubung Ex eb / Ex tb

UNI Ex EMV Dicht cable gland Ex eb / Ex tb

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**EMV-Kabelverschraubung für abgeschirmte Kabel und Leitungen**  
**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**

*EMC cable gland for shielded cables*  
*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 10 bar*

**i Edelstahl und weitere Ausführungen auf Anfrage**  
*Stainless steel and other versions on request*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | TPE                                               | Weiß<br>White   | -20 °C / +60 °C                                              |

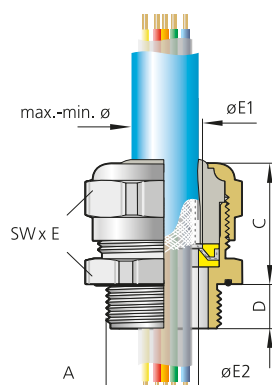


Abb. 3 – Standard-Ausführung  
Fig. 3 – Standard version

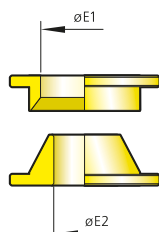


Abb. 4 – Konenpaar  
Fig. 4 – Pair of cones

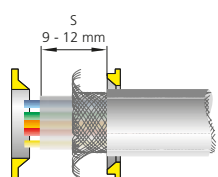


Abb. 5  
Fig. 5

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Schirm-Ø<br>Shield Ø | Durchlass<br>Passage | Konenpaar<br>Pair of cones | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                     |
|-----------------------------------------------------|---------|----------------------|-------------------------------|----------------------|----------------------|----------------------------|----------------------------|---------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      |                               |                      |                      |                            |                            |                                 |                                                                                     |
|                                                     |         |                      | max./min. ø<br>mm             | max. ø E1<br>mm      | max. ø E2<br>mm      | Art.-Nr.                   | C<br>mm                    | SW x E<br>mm                    |  |
| M16x1,5                                             | 10,0    | 216220700ex-12       | 6,5 – 5,0                     | 5,5                  | 3,3                  | EEA 0                      | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 216220701ex-12       | 6,5 – 5,0                     | 8,2                  | 6,0                  | EEA 1                      | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 216220901ex-12       | 9,0 – 7,5                     | 8,2                  | 6,0                  | EEA 1                      | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 216221102ex-12       | 11,0 – 9,0                    | 9,2                  | 7,0                  | EEA 2                      | 31,0                       | 24x26,7                         | 50                                                                                  |
| M20x1,5                                             | 10,0    | 220220700ex-12       | 6,5 – 5,0                     | 5,5                  | 3,3                  | EEA 0                      | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 220220901ex-12       | 9,0 – 7,5                     | 8,2                  | 6,0                  | EEA 1                      | 31,0                       | 24x26,7                         | 50                                                                                  |
|                                                     |         | 220221102ex-12       | 11,0 – 9,0                    | 9,2                  | 7,0                  | EEA 2                      | 31,0                       | 24x26,7                         | 50                                                                                  |
| M25x1,5                                             | 11,0    | 225280903ex-12       | 11,0 – 9,0                    | 8,2                  | 6,0                  | EEA 3                      | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 225281104ex-12       | 11,0 – 9,0                    | 9,2                  | 7,0                  | EEA 4                      | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 225281205ex-12       | 14,0 – 11,0                   | 10,2                 | 8,0                  | EEA 5                      | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 225281406ex-12       | 14,0 – 11,0                   | 12,7                 | 10,5                 | EEA 6                      | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 225281607ex-12       | 18,0 – 15,0                   | 15,2                 | 13,0                 | EEA 7                      | 32,0                       | 30x33,5                         | 25                                                                                  |
| M25x1,5                                             | 12,0    | 225281808ex-12       | 18,0 – 15,0                   | 16,3                 | 14,5                 | EEA 8                      | 32,0                       | 30x33,5                         | 25                                                                                  |
|                                                     |         | 225321809ex-12       | 18,0 – 15,0                   | 18,0                 | 16,0                 | EEA 9                      | 34,0                       | 35x38,5                         | 25                                                                                  |
|                                                     |         | 225322010ex-12       | 20,0 – 18,0                   | 20,0                 | 18,0                 | EEA 10                     | 34,0                       | 35x38,5                         | 25                                                                                  |
| M32x1,5                                             | 13,0    | 232382211ex-12       | 23,0 – 20,0                   | 22,0                 | 20,0                 | EEA 11                     | 39,0                       | 40x43,5                         | 10                                                                                  |
|                                                     |         | 232382312ex-12       | 23,0 – 20,0                   | 24,0                 | 22,0                 | EEA 12                     | 39,0                       | 40x43,5                         | 10                                                                                  |
|                                                     |         | 232382613ex-12       | 27,0 – 23,0                   | 26,0                 | 24,0                 | EEA 13                     | 39,0                       | 40x43,5                         | 10                                                                                  |
| M40x1,5                                             | 14,0    | 240483014ex-12       | 30,0 – 26,0                   | 29,0                 | 27,0                 | EEA 14                     | 45,0                       | 50x54                           | 5                                                                                   |
|                                                     |         | 240483215ex-12       | 35,0 – 31,0                   | 32,0                 | 30,0                 | EEA 15                     | 45,0                       | 50x54                           | 5                                                                                   |
| M50x1,5                                             | 15,0    | 250583716ex-12       | 37,0 – 33,0                   | 37,0                 | 35,0                 | EEA 16                     | 50,0                       | 60x65                           | 5                                                                                   |
|                                                     |         | 250584117ex-12       | 41,0 – 38,0                   | 41,0                 | 39,0                 | EEA 17                     | 50,0                       | 60x65                           | 5                                                                                   |
| M63x1,5                                             | 16,0    | 263754518ex-12       | 45,0 – 41,0                   | 46,0                 | 44,0                 | EEA 18                     | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 263755119ex-12       | 51,0 – 46,0                   | 51,0                 | 49,0                 | EEA 19                     | 58,0                       | 81x87                           | 1                                                                                   |
|                                                     |         | 263755619ex-12       | 56,0 – 52,0                   | 51,0                 | 49,0                 | EEA 19                     | 58,0                       | 81x87                           | 1                                                                                   |

50700 | TT03200

**UNI Ex Dicht SVD-Schutzschlauch Kabelverschraubung Ex eb / Ex tb**

UNI Ex Dicht SVD hose cable gland Ex eb / Ex tb

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches oder Pg-Anschlussgewinde**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**

*Brass, nickel-plated*  
*Metric or Pg connection thread*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 10 bar*

**i** Die Produkte auf dieser Seite sind lediglich eine Auswahl aus dem Gesamtprogramm.  
*The products listed here are merely a selection of products from our complete range.*

| Werkstoff Verschraubungskörper<br><i>Material gland body</i> | Ausführung/Farbe<br><i>Version/colour</i> | Werkstoff Dichteinsatz<br><i>Material sealing insert</i> | Farbe<br><i>Colour</i> | Temperaturbereich min./max.<br><i>Temperature range (min./max.)</i> |
|--------------------------------------------------------------|-------------------------------------------|----------------------------------------------------------|------------------------|---------------------------------------------------------------------|
| Messing<br><i>Brass</i>                                      | Vernickelt<br><i>Nickel-plated</i>        | TPE                                                      | s. FC<br><i>See CC</i> | -20 °C / +60 °C                                                     |

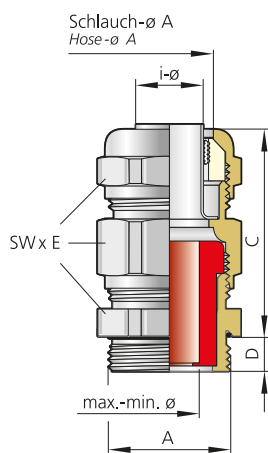


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br><i>Connection thread/length</i> |      | Art.-Nr.<br><i>Art. no.</i> | Schlauchdurchmesser A<br><i>Hose diameter A</i> |        | NW<br><i>NW</i> | Dichtbereich<br><i>Sealing range</i> |      | Bauhöhe<br><i>Mounting height C</i> | Schlüsselweite<br><i>Spanner width SW x E</i> |                                                                                     |
|------------------------------------------------------------|------|-----------------------------|-------------------------------------------------|--------|-----------------|--------------------------------------|------|-------------------------------------|-----------------------------------------------|-------------------------------------------------------------------------------------|
| A                                                          | D mm |                             | max./min. ø mm                                  | i-ø mm |                 | max./min. ø mm                       | mm   |                                     | mm                                            |  |
| M16x1,5                                                    | 6,0  | 6.21651d1509.07ex-12        | 15,0 – 13,0                                     | 9,0    | 10              | 6,5 – 5,0                            | 40,0 | 20x22,2                             | 50                                            |                                                                                     |
| M20x1,5                                                    | 6,0  | 6.22051d1509.07ex-12        | 15,0 – 13,0                                     | 9,0    | 10              | 6,5 – 5,0                            | 40,0 | 20x22,2                             | 50                                            |                                                                                     |
| M20x1,5                                                    | 6,5  | 6.22052d1713.09ex-12        | 17,0 – 13,0                                     | 13,0   | 11              | 9,5 – 7,5                            | 42,0 | 22x24,4                             | 50                                            |                                                                                     |
|                                                            |      | 6.22053d1811.11ex-12        | 18,0 – 15,0                                     | 11,0   | 11              | 10,5 – 8,0                           | 42,0 | 24x26,7                             | 50                                            |                                                                                     |
|                                                            |      | 6.22053d1812.07ex-12        | 18,0 – 15,0                                     | 12,0   | 11              | 6,5 – 5,0                            | 42,0 | 24x26,7                             | 50                                            |                                                                                     |
|                                                            |      | 6.22053d1812.08ex-12        | 18,0 – 15,0                                     | 12,0   | 11              | 8,0 – 6,0                            | 42,0 | 24x26,7                             | 50                                            |                                                                                     |
|                                                            |      | 6.22053d1815.13ex-12        | 18,0 – 15,0                                     | 15,0   | 11              | 13,0 – 10,0                          | 42,0 | 24x26,7                             | 50                                            |                                                                                     |
| M25x1,5                                                    | 7,5  | 6.22554d2316.16ex-12        | 23,0 – 19,0                                     | 16,0   | 16              | 15,0 – 12,5                          | 44,0 | 30x33,5                             | 25                                            |                                                                                     |
| M32x1,5                                                    | 8,0  | 6.23255d3221.21ex-12        | 32,0 – 28,0                                     | 21,0   | 23              | 20,5 – 18,0                          | 55,0 | 40x43,5                             | 10                                            |                                                                                     |
| M40x1,5                                                    | 9,0  | 6.24056d4030.28ex-12        | 40,0 – 34,0                                     | 30,0   | 31              | 28,0 – 25,0                          | 60,0 | 50x54                               | 10                                            |                                                                                     |

Passender Schlauch siehe Seite 363  
*For suitable hose, see page 363*

**i** Weitere Ausführungen auf Anfrage  
*Other versions available on request*



## Ex-Zulassung: Typ UNI Ex Klemm Dicht

Ex approval: Type UNI Ex Clamping Dicht



Abb. 1  
Fig. 1

### Werkstoff

|                                                   |                             |                                                                                    |
|---------------------------------------------------|-----------------------------|------------------------------------------------------------------------------------|
| Verschraubung:                                    | Messing<br>Edelstahl<br>TPE | Blank, vernickelt<br>VA 1.4305 (VA 1.4571 auf Anfrage)<br>Farbe: UNI Farbcode (FC) |
| Dichteinsatz:<br>Anschlussge-<br>winde Dichtring: | HNBR<br>Silikon             | Farbe: Schwarz<br>Farbe: Rot                                                       |

### Explosionsschutz

|                                                                   |                                                                                       |                                                                                                    |
|-------------------------------------------------------------------|---------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                          | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68 bis 5 bar |
| Gerätegruppe/Kategorie:<br>Einsetzbar in:                         | II 2 G/ II 2D<br>Zone 1, Zone 2, Zone 21 und 22<br>(leitender Staub)                  |                                                                                                    |
| Normen:                                                           | EN IEC 60079-0:2018,<br>EN IEC 60079-7:2015, EN 60079-31:2014                         |                                                                                                    |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 14 ATEX 1012 xx CE 0637<br>xx = Größe Anschlussgewinde                            |                                                                                                    |
| Kennzeichnung Gas:                                                | II 2G Ex eb IIC Gb                                                                    |                                                                                                    |
| Kennzeichnung Staub:                                              | II 2D Ex tb IIIC Db                                                                   |                                                                                                    |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 14.0022<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000364 |                                                                                                    |

Die **Kabelverschraubung UNI Ex Klemm Dicht** steht für die unterschiedlichsten Anwendungsfälle in verschiedenen Ausführungen zur Verfügung:

- Standard
- Abgeschirmte Leitungen mit Federkontaktierung
- Abgeschirmte Leitungen mit Konuskontaktierung

### Betriebstemperaturbereich:

TPE –20 °C bis +60 °C

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

- M-Gewinde Standard, EN 60423
- M-Gewinde lang, 15 mm, EN 60423
- Pg-Gewinde, Standard
- Pg-Gewinde lang, 15 mm
- NPT-Gewinde auf Anfrage

### Besondere Bedingungen:

Keine

### Variante:

**UNI Ex Klemm Dicht Kabelverschraubung Ex eb / Ex tb**

### Variant:

UNI Ex Clamping Dicht cable gland Ex eb / Ex tb

### Material

|                                    |                          |                                                          |
|------------------------------------|--------------------------|----------------------------------------------------------|
| Gland:                             | Brass<br>Stainless steel | Blank, nickel-plated<br>AISI 303 (AISI 316Ti on request) |
| Sealing insert:                    | TPE                      | Colour: UNI colour code (CC)                             |
| Connection<br>thread sealing ring: | HNBR<br>Silicone         | Colour: black<br>Colour: red                             |

### Explosion protection

|                                                    |                                                                                       |                                                                                                                     |
|----------------------------------------------------|---------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                           | Increased safety – “e”<br>Protection by enclosure – “t”<br>Type of protection EN 60529: IP 66,<br>IP 68 up to 5 bar |
| Equipment group/category:<br>For use in:           | II 2 G/ II 2D<br>Zone 1, zone 2, zones 21 and 22<br>(conductive dust)                 |                                                                                                                     |
| Standards:                                         | EN IEC 60079-0:2018,<br>EN IEC 60079-7:2015, EN 60079-31:2014                         |                                                                                                                     |
| Marking, certificate number<br>and test centre ID: | PTB 14 ATEX 1012 xx CE 0637<br>xx = size of connection thread                         |                                                                                                                     |
| Gas Marking:                                       | II 2G Ex eb IIC Gb                                                                    |                                                                                                                     |
| Dust Marking:                                      | II 2D Ex tb IIIC Db                                                                   |                                                                                                                     |
| Other certificates:                                | IECEx – IECEx PTB 14.0022<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000364 |                                                                                                                     |

The **UNI Ex Clamping Dicht** cable gland is available in different versions for different applications:

- Standard
- Shielded cables with spring contact
- Shielded cables with cone contact

### Operating temperature range:

TPE –20 °C to +60 °C

The Ex cable gland can be purchased with **different connection thread types and lengths:**

- M thread standard, EN 60423
- M thread long, 15 mm, EN 60423
- Pg thread standard
- Pg thread long, 15 mm
- NPT thread on request

### Special conditions:

None

# UNI Ex Klemm Dicht Kabelverschraubung Ex eb / Ex tb

UNI Ex Clamping Dicht cable gland Ex eb / Ex tb

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus HNBR**  
**Schutzart IP 66, IP 68 bis 10 bar**  
**Mit Zugentlastungsdruckschraube**

*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of HNBR*  
*Type of protection IP 66, IP 68 up to 10 bar*  
*With strain relief pressure screw*

**Weitere Ausführungen auf Anfrage**  
*Other versions available on request*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|-----------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | d                                       | TPE                                               | s. FC<br>See CC | -20 °C / +60 °C                                              |

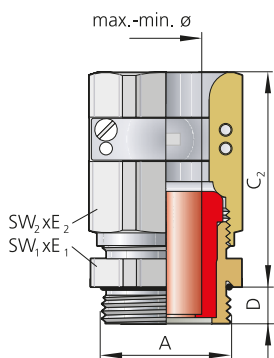


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width                                          |                                                                                     |
|-----------------------------------------------------|---------|----------------------|-------------------------------|----------------------------|--------------------------------------------------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | C<br>mm                    | SW <sub>1</sub> x E <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub><br>mm |  |
| M16x1,5                                             | 6,0     | 21650d8exzu-12*      | 8,0 – 6,0                     | 20,0                       | 18x20/17x18,9                                                            | 50                                                                                  |
|                                                     |         | 21650d9exzu-12*      | 9,5 – 7,5                     | 20,0                       | 18x20/17x18,9                                                            | 50                                                                                  |
| M20x1,5                                             | 6,5     | 22052d9exzu-12*      | 9,5 – 7,5                     | 20,0                       | 22x24,4                                                                  | 50                                                                                  |
|                                                     |         | 22052d11exzu-12*     | 10,5 – 8,0                    | 20,0                       | 22x24,4                                                                  | 50                                                                                  |
|                                                     |         | 22052d13exzu-12*     | 13,0 – 10,0                   | 20,0                       | 22x24,4                                                                  | 50                                                                                  |
| M25x1,5                                             | 7,5     | 22553d9exzu-12       | 9,5 – 7,5                     | 21,0                       | 28x31,2/24x26,7                                                          | 50                                                                                  |
|                                                     |         | 22553d11exzu-12      | 10,5 – 8,0                    | 21,0                       | 28x31,2/24x26,7                                                          | 50                                                                                  |
|                                                     |         | 22553d13exzu-12      | 13,0 – 10,0                   | 21,0                       | 28x31,2/24x26,7                                                          | 50                                                                                  |
|                                                     |         | 22553d16exzu-12      | 15,5 – 12,5                   | 21,0                       | 28x31,2/24x26,7                                                          | 50                                                                                  |
| M32x1,5                                             | 8,0     | 23254d13exzu-12      | 13,0 – 10,0                   | 26,0                       | 35x38,5/30x33,5                                                          | 25                                                                                  |
|                                                     |         | 23254d16exzu-12      | 15,5 – 12,5                   | 26,0                       | 35x38,5/30x33,5                                                          | 25                                                                                  |
|                                                     |         | 23254d18exzu-12      | 18,0 – 15,0                   | 26,0                       | 35x38,5/30x33,5                                                          | 25                                                                                  |
|                                                     |         | 23254d20exzu-12      | 20,5 – 18,0                   | 26,0                       | 35x38,5/30x33,5                                                          | 25                                                                                  |
| M40x1,5                                             | 8,0     | 24055d18exzu-12      | 18,0 – 15,0                   | 29,0                       | 43x47,3/40x43,5                                                          | 10                                                                                  |
|                                                     |         | 24055d20exzu-12      | 20,5 – 18,0                   | 29,0                       | 43x47,3/40x43,5                                                          | 10                                                                                  |
|                                                     |         | 24055d25exzu-12      | 25,0 – 21,0                   | 29,0                       | 43x47,3/40x43,5                                                          | 10                                                                                  |
|                                                     |         | 24055d28exzu-12      | 28,0 – 25,0                   | 29,0                       | 43x47,3/40x43,5                                                          | 10                                                                                  |
| M50x1,5                                             | 10,0    | 25056d32exzu-12      | 32,0 – 28,0                   | 30,0                       | 54x58/50x54                                                              | 5                                                                                   |
|                                                     |         | 25056d34exzu-12      | 34,0 – 30,0                   | 30,0                       | 54x58/50x54                                                              | 5                                                                                   |
|                                                     |         | 25056d36exzu-12      | 36,0 – 33,0                   | 30,0                       | 54x58/50x54                                                              | 5                                                                                   |
| M63x1,5                                             | 10,0    | 26358d44exzu-12      | 44,0 – 40,0                   | 30,0                       | 68x74/64x69                                                              | 5                                                                                   |
|                                                     |         | 26375d51exzu-12      | 51,0 – 46,0                   | 73,0                       | 81x87                                                                    | 1                                                                                   |
| M75x1,5                                             | 15,0    | 275212d52exzu-12     | 52,0 – 46,0                   | 46,0                       | 81x87                                                                    | 1                                                                                   |
| M80x2,0                                             | 15,0    | 280300d64exzu-12     | 64,0 – 59,0                   | 76,5                       | 95x102                                                                   | 1                                                                                   |

\* Zugelassen nach PTB 14 ATEX 1011 X.

\* Approved by PTB 14 ATEX 1011 X.

## Ex-Zulassung: Typ UNI Ex Dicht Silikon Mehrfach

Ex approval: Type UNI Ex Dicht Silicone Multiple



Abb. 1  
Fig. 1

### Werkstoff

|                                                   |                                 |                                                                   |
|---------------------------------------------------|---------------------------------|-------------------------------------------------------------------|
| Verschraubung:                                    | Messing<br>Edelstahl<br>Silikon | vernickelt<br>VA 1.4305 (VA 1.4571 auf Anfrage)<br>Farbe: Schwarz |
| Dichteinsatz:<br>Anschlussge-<br>winde Dichtring: | Silikon                         | Farbe: Rot (optional)                                             |

### Explosionsschutz

|                                                                   |                                                                                        |                                                                                                              |
|-------------------------------------------------------------------|----------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                           | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68 bis 10 bar, 30 Min. |
| Gerätegruppe/Kategorie:<br>Einsetzbar in:                         | II 2 G/II 1D<br>Zone 1, Zone 2, Zone 20, 21 und 22<br>(leitender Staub)                |                                                                                                              |
| Normen:                                                           | EN IEC 60079-0:2018+AC:2020,<br>EN IEC 60079-7:2015, EN 60079-31:2014                  |                                                                                                              |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 15 ATEX 1001X xx CE 0637<br>xx = Größe Anschlussgewinde                            |                                                                                                              |
| Kennzeichnung Gas:                                                | II 2G Ex eb IIC Gb                                                                     |                                                                                                              |
| Kennzeichnung Staub:                                              | II 1D Ex ta IIIC Da                                                                    |                                                                                                              |
| Kennzeichnung<br>extrem kleiner Bauteile:*                        | II 2G/II 1D CE 0637                                                                    |                                                                                                              |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 15.0001X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000363 |                                                                                                              |

\* Kennzeichnung auf Kabelverschraubung bis Größe M16.

Die **Mehrfach Kabelverschraubung UNI Ex Dicht Silikon** steht für unterschiedliche Anwendungsfälle in verschiedenen Ausführungen zur Verfügung:

- Standard
- Mehrfach

### Betriebstemperaturbereich:

Silikon –55 °C bis +160 °C

Eine Verschraubung ist komplett in den Varianten mit Einfach-, Mehrfach- und geschlossenem Dichteinsatz lieferbar.

Die Ex-Kabelverschraubung ist mit **verschiedenen Anschlussgewindearten/-längen wählbar:**

- M-Gewinde Standard, EN 60423
- M-Gewinde lang, 15 mm, EN 60423
- Pg-Gewinde Standard
- Pg-Gewinde lang, 15 mm
- NPT-Gewinde auf Anfrage

### Besondere Bedingungen:

Bei Verwendung der Druckschraube ohne Zugentlastungsdruckschraube dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten. Die Schutzart IP 66/IP 68 wird nur bei sachgerechtem Einbau von Dichtung und Kabel- und Leitungseinführungen erreicht. Die Hinweise des Herstellers sind zu beachten. Die Typen mit niedriger Stoßenergie sind so in das Gehäuse einzubauen, dass sie vor Stoßenergie mechanisch geschützt sind.

### Variante:

**UNI Ex Dicht Silikon Mehrfach Kabelverschraubung Ex eb / Ex ta**

### Variant:

UNI Ex Dicht Silicone Multiple cable gland Ex eb / Ex ta

### Material

|                                    |                          |                                                   |
|------------------------------------|--------------------------|---------------------------------------------------|
| Gland:                             | Brass<br>Stainless steel | Nickel-plated<br>AISI 303 (AISI 316Ti on request) |
| Sealing insert:                    | Silicone                 | Colour: black                                     |
| Connection<br>thread sealing ring: | Silicone                 | Colour: red (optional)                            |

### Explosion protection

|                                                    |                                                                                        |                                                                                                                            |
|----------------------------------------------------|----------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                            | Increased safety – “e”<br>Protection by enclosure – “t”<br>Type of protection EN 60529: IP 66, IP 68 up to 10 bar, 30 min. |
| Equipment group/category:<br>For use in:           | II 2 G/II 1D<br>Zone 1, zone 2, zones 20, 21 and 22<br>(conductive dust)               |                                                                                                                            |
| Standards:                                         | EN IEC 60079-0:2018+AC:2020,<br>EN IEC 60079-7:2015, EN 60079-31:2014                  |                                                                                                                            |
| Marking, certificate number<br>and test centre ID: | PTB 15 ATEX 1001X xx CE 0637<br>xx = size of connection thread                         |                                                                                                                            |
| Gas marking:                                       | II 2G Ex eb IIC Gb                                                                     |                                                                                                                            |
| Dust marking:                                      | II 1D Ex ta IIIC Da                                                                    |                                                                                                                            |
| Marking on<br>extremely small components:*         | II 2G/II 1D CE 0637                                                                    |                                                                                                                            |
| Other certificates:                                | IECEx – IECEx PTB 15.0001X<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000363 |                                                                                                                            |

\* Marking on cable gland up to size M16.

The multiple **UNI Ex Dicht Silicone cable gland** is available in different versions for different applications:

- Standard
- Multiple

### Operating temperature range:

Silicone –55 °C to +160 °C

Complete glands are available in variants with simple, multiple and closed sealing inserts.

The Ex cable gland can be purchased with **different connection thread types and lengths:**

- M thread standard, EN 60423
- M thread long, 15 mm, EN 60423
- Pg thread standard
- Pg thread long, 15 mm
- NPT thread on request

### Special conditions:

Only fixed cables may be inserted if the pressure screw is used without strain relief. The operator must ensure appropriate strain relief. IP 66/IP 68 protection is only attained if the seal and the cable glands are properly assembled. The manufacturer's instructions should be observed. Types with low impact energy should be mounted in the enclosure in such a way that they are mechanically protected against the kinetic energy of impact.

# UNI Ex Dicht Silikon Mehrfach Kabelverschraubung Ex eb / Ex ta

UNI Ex Dicht Silicone Multiple cable gland Ex eb / Ex ta

RoHS     



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt, Edelstahl 1.4305**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66**  
**Schutzart IP 68 bis 10 bar (30 Min.), wenn Kabel-Ø = Loch-Ø**

*Brass, nickel-plated, stainless steel AISI 303*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 66*  
*Type of protection IP 68 up to 10 bar (30 min.), achievable if cable Ø = hole Ø*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour  | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|-----------------------------------------|---------------------------------------------------|------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | d                                       | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -55 °C / +160 °C                                             |
| VA 1.4305<br>AISI 303                                 | Blank                              | st                                      | Silikon HT<br>Silicone HT                         | Schwarz<br>Black | -55 °C / +160 °C                                             |

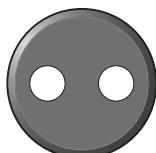
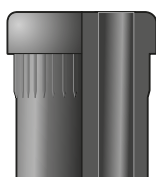


Abb. 3 – Beispiel „2 x 3“  
 2 = Anzahl Bohrungen  
 3 = Bohrungsdurchmesser in mm  
 Fig. 3 – Example “2 x 3”  
 2 = Number of holes  
 3 = Hole diameter in mm

| Anschlussgewinde<br>Connection thread | Art.-Nr.<br>Art. no.    | Ausführung bitte ergänzen<br>Please indicate product details |    |
|---------------------------------------|-------------------------|--------------------------------------------------------------|----|
| <b>A</b>                              | Messing/Brass = d       |                                                              |    |
|                                       | VA 1.4305/AISI 303 = st |                                                              |    |
| M20x1,5                               | 22052                   | im2x5ex/HT                                                   | 50 |
|                                       | 22052                   | im4x3ex/HT                                                   | 50 |
|                                       | 22052                   | im4x4ex/HT                                                   | 50 |
|                                       | 22052                   | im5x2ex/HT                                                   | 50 |
| M25x1,5                               | 22553                   | im4x5ex/HT                                                   | 50 |
|                                       | 22553                   | im4x6ex/HT                                                   | 50 |
| M32x1,5                               | 23254                   | im3x7ex/HT                                                   | 25 |
|                                       | 23254                   | im3x9ex/HT                                                   | 25 |
|                                       | 23254                   | im4x6ex/HT                                                   | 25 |
|                                       | 23254                   | im4x8ex/HT                                                   | 25 |
| M40x1,5                               | 24055                   | im2x13ex/HT                                                  | 10 |
|                                       | 24055                   | im3x11ex/HT                                                  | 10 |
|                                       | 24055                   | im5x10ex/HT                                                  | 10 |
|                                       | 24055                   | im5x9ex/HT                                                   | 10 |
|                                       | 24055                   | im7x7ex/HT                                                   | 10 |

53300 | T701920

## Ex-Zulassung: Typen Erweiterungen, Reduzierungen und Blindstopfen

Ex approval: Types Adaptors, reducers and blind plugs



Abb. 1  
Fig. 1

### Werkstoff

|                                          |                      |                      |
|------------------------------------------|----------------------|----------------------|
| Erweiterung, Reduktion,<br>Blindstopfen: | Messing<br>Edelstahl | vernickelt<br>1.4305 |
| Anschlussgewinde<br>Dichtring:           | Silikon              | Farbe: Rot           |

### Varianten:

- Ex-Erweiterungen Ex eb / Ex tb (Sechskant – M- auf M-Gewinde)
- Ex-Reduzierungen Ex eb / Ex tb (Sechskant – M- auf M-Gewinde)
- Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Metrisches Gewinde)
- Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Pg-Gewinde)

### Variants:

- Ex extensions Ex eb / Ex tb (hexagonal – M to M thread)
- Ex reducers Ex eb / Ex tb (hexagonal – M to M thread)
- Ex blind plug Ex eb / Ex tb (hexagonal – Metric thread)
- Ex blind plug Ex eb / Ex tb (hexagonal – Pg thread)

### Material

|                                    |                          |                           |
|------------------------------------|--------------------------|---------------------------|
| Extension, reducer,<br>blind plug: | Brass<br>Stainless steel | Nickel-plated<br>AISI 303 |
| Connection<br>thread sealing ring: | Silicone                 | Colour: red               |

### Explosionsschutz

|                                                                   |                                                                                                                                           |                                                      |
|-------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                                                                              | Explosionsschutz – „e“<br>Schutz durch Gehäuse – „t“ |
| Gerätegruppe/Kategorie:                                           | Schutzart EN 60529: IP 68 bis 10 bar<br>II 2 G/ II 2D                                                                                     |                                                      |
| Einsetzbar in:                                                    | Zone 1, Zone 2, Zone 21 und 22<br>(leitender Staub)                                                                                       |                                                      |
| Normen:                                                           | EN IEC 60079-0:2018,<br>EN 60079-7:2015 + A1:2018,<br>EN 60079-31:2014                                                                    |                                                      |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 09 ATEX 1002 xx CE 0637<br>xx = Größe Anschlussgewinde                                                                                |                                                      |
| Kennzeichnung Gas:                                                | II 2G Ex eb IIC Gb                                                                                                                        |                                                      |
| Kennzeichnung Staub:                                              | II 2D Ex tb IIIC Db                                                                                                                       |                                                      |
| Kennzeichnung<br>extrem kleiner Bauteile:*                        | II 2G/II 2D CE 0637                                                                                                                       |                                                      |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 10.0003<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000368<br>CCC – 2021312313000369<br>CCC – 2021312313000370 |                                                      |

\* Kennzeichnung auf Produkt bis Größe M16.

### Explosion protection

|                                                    |                                                                                                                                           |                                                         |
|----------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                                                                               | Increased safety – „e“<br>Protection by enclosure – „t“ |
| Equipment group/category:<br>For use in:           | II 2 G/ II 2D<br>Zone 1, zone 2, zones 21 and 22<br>(conductive dust)                                                                     | Type of protection EN 60529: IP 68 up to 10 bar         |
| Standards:                                         | EN IEC 60079-0:2018,<br>EN 60079-7:2015 + A1:2018,<br>EN 60079-31:2014                                                                    |                                                         |
| Marking, certificate number<br>and test centre ID: | PTB 09 ATEX 1002 xx CE 0637<br>xx = size of connection thread                                                                             |                                                         |
| Gas marking:                                       | II 2G Ex eb IIC Gb                                                                                                                        |                                                         |
| Dust marking:                                      | II 2D Ex tb IIIC Db                                                                                                                       |                                                         |
| Marking on<br>extremely small components:*         | II 2G/II 2D CE 0637                                                                                                                       |                                                         |
| Other certificates:                                | IECEx – IECEx PTB 10.0003<br>EAC – RU C-DE.AJK58.B.01336/21<br>CCC – 2021312313000368<br>CCC – 2021312313000369<br>CCC – 2021312313000370 |                                                         |

\* Marking on product up to M16.

### Betriebstemperaturbereich:

Silikon –60 °C bis +180 °C

### Anwendung:

Die Ex e Blindstopfen Sechskant dienen zum Verschließen von nicht benutzten Gehäusebohrungen in einem Anschlussraum oder in einem Gehäuse eines explosionsgeschützten elektrischen Betriebsmittels der Gerätegruppe II und der Kategorien 2 G/D und 3 G/D. Erweiterungen und Reduzierungen dienen zur Aufnahme von Kabelverschraubungen. Der Anschlussraum oder das Gehäuse müssen der Zündschutzart „Erhöhte Sicherheit – Ex-e“ nach den Normen EN 60079-0, EN 60079-7 und EN 60079-31 entsprechen. Die Blindstopfen, Erweiterungen und Reduzierungen sind für Betriebsmittel mit dem Grad der mechanischen Gefahr „hoch“ nach EN 60079-0 geeignet. Bei ordnungsgemäßer Montage der Kabel- und Leitungseinführungen kann die Schutzart IP 68 nach EN 60529 erreicht werden.

### Operation temperature range:

Silicone –60 °C up to +180 °C

### Application:

Hexagonal Ex e blind plugs are used to seal unused holes leading into a terminal compartment or enclosure of explosion-proof electrical equipment of Equipment Group II and Categories 2 G/D and 3 G/D. The terminal compartment or enclosure must comply with type of protection “Ex e” for increased safety in accordance with EN 60079-0, EN 60079-7 and EN 60079-31. The blind plugs, extensions and reducers are suitable for equipment with a “high” risk of mechanical danger per EN 60079-0. When the cable glands are installed correctly, protection class IP 68 per EN 60529 can be achieved.

## K27. Ex-Erweiterungen Ex eb / Ex tb (Sechskant – M- auf M-Gewinde) – Messing

K27. Ex extensions Ex eb / Ex tb (hexagonal – M to M thread) – Brass

RoHS     



**Messing vernickelt**  
**Metrisches Anschlussgewinde auf metrisches Innengewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Brass, nickel-plated*  
*Metric connection and female threads according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

Abb. 1  
Fig. 1

**i Ausführung in Edelstahl und Messing bleifrei auf Anfrage**  
*Versions in stainless steel and lead-free brass available on request*

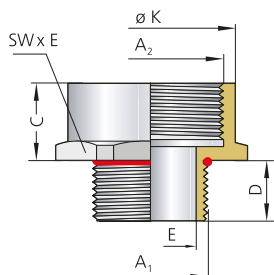


Abb. 2  
Fig. 2

| Anschlussgewinde/-länge  |         | Innengewinde   | Art.-Nr.  | Bauhöhe         | Innendurchmesser | Außendurchmesser | Schlüsselweite |                                                                                     |
|--------------------------|---------|----------------|-----------|-----------------|------------------|------------------|----------------|-------------------------------------------------------------------------------------|
| Connection thread/length |         | Female thread  | Art. no.  | Mounting height | Inside diameter  | Outside diameter | Spanner width  |                                                                                     |
| A <sub>1</sub>           | D<br>mm | A <sub>2</sub> |           | C<br>mm         | E<br>mm          | Ø K<br>mm        | SW x E<br>mm   |  |
| M12x1,5                  | 5,0     | M16x1,5        | 8212216ex | 10,0            | 9,0              | 18               | 18x20          | 50                                                                                  |
| M16x1,5                  | 5,0     | M20x1,5        | 8216220ex | 10,5            | 13,0             | 22               | 22x24,4        | 50                                                                                  |
| M20x1,5                  | 6,0     | M25x1,5        | 8220225ex | 11,5            | 16,0             | 28               | 28x31,2        | 50                                                                                  |
| M20x1,5                  | 6,5     | M32x1,5        | 8220232ex | 12,5            | 16,0             | 35               | 35x38,5        | 50                                                                                  |
| M25x1,5                  | 7,0     | M32x1,5        | 8225232ex | 12,5            | 20,0             | 35               | 35x38,5        | 50                                                                                  |
| M32x1,5                  | 8,0     | M40x1,5        | 8232240ex | 14,5            | 28,0             | 43               | 43x47,3        | 25                                                                                  |
| M40x1,5                  | 8,0     | M50x1,5        | 8240250ex | 19,5            | 36,0             | 54               | 54x58          | 25                                                                                  |
| M50x1,5                  | 9,0     | M63x1,5        | 8250263ex | 22,0            | 44,0             | 68               | 68x74          | 10                                                                                  |
| M63x1,5                  | 10,0    | M75x1,5        | 8263275ex | 22,0            | 55,0             | 81               | 81x87          | 5                                                                                   |
|                          |         | M80x2,0        | 8263280ex | 26,0            | 55,0             | 90               | 90x96,5        | 5                                                                                   |

28400 | T10d700

**K27. Ex-Reduzierungen Ex eb / Ex tb (Sechskant – M- auf M-Gewinde) – Messing**

K27. Ex reducers Ex eb / Ex tb (hexagonal – M to M thread) – Brass



**Messing vernickelt/Edelstahl 1.4305**  
**Metrisches Außen- und Innengewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Brass, nickel-plated/stainless steel AISI 303*  
*Metric connection male and female threads according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

**i Ausführung in Edelstahl und Messing bleifrei auf Anfrage**  
*Versions in stainless steel and lead-free brass available on request*

Abb. 1  
Fig. 1

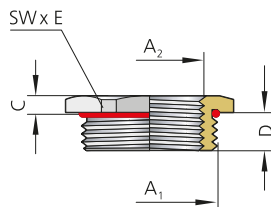


Abb. 2  
Fig. 2

| Anschlussgewinde/-länge<br>Connection thread/length<br><b>A<sub>1</sub></b> | <b>D</b><br>mm | Innengewinde<br>Female thread<br><b>A<sub>2</sub></b> | Art.-Nr.<br>Art. no.<br><b>Mit O-Ring</b><br>With o-ring | Bauhöhe<br>Mounting height<br><b>C</b><br>mm | Schlüsselweite<br>Spanner width<br><b>SW x E</b><br>mm |    |
|-----------------------------------------------------------------------------|----------------|-------------------------------------------------------|----------------------------------------------------------|----------------------------------------------|--------------------------------------------------------|----|
| M16x1,5                                                                     | 6,0            | M12x1,5                                               | 80.216/212ex                                             | 3,0                                          | 18x20,2                                                | 50 |
| M20x1,5                                                                     | 6,5            | M12x1,5                                               | 80.220/212ex                                             | 3,0                                          | 22x24,4                                                | 50 |
|                                                                             |                | M16x1,5                                               | 80.220/216ex                                             | 3,0                                          | 22x24,4                                                | 50 |
| M25x1,5                                                                     | 7,0            | M16x1,5                                               | 80.225/216ex                                             | 3,0                                          | 28x31,2                                                | 50 |
|                                                                             |                | M20x1,5                                               | 80.225/220ex                                             | 3,0                                          | 28x31,2                                                | 50 |
| M32x1,5                                                                     | 8,0            | M16x1,5                                               | 80.232/216ex                                             | 4,0                                          | 35x38,5                                                | 25 |
|                                                                             |                | M20x1,5                                               | 80.232/220ex                                             | 4,0                                          | 35x38,5                                                | 25 |
|                                                                             |                | M25x1,5                                               | 80.232/225ex                                             | 4,0                                          | 35x38,5                                                | 25 |
| M40x1,5                                                                     | 9,0            | M25x1,5                                               | 80.240/225ex                                             | 4,0                                          | 43x47,5                                                | 25 |
|                                                                             |                | M32x1,5                                               | 80.240/232ex                                             | 4,0                                          | 43x47,5                                                | 25 |
| M50x1,5                                                                     | 10,0           | M32x1,5                                               | 80.250/232ex                                             | 4,0                                          | 54x58                                                  | 10 |
|                                                                             |                | M40x1,5                                               | 80.250/240ex                                             | 4,0                                          | 54x58                                                  | 10 |
| M63x1,5                                                                     | 10,0           | M40x1,5                                               | 80.263/240ex                                             | 4,0                                          | 68x74                                                  | 10 |
|                                                                             |                | M50x1,5                                               | 80.263/250ex                                             | 4,0                                          | 68x74                                                  | 10 |
| M72x2,0                                                                     | 12,0           | M50x1,5                                               | 80.272/250ex                                             | 5,0                                          | 80x86                                                  | 5  |
|                                                                             |                | M63x1,5                                               | 80.272/263ex                                             | 5,0                                          | 80x86                                                  | 5  |
| M75x1,5                                                                     | 15,0           | M63x1,5                                               | 80.275/263ex                                             | 8,0                                          | 90x96                                                  | 5  |
| M80x2,0                                                                     | 10,0           | M63x1,5                                               | 80.280/263ex                                             | 8,0                                          | 90x96                                                  | 5  |
|                                                                             |                | M72x2,0                                               | 80.280/272ex                                             | 8,0                                          | 90x96                                                  | 5  |
|                                                                             |                | M75x1,5                                               | 80.280/275ex                                             | 8,0                                          | 90x96                                                  | 5  |

283300 | T104600

## K27. Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Metrisches Gewinde) – Messing

K27. Ex blind plug Ex eb / Ex tb (hexagonal – Metric thread) – Brass

RoHS     



**Messing vernickelt**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Brass, nickel-plated*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

Abb. 1  
Fig. 1

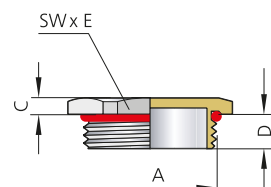


Abb. 2  
Fig. 2

| Normgröße<br>Nom. size<br><b>A</b> | <b>D</b><br>mm | Art.-Nr.<br>Art. no. | Bauhöhe<br>Mounting height<br><b>C</b><br>mm | Schlüsselweite<br>Spanner width<br><b>SW x E</b><br>mm |    |
|------------------------------------|----------------|----------------------|----------------------------------------------|--------------------------------------------------------|----|
| M12x1,5                            | 5,0            | 7212/DRex            | 4,0                                          | 14x15,5                                                | 50 |
| M16x1,5                            | 6,0            | 7216/DRex            | 3,0                                          | 18x20                                                  | 50 |
| M20x1,5                            | 6,5            | 7220/DRex            | 3,0                                          | 22x24,4                                                | 50 |
| M25x1,5                            | 6,5            | 7225/DRex            | 3,0                                          | 28x31,2                                                | 50 |
| M32x1,5                            | 7,0            | 7232/DRex            | 4,0                                          | 35x38,5                                                | 50 |
| M40x1,5                            | 8,0            | 7240/DRex            | 4,0                                          | 43x47,3                                                | 25 |
| M50x1,5                            | 10,0           | 7250/DRex            | 7,0                                          | 60x65                                                  | 10 |
| M63x1,5                            | 16,0           | 7263/DRex            | 8,0                                          | 68x74                                                  | 10 |
| M72x2,0                            | 16,0           | 7272/DRex            | 8,0                                          | 80x86                                                  | 5  |
| M75x1,5                            | 16,0           | 7275/DRex            | 8,0                                          | 90x96                                                  | 5  |
| M80x1,5                            | 16,0           | 7280/DRex            | 8,0                                          | 90x96                                                  | 5  |

18900 | TT01400

## K27. Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Metrisches Gewinde) – Edelstahl

K27. Ex blind plug Ex eb / Ex tb (hexagonal – Metric thread) – Stainless steel

RoHS     



**Edelstahl 1.4305**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Stainless steel AISI 303*  
*Metric connection thread according to EN 60423*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

Abb. 1  
Fig. 1

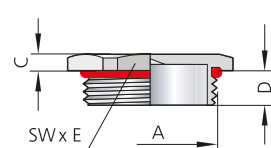


Abb. 2  
Fig. 2

| Normgröße<br>Nom. size<br><b>A</b> | <b>D</b><br>mm | Art.-Nr.<br>Art. no. | Bauhöhe<br>Mounting height<br><b>C</b><br>mm | Schlüsselweite<br>Spanner width<br><b>SW x E</b><br>mm |    |
|------------------------------------|----------------|----------------------|----------------------------------------------|--------------------------------------------------------|----|
| M12x1,5                            | 5,0            | 7212/DR/stex         | 3,0                                          | 14x15,5                                                | 50 |
| M16x1,5                            | 6,0            | 7216/DR/stex         | 3,0                                          | 19x21,1                                                | 50 |
| M20x1,5                            | 6,5            | 7220/DR/stex         | 3,0                                          | 22x24,4                                                | 50 |
| M25x1,5                            | 6,5            | 7225/DR/stex         | 3,0                                          | 28x31,2                                                | 50 |
| M32x1,5                            | 7,0            | 7232/DR/stex         | 3,5                                          | 36x39,7                                                | 50 |

18900 | TT01400

## K27. Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Pg-Gewinde) – Messing

K27. Ex blind plug Ex eb / Ex tb (hexagonal – Pg thread) – Brass

RoHS     



**Messing vernickelt**  
**Pg-Anschlussgewinde**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Brass, nickel-plated*  
*Pg connection thread*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

Abb. 1  
Fig. 1

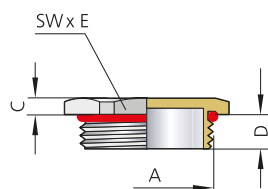


Abb. 2  
Fig. 2

| Norm. size | Art. no.    | Mounting height | Spanner width |    |
|------------|-------------|-----------------|---------------|----|
| A          |             | C               | SW x E        |    |
| mm         |             | mm              | mm            |    |
| Pg 7       | 749/07 DRex | 3,0             | 14x16         | 50 |
| Pg 9       | 750/09 DRex | 3,0             | 17x19,5       | 50 |
| Pg 11      | 751/11 DRex | 3,0             | 20x22,5       | 50 |
| Pg 13,5    | 752/13 DRex | 3,0             | 22x24,4       | 50 |
| Pg 16      | 753/16 DRex | 3,0             | 24x26,7       | 50 |
| Pg 21      | 754/21 DRex | 4,0             | 30x34         | 50 |
| Pg 29      | 755/29 DRex | 4,0             | 40x43,5       | 25 |
| Pg 36      | 756/36 DRex | 6,0             | 50x57         | 10 |

19/000 | TT01400

## K27. Ex-Blindstopfen Ex eb / Ex tb (Sechskant – Pg-Gewinde) – Edelstahl

K27. Ex blind plug Ex eb / Ex tb (hexagonal – Pg thread) – Stainless steel

RoHS     



**Edelstahl 1.4305**  
**Pg-Anschlussgewinde**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 68 bis 10 bar**  
**Temperaturbereich: –60 °C bis +180 °C**

*Stainless steel AISI 303*  
*Pg connection thread*  
*With o-ring made of silicone*  
*Type of protection IP 68 up to 10 bar*  
*Temperature range: –60 °C up to +180 °C*

Abb. 1  
Fig. 1

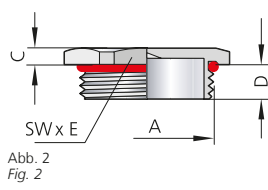


Abb. 2  
Fig. 2

| Norm. size | Art. no.     | Mounting height | Spanner width |    |
|------------|--------------|-----------------|---------------|----|
| A          |              | C               | SW x E        |    |
| mm         |              | mm              | mm            |    |
| Pg 7       | 749/07stDRex | 3,0             | 14x15,5       | 50 |
| Pg 9       | 750/09stDRex | 3,0             | 17x18,9       | 50 |
| Pg 11      | 751/11stDRex | 3,0             | 20x22,5       | 50 |
| Pg 13,5    | 752/13stDRex | 3,0             | 22x24,4       | 50 |
| Pg 16      | 753/16stDRex | 3,0             | 24x26,7       | 50 |
| Pg 21      | 754/21stDRex | 3,0             | 30x34         | 50 |

19/100 | TT01400

**blueglobe CLEAN Plus Ex-e II**

RoHS    



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Außenteile Edelstahl 1.4404, Innenteile Edelstahl 1.4305**  
**Inklusive Unterlegscheiben**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Schutzart IP 66, IP 68 bis 15 bar, IP 69**

*Outer parts stainless steel AISI 316L, inner parts stainless steel AISI 303*  
*Including washers*  
*Metric connection thread according to EN 60423*  
*Type of protection IP 66, IP 68 up to 15 bar, IP 69*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour            | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|----------------------------|--------------------------------------------------------------|
| VA 1.4404<br>AISI 316L                                | Blank                              | Silikon HTS                                       | Enzianblau<br>Gentian blue | -60 °C / +130 °C                                             |

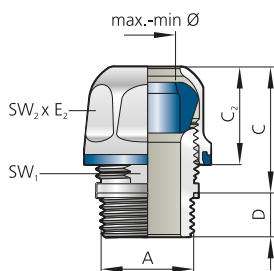


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Bauhöhe<br>Mounting height | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width                         |   |
|-----------------------------------------------------|---------|----------------------|-------------------------------|----------------------------|----------------------------|---------------------------------------------------------|---|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | C<br>mm                    | C <sub>2</sub><br>mm       | SW <sub>1</sub> /SW <sub>2</sub> x E <sub>2</sub><br>mm |   |
| M10x1,0                                             | 6,0     | bg 210VA HTS cp ex   | 7,0 – 5,0                     | 19,0                       | 15,0                       | 10/15x16,5                                              | 5 |
| M12x1,5                                             | 7,0     | bg 212VA HTS cp ex   | 7,0 – 5,0                     | 19,0                       | 15,0                       | 110/17x19,4                                             | 5 |
| M16x1,5                                             | 9,0     | bg 216VA HTS cp ex   | 9,0 – 7,0                     | 21,0                       | 18,0                       | 14/20x23,4                                              | 5 |
| M20x1,5                                             | 9,0     | bg 220VA HTS cp ex   | 12,0 – 9,0                    | 21,0                       | 21,0                       | 19/24x27,4                                              | 5 |
| M25x1,5                                             | 10,0    | bg 225VA HTS cp ex   | 18,0 – 15,0                   | 27,0                       | 23,0                       | 24/30x33,4                                              | 5 |
| M32x1,5                                             | 11,0    | bg 232VA HTS cp ex   | 23,0 – 20,0                   | 27,0                       | 24,0                       | 30/36x39,4                                              | 5 |
| M40x1,5                                             | 11,0    | bg 240VA HTS cp ex   | 29,0 – 26,0                   | 32,0                       | 28,0                       | 36/45x48,4                                              | 4 |

54500 | TT10200

| Explosionsschutz                                                  |                                                                                                                                                                                                                             |  | Explosion protection                               |                                                                                                                                                                                                                                    |  |
|-------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
| Zündschutzart:                                                    | Gas Explosionsgeschützt – „e“<br>Staub Schutz durch Gehäuse – „t“<br>Schutzart EN 60529/IEC 529: IP 66,<br>IP 68 bis 15 bar, IP 69                                                                                          |  | Ignition protection type:                          | Gas Increased safety – “e”<br>Dust Protection by enclosure – “t”<br>Type of protection EN 60529/IEC 529: IP 66,<br>IP 68 up to 15 bar, IP 69                                                                                       |  |
| Gerätegruppe/Kategorie:<br>Einsetzbar in:                         | II 2 G/II 1 D<br>Zone 1, Zone 2, Zone 20, 21 und 22<br>(leitender Staub)                                                                                                                                                    |  | Equipment group/category:<br>For use in:           | II 2 G/II 1 D<br>Zone 1, zone 2, zones 20, 21 and 22<br>(conductive dust)                                                                                                                                                          |  |
| Normen:                                                           | IEC 60079-0:2017, EN 60079-7:2015,<br>EN 60079-31:2014                                                                                                                                                                      |  | Standards:                                         | IEC 60079-0:2017, EN 60079-7:2015,<br>EN 60079-31:2014                                                                                                                                                                             |  |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: |  PTB 18 ATEX 1013X xx <br>xx = Größe Anschlussgewinde |  | Marking, certificate number<br>and test centre ID: |  PTB 18 ATEX 1013X xx <br>xx = size of connection thread |  |
| Kennzeichnung Gas:                                                |  II 2G Ex eb IIC Gb                                                                                                                      |  | Gas marking:                                       |  II 2G Ex eb IIC Gb                                                                                                                           |  |
| Kennzeichnung Staub:                                              |  II 1D Ex ta IIIC Da                                                                                                                     |  | Dust marking:                                      |  II 1D Ex ta IIIC Da                                                                                                                          |  |
| Kennzeichnung<br>extrem kleiner Bauteile:*                        |  II 2G/II 1D                                          |  | Marking on<br>extremely small components:*         |  II 2G/II 1D                                             |  |
| Weitere Zertifikate:                                              | IECEX – IECEX PTB 18.0026X<br>CCC 2021312313000361                                                                                                                                                                          |  | Other certificates:                                | IECEX – IECEX PTB 18.0026X<br>CCC 2021312313000361                                                                                                                                                                                 |  |
| * Kennzeichnung auf Kabelverschraubung.                           |                                                                                                                                                                                                                             |  | * Marking on cable gland.                          |                                                                                                                                                                                                                                    |  |

## Ex-Zulassung: Typ LevelEx

Ex approval: Type LevelEx



Abb. 1  
Fig. 1

### Werkstoff

|                                 |                      |                         |
|---------------------------------|----------------------|-------------------------|
| Verschraubung:                  | Messing<br>Edelstahl | vernickelt<br>VA 1.4404 |
| Dichteinsatz:                   | Silikon              | Farbe: Rotbraun         |
| Anschlussgewinde-<br>Dichtring: | Silikon              | Farbe: Rot              |

### Explosionsschutz

|                                                                   |                                                                                                                                                                                                     |                                                                                                                                                                                      |
|-------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                                                                                                                                        | Explosionsschutz – „d“, „e“<br>Schutz durch Gehäuse – „t“<br>Schwagensicherheit: Geräteschutz durch<br>Zündschutzart – „n“<br>Schutzart EN 60529: IP 66, IP 68<br>(10 bar, 1 Stunde) |
| Gerätegruppe/Kategorie:                                           | II 2 G/II 1D                                                                                                                                                                                        |                                                                                                                                                                                      |
| Einsetzbar in:                                                    | Zone 1, Zone 2, Zone 20, Zone 21 und 22<br>(leitender Staub)                                                                                                                                        |                                                                                                                                                                                      |
| Normen:                                                           | EN IEC 60079-0:2018, EN 60079-1:2014<br>EN IEC 60079-7:2015 + A1:2018 und<br>EN 60079-31:2014                                                                                                       |                                                                                                                                                                                      |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | IEBxU 24 ATEX 1064X CE 0637<br>xx = Größe Anschlussgewinde                                                                                                                                          |                                                                                                                                                                                      |
| Kennzeichnung Gas:                                                | II 2G Ex db eb IIC Gb                                                                                                                                                                               |                                                                                                                                                                                      |
| Kennzeichnung Schwagensicherheit:                                 | II 3 G Ex nR IIC Gc                                                                                                                                                                                 |                                                                                                                                                                                      |
| Kennzeichnung Staub:                                              | II 1D Ex ta IIC Da IP 66/68                                                                                                                                                                         |                                                                                                                                                                                      |
| Weitere Zertifikate:                                              | IECEx IBE 24.0018X<br>EAC – RU C-DE.AA71.B.00390<br>VDE – 40048659<br>DNV GL – TAC000036Y<br>CCC – 2021312313000360<br>Kosha – 19-AV4BO – 0379X<br>UL – E510939 (LevelEx)<br>UKCA – CML 22UKEX1506X |                                                                                                                                                                                      |

Die **Kabelverschraubung LevelEx** für nicht armierte Kabel und Leitungen und **LevelEx AC** für armierte Kabel und Leitungen dienen zur Einführung eines Kabels oder einer Leitung in explosionsgeschützte, elektrische Betriebsmittel (Anschlussräume) der Zündschutzarten druckfeste Kapselung „d“, erhöhte Sicherheit „e“ und Schutz durch Gehäuse „t“. Die Schutzarten sind IP 66 und IP 68 (10 bar, 1 Stunde). Bei der LevelEx AC sorgt der außenliegende Dichtring für eine zusätzliche Deluge-Dichtigkeit.

Bei metrischen Ausführungen ist am Anschlussgewinde standardmäßig eine integrierte O-Ring-Dichtung vorgesehen.

### Betriebstemperaturbereich:

Silikon –60 °C bis +130 °C (UL: –60 °C bis +60 °C)

Die LevelEx Kabelverschraubungen Ex d sind erhältlich mit **verschiedenen Anschlussgewinden:**

M-Gewinde Standard, ISO 965-1 und ISO 965-3

NPT-Gewinde, ANSI/ASME B1.20.1

### Besondere Bedingungen:

Bei Verwendung der Druckschraube ohne Zugentlastungsdruckschraube dürfen nur festverlegte Kabel und Leitungen eingeführt werden. Der Betreiber muss eine entsprechende Zugentlastung gewährleisten. Die Schutzart IP 66/IP 68 wird nur bei sachgerechtem Einbau von Dichtung und Kabel- und Leitungseinführungen erreicht. Die Hinweise des Herstellers sind zu beachten.

### Varianten:

- LevelEx Kabelverschraubung Ex db / Ex eb / Ex ta (metrisch und NPT)
- LevelEx TRI Kabelverschraubung Ex db / Ex eb / Ex ta (metrisch und NPT)
- LevelEx AC Kabelverschraubung Ex db / Ex eb / Ex ta (metrisch und NPT)

### Variants:

- LevelEx cable gland Ex db / Ex eb / Ex ta (metric and NPT)
- LevelEx TRI cable gland Ex db / Ex eb / Ex ta (metric and NPT)
- LevelEx AC cable gland Ex db / Ex eb / Ex ta (metric and NPT)

### Material

|                                    |                          |                            |
|------------------------------------|--------------------------|----------------------------|
| Gland:                             | Brass<br>Stainless steel | Nickel-plated<br>AISI 316L |
| Sealing insert:                    | Silicone                 | Colour: reddish-brown      |
| Connection thread<br>sealing ring: | Silicone                 | Colour: red                |

### Explosion protection

|                                                    |                                                                                                                                                                                                     |                                                                                                                                                             |
|----------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                                                                                                                                         | Increased safety – “d”, “e”<br>Protection by enclosure – “t”<br>Restricted breathing – “n”<br>Type of protection EN 60529: IP 66,<br>IP 68 (10 bar, 1 hour) |
| Equipment group/category:                          | II 2 G/II 1D                                                                                                                                                                                        |                                                                                                                                                             |
| For use in:                                        | Zone 1, zone 2, zone 20, zones 21 and 22<br>(conductive dust)                                                                                                                                       |                                                                                                                                                             |
| Standards:                                         | EN IEC 60079-0:2018, EN 60079-1:2014<br>EN IEC 60079-7:2015 + A1:2018 and<br>EN 60079-31:2014                                                                                                       |                                                                                                                                                             |
| Marking, certificate number<br>and test centre ID: | IEBxU 24 ATEX 1064X CE 0637<br>xx = size of connection thread                                                                                                                                       |                                                                                                                                                             |
| Gas marking:                                       | II 2G Ex db eb IIC Gb                                                                                                                                                                               |                                                                                                                                                             |
| Restricted breathing marking:                      | II 3 G Ex nR IIC Gc                                                                                                                                                                                 |                                                                                                                                                             |
| Dust marking:                                      | II 1D Ex ta IIC Da IP 66/68                                                                                                                                                                         |                                                                                                                                                             |
| Other certificates:                                | IECEx IBE 24.0018X<br>EAC – RU C-DE.AA71.B.00390<br>VDE – 40048659<br>DNV GL – TAC000036Y<br>CCC – 2021312313000360<br>Kosha – 19-AV4BO – 0379X<br>UL – E510939 (LevelEx)<br>UKCA – CML 22UKEX1506X |                                                                                                                                                             |

The **LevelEx cable gland** for non-armoured cables and the **LevelEx AC gland** for armoured cables are used to insert a cable or line into explosion-proof electrical equipment (terminal compartments) of protection type “d” for flameproof enclosure, type “e” for increased safety and type “t” for protection by enclosure. The types of protection achieved are IP 66 and IP 68 (at 10 bar for 1 hour). In the case of the LevelEx AC, the external sealing ring provides additional deluge tightness.

On metric versions, an o-ring seal is integrated on the connection thread as standard.

### Operating temperature range:

Silicone –60 °C to +130 °C (UL: –60 °C up to +60 °C)

The LevelEx cable glands Ex d are available with **various connection threads:**

M thread standard, ISO 965-1 and ISO 965-3

NPT thread, ANSI/ASME B1.20.1

### Special conditions:

Only fixed cables may be inserted if the pressure screw is used without strain relief. The operator must ensure appropriate strain relief. IP 66/IP 68 is only attained if the seal and the cable glands are properly assembled. The manufacturer's instructions must be observed.

## LevelEx Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx cable gland Ex db / Ex eb / Ex ta

RoHS         



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Metric connection thread according to ISO 965-1 and ISO 965-3  
With o-ring made of silicone  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

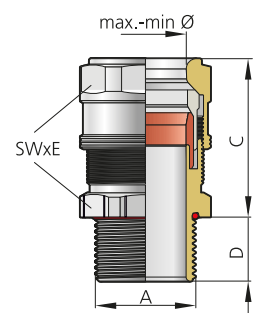


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length<br>A | D<br>mm | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range<br>max./min. Ø<br>mm | Bauhöhe<br>Mounting height<br>C<br>mm | Schlüsselweite<br>Spanner width<br>SW x E<br>mm |    |
|----------------------------------------------------------|---------|----------------------|----------------------------------------------------|---------------------------------------|-------------------------------------------------|----|
| M16x1,5                                                  | 16,0    | Lex 216ms 8 HTS*     | 8,0 – 3,0                                          | 32,0                                  | 20x22                                           | 10 |
|                                                          |         | Lex 216ms HTS        | 11,0 – 7,0                                         | 32,0                                  | 20x22                                           | 10 |
| M20x1,5                                                  | 16,0    | Lex 220ms HTS        | 14,0 – 8,0                                         | 37,0                                  | 24x26                                           | 10 |
| M25x1,5                                                  | 16,0    | Lex 225ms HTS        | 20,0 – 12,5                                        | 40,0                                  | 30x32,5                                         | 10 |
| M32x1,5                                                  | 16,0    | Lex 232ms HTS        | 26,0 – 18,5                                        | 43,0                                  | 36x39                                           | 10 |
| M40x1,5                                                  | 16,0    | Lex 240ms HTS        | 34,0 – 26,0                                        | 46,5                                  | 46x50                                           | 5  |
| M50x1,5                                                  | 16,0    | Lex 250ms HTS        | 45,0 – 33,0                                        | 51,0                                  | 60x64                                           | 5  |
| M63x1,5                                                  | 16,0    | Lex 263ms HTS        | 56,0 – 44,0                                        | 55,0                                  | 70x74                                           | 1  |
| M75x1,5                                                  | 19,0    | Lex 275ms HTS        | 66,0 – 56,0                                        | 58,0                                  | 81x87                                           | 1  |

\* ausschließlich ATEX und IECEx zertifiziert  
\* only ATEX and IECEx certified

52860 | IT00720

## LevelEx Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx cable gland Ex db / Ex eb / Ex ta

RoHS         



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Stainless steel  
Metric connection thread according to ISO 965-1 and ISO 965-3  
With o-ring made of silicone  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| VA 1.4404<br>AISI 316L                                | Blank                              | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

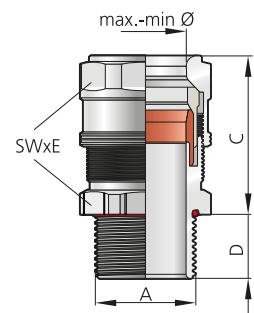


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length<br>A | D<br>mm | Art.-Nr.<br>Art. no.  | Dichtbereich<br>Sealing range<br>max./min. Ø<br>mm | Bauhöhe<br>Mounting height<br>C<br>mm | Schlüsselweite<br>Spanner width<br>SW x E<br>mm |    |
|----------------------------------------------------------|---------|-----------------------|----------------------------------------------------|---------------------------------------|-------------------------------------------------|----|
| M16x1,5                                                  | 16,0    | Lex 216VA 8/316L HTS* | 8,0 – 3,0                                          | 32,0                                  | 20x22                                           | 10 |
|                                                          |         | Lex 216VA/316L HTS    | 11,0 – 7,0                                         | 32,0                                  | 20x22                                           | 10 |
| M20x1,5                                                  | 16,0    | Lex 220VA/316L HTS    | 14,0 – 8,0                                         | 37,0                                  | 24x26                                           | 10 |
| M25x1,5                                                  | 16,0    | Lex 225VA/316L HTS    | 20,0 – 12,5                                        | 40,0                                  | 30x32,5                                         | 10 |
| M32x1,5                                                  | 16,0    | Lex 232VA/316L HTS    | 26,0 – 18,5                                        | 43,0                                  | 36x39                                           | 10 |
| M40x1,5                                                  | 16,0    | Lex 240VA/316L HTS    | 34,0 – 26,0                                        | 46,5                                  | 46x50                                           | 5  |
| M50x1,5                                                  | 16,0    | Lex 250VA/316L HTS    | 45,0 – 33,0                                        | 51,0                                  | 60x64                                           | 5  |
| M63x1,5                                                  | 19,0    | Lex 263VA/316L HTS    | 56,0 – 44,0                                        | 55,0                                  | 70x74                                           | 1  |
| M75x1,5                                                  | 19,0    | Lex 275VA/316L HTS    | 66,0 – 56,0                                        | 58,0                                  | 81x87                                           | 1  |

\* ausschließlich ATEX und IECEx zertifiziert  
\* only ATEX and IECEx certified

52890 | IT00720

## LevelEx Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx cable gland Ex db / Ex eb / Ex ta

RoHS          



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Kegeliges NPT-Anschlussgewinde nach ANSI/ASME B1.20.1**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Conical NPT connection thread according to ANSI/ASME B1.20.1  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

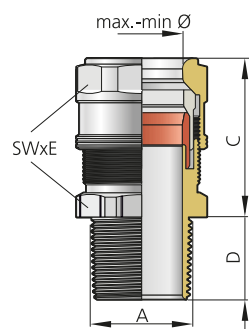


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range<br>max./min. ø<br>mm | Bauhöhe<br>Mounting height<br>C<br>mm | Schlüsselweite<br>Spanner width<br>SW x E<br>mm |  |
|-----------------------------------------------------|---------|----------------------|----------------------------------------------------|---------------------------------------|-------------------------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                      |                                                    |                                       |                                                 |                                                                                     |
| NPT3/8 (12H)                                        | 16,0    | Lex 3038ms 8 HTS*    | 8,0 – 3,0                                          | 32,0                                  | 20x22                                           | 10                                                                                  |
|                                                     |         | Lex 3038ms HTS       | 11,0 – 7,0                                         | 32,0                                  | 20x22                                           | 10                                                                                  |
| NPT1/2 (16H)                                        | 20,0    | Lex 3012ms HTS       | 14,0 – 8,0                                         | 37,0                                  | 24x26                                           | 10                                                                                  |
| NPT3/4 (21H)                                        | 20,5    | Lex 3034ms HTS       | 20,0 – 12,5                                        | 40,0                                  | 30x32,5                                         | 10                                                                                  |
| NPT1 (27H)                                          | 25,0    | Lex 3100ms HTS       | 26,0 – 18,5                                        | 43,0                                  | 36x39                                           | 10                                                                                  |
| NPT1 1/4 (35H)                                      | 26,0    | Lex 3114ms HTS       | 34,0 – 26,0                                        | 46,5                                  | 46x50                                           | 5                                                                                   |
| NPT2 (53H)                                          | 27,0    | Lex 3200ms HTS       | 45,0 – 33,0                                        | 51,0                                  | 68x72                                           | 1                                                                                   |
| NPT2 1/2 (63H)                                      | 40,0    | Lex 3212ms HTS       | 56,0 – 44,0                                        | 55,0                                  | 81x87                                           | 1                                                                                   |

\* ausschließlich ATEX und IECEx zertifiziert  
\* only ATEX and IECEx certified

53000 | TT00720

## LevelEx Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx cable gland Ex db / Ex eb / Ex ta

RoHS          



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl**  
**Kegeliges NPT-Anschlussgewinde nach ANSI/ASME B1.20.1**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Stainless steel  
Conical NPT connection thread according to ANSI/ASME B1.20.1  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| VA 1.4404<br>AISI 316L                                | Blank                              | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

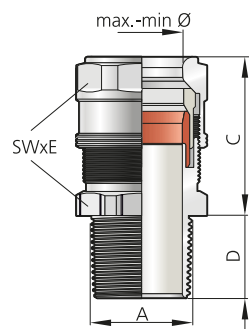


Abb. 3  
Fig. 3

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no.   | Dichtbereich<br>Sealing range<br>max./min. ø<br>mm | Bauhöhe<br>Mounting height<br>C<br>mm | Schlüsselweite<br>Spanner width<br>SW x E<br>mm |  |
|-----------------------------------------------------|---------|------------------------|----------------------------------------------------|---------------------------------------|-------------------------------------------------|---------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                        |                                                    |                                       |                                                 |                                                                                       |
| NPT3/8" (12H)                                       | 16,0    | Lex 3038VA 8/316L HTS* | 8,0 – 3,0                                          | 32,0                                  | 20x22                                           | 10                                                                                    |
|                                                     |         | Lex 3038VA/316L HTS    | 11,0 – 7,0                                         | 32,0                                  | 20x22                                           | 10                                                                                    |
| NPT1/2" (16H)                                       | 20,0    | Lex 3012VA/316L HTS    | 14,0 – 8,0                                         | 37,0                                  | 24x26                                           | 10                                                                                    |
| NPT3/4" (21H)                                       | 20,5    | Lex 3034VA/316L HTS    | 20,0 – 12,5                                        | 40,0                                  | 30x32,5                                         | 10                                                                                    |
| NPT1" (27H)                                         | 25,0    | Lex 3100VA/316L HTS    | 26,0 – 18,5                                        | 43,0                                  | 36x39                                           | 10                                                                                    |
| NPT1 1/4" (35H)                                     | 26,0    | Lex 3114VA/316L HTS    | 34,0 – 26,0                                        | 46,5                                  | 46x50                                           | 5                                                                                     |
| NPT2" (53H)                                         | 27,0    | Lex 3200VA/316L HTS    | 45,0 – 33,0                                        | 51,0                                  | 68x72                                           | 1                                                                                     |
| NPT2 1/2" (63H)                                     | 40,0    | Lex 3212VA/316L HTS    | 56,0 – 44,0                                        | 55,0                                  | 81x87                                           | 1                                                                                     |

\* ausschließlich ATEX und IECEx zertifiziert  
\* only ATEX and IECEx certified

53100 | TT00720

# LevelEx TRI EMV-Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx TRI EMC cable gland Ex db / Ex eb / Ex ta



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

*Brass, nickel-plated*  
*Metric connection thread according to ISO 965-1 and ISO 965-3*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 (10 bar, 1 hour)*

**i Ausführung in Edelstahl und Messing bleifrei auf Anfrage**  
*Versions in stainless steel and lead-free brass available on request*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

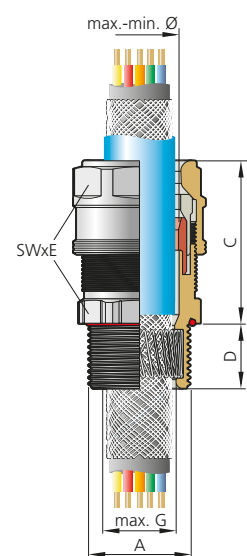


Abb. 3 – Variante A: abgesetzter Außenmantel  
Fig. 3 – Method A: offset outer sheath

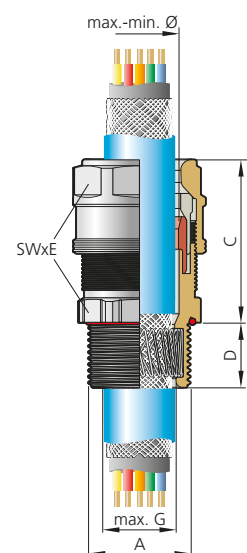


Abb. 4 – Variante B: durchgängiger Außenmantel  
Fig. 4 – Method B: continuous outer sheath

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. | Dichtbereich<br>Sealing range | Schirmbereich<br>Screening range | Durchlass Bauhöhe<br>Passage | Montage<br>höhe<br>C | Spanner<br>weite<br>SW x E |    |
|-----------------------------------------------------|---------|----------------------|-------------------------------|----------------------------------|------------------------------|----------------------|----------------------------|----|
| A                                                   | D<br>mm |                      | max./min. ø<br>mm             | max./min. ø<br>mm                | max. G<br>mm                 | mm                   | mm                         |    |
| M16x1,5                                             | 16,0    | Lex 216ms 8 tri HTS* | 8,0 – 3,0                     | 7,0 – 5,0                        | 9,3                          | 32,0                 | 20x22                      | 10 |
|                                                     |         | Lex 216ms tri HTS    | 11,0 – 7,0                    | 9,0 – 5,0                        | 9,3                          | 32,0                 | 20x22                      | 10 |
| M20x1,5                                             | 16,0    | Lex 220ms tri HTS    | 14,0 – 8,0                    | 12,0 – 7,0                       | 12,3                         | 37,0                 | 24x26                      | 10 |
| M25x1,5                                             | 16,0    | Lex 225ms tri HTS    | 20,0 – 12,5                   | 16,0 – 10,0                      | 17,3                         | 40,0                 | 30x32,5                    | 10 |
| M32x1,5                                             | 16,0    | Lex 232ms tri HTS    | 26,0 – 18,5                   | 20,0 – 13,0                      | 21,3                         | 43,0                 | 36x39                      | 10 |
| M40x1,5                                             | 16,0    | Lex 240ms tri HTS    | 34,0 – 26,0                   | 28,0 – 20,0                      | 28,5                         | 46,5                 | 46x50                      | 5  |
| M50x1,5                                             | 16,0    | Lex 250ms tri HTS    | 45,0 – 33,0                   | 37,0 – 28,0                      | 37,3                         | 51,0                 | 60x64                      | 5  |
| M63x1,5                                             | 16,0    | Lex 263ms tri HTS    | 56,0 – 44,0                   | 46,0 – 37,0                      | 47,5                         | 55,0                 | 70x74                      | 1  |

\* ausschließlich ATEX und IECEx zertifiziert  
\* only ATEX and IECEx certified

**i Es sind zwei Montagevarianten möglich (siehe Abbildung Variante A und B). Bei Variante B kann der max. Kabeldurchmesser durch den unteren Durchlass (G) eingeschränkt sein.**  
*Two installation methods are possible (see figure illustrating methods A and B). With method B, the maximum cable diameter may be restricted by the lower passage (G).*

**i Für das Einführen des Kabels wird für den oberen Schirmbereich die Verwendung einer Montagehülse empfohlen, siehe Seite 209**  
*We recommend using an assembly sleeve to feed the cable at the top of the screening range, see page 209*

**LevelEx AC Kabelverschraubung Ex db / Ex eb / Ex ta**

LevelEx AC cable gland Ex db / Ex eb / Ex ta



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Metric connection thread according to ISO 965-1 and ISO 965-3  
With o-ring made of silicone  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

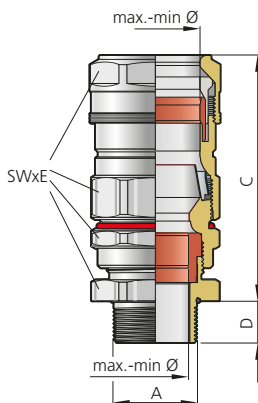


Abb. 3  
Fig. 3

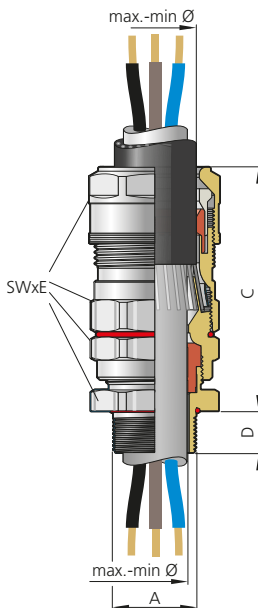


Abb. 4  
Fig. 4

| Anschlussgewinde/-länge<br>Connection thread/length |      | Art.-Nr.<br>Art. no. | Dichtbereich innen<br>Inner sealing range | Dichtbereich außen<br>Outer sealing range | Armierung<br>Armouring | Band/Geflecht<br>Tape/braiding | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |    |
|-----------------------------------------------------|------|----------------------|-------------------------------------------|-------------------------------------------|------------------------|--------------------------------|----------------------------|---------------------------------|----|
| A                                                   | D mm |                      | max./min. ø mm                            | max./min. ø mm                            | max./min. mm           | max./min. mm                   | C mm                       | SW x E mm                       |    |
| M16x1,5                                             | 16,0 | LexAC 216ms1407 HTS  | 6,5 – 4,0                                 | 14,0 – 8,0                                | 1,25 – 0,90            | 0,10 – 1,25                    | 69,0                       | 24x26,5                         | 10 |
|                                                     |      | LexAC 216ms1409 HTS  | 9,5 – 6,5                                 | 14,0 – 8,0                                | 1,25 – 0,90            | 0,10 – 1,25                    | 69,0                       | 24x26,5                         | 10 |
|                                                     |      | LexAC 216ms1411 HTS  | 10,5 – 7,0                                | 14,0 – 8,0                                | 1,25 – 0,90            | 0,10 – 1,25                    | 69,0                       | 24x26,5                         | 10 |
| M20x1,5                                             | 16,0 | LexAC 220ms2009 HTS  | 9,5 – 6,5                                 | 20,0 – 12,5                               | 1,25 – 0,90            | 0,10 – 1,25                    | 74,0                       | 30x32,5                         | 10 |
|                                                     |      | LexAC 220ms2014 HTS  | 14,0 – 9,0                                | 20,0 – 12,5                               | 1,25 – 0,90            | 0,10 – 1,25                    | 74,0                       | 30x32,5                         | 10 |
| M25x1,5                                             | 16,0 | LexAC 225ms2616 HTS  | 15,5 – 11,5                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,30 – 1,60                    | 84,0                       | 36x39                           | 10 |
|                                                     |      | LexAC 225ms2618 HTS  | 18,0 – 14,0                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,30 – 1,60                    | 84,0                       | 36x39                           | 10 |
|                                                     |      | LexAC 225ms2620 HTS  | 20,5 – 17,0                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,30 – 1,60                    | 84,0                       | 36x39                           | 10 |
| M32x1,5                                             | 16,0 | LexAC 232ms3420 HTS  | 20,5 – 17,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 0,60 – 2,00                    | 97,0                       | 46x49                           | 5  |
|                                                     |      | LexAC 232ms3425 HTS  | 25,0 – 20,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 0,60 – 2,00                    | 97,0                       | 46x49                           | 5  |
|                                                     |      | LexAC 232ms3426 HTS  | 26,0 – 24,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 0,60 – 2,00                    | 97,0                       | 46x49                           | 5  |
| M40x1,5                                             | 16,0 | LexAC 240ms4528 HTS  | 28,0 – 24,0                               | 45,0 – 33,0                               | 2,00 – 1,60            | 0,60 – 2,00                    | 110,0                      | 60x64                           | 2  |
|                                                     |      | LexAC 240ms4534 HTS  | 34,0 – 26,0                               | 45,0 – 33,0                               | 2,00 – 1,60            | 0,60 – 2,00                    | 110,0                      | 60x64                           | 2  |
| M50x1,5                                             | 16,0 | LexAC 250ms5637 HTS  | 37,0 – 28,0                               | 56,0 – 44,0                               | 2,50 – 2,00            | 0,90 – 2,50                    | 125,0                      | 70x74                           | 2  |
|                                                     |      | LexAC 250ms5644 HTS  | 44,0 – 35,0                               | 56,0 – 44,0                               | 2,50 – 2,00            | 0,90 – 2,50                    | 125,0                      | 70x74                           | 2  |
| M63x1,5                                             | 18,0 | LexAC 263ms6644 HTS  | 44,0 – 35,0                               | 66,0 – 56,0                               | 2,50 – 2,00            | 1,50 – 2,50                    | 154,0                      | 81x87                           | 1  |
|                                                     |      | LexAC 263ms6656 HTS  | 56,0 – 45,0                               | 66,0 – 56,0                               | 2,50 – 2,00            | 1,50 – 2,50                    | 154,0                      | 81x87                           | 1  |

650003 | TT12900

# LevelEx AC Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx AC cable gland Ex db / Ex eb / Ex ta



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Edelstahl**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Mit O-Ring aus Silikon**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

*Stainless steel*  
*Metric connection thread according to ISO 965-1 and ISO 965-3*  
*With o-ring made of silicone*  
*Type of protection IP 66, IP 68 (10 bar, 1 hour)*

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| VA 1.4404<br>AISI 316L                                | Blank                              | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

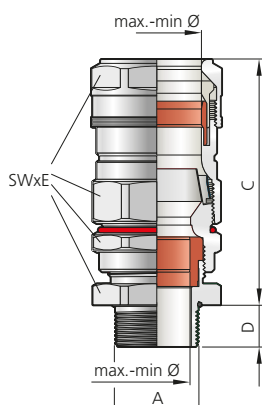


Abb. 3  
Fig. 3

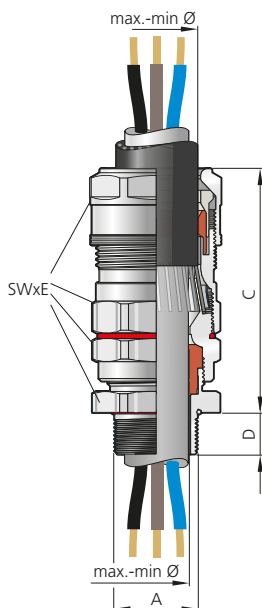


Abb. 4  
Fig. 4

| Anschlussgewinde/-länge<br>Connection thread/length |      | Art.-Nr.<br>Art. no.     | Dichtbereich innen<br>Inner sealing range | Dichtbereich außen<br>Outer sealing range | Armierung<br>Armouring | Band/Ge-<br>flecht<br>Tape/braiding | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |
|-----------------------------------------------------|------|--------------------------|-------------------------------------------|-------------------------------------------|------------------------|-------------------------------------|----------------------------|---------------------------------|
| A                                                   | D mm |                          | max./min. ø mm                            | max./min. ø mm                            | max./min. mm           | max./min. mm                        | C mm                       | SW x E mm                       |
| M16x1,5                                             | 16,0 | LexAC 216VA1407/316L HTS | 6,5 – 4,0                                 | 14,0 – 8,0                                | 1,25 – 0,90            | 0,40 – 1,25                         | 69,0                       | 24x26,5 10                      |
|                                                     |      | LexAC 216VA1409/316L HTS | 9,5 – 6,5                                 | 14,0 – 8,0                                | 1,25 – 0,90            | 0,40 – 1,25                         | 69,0                       | 24x26,5 10                      |
|                                                     |      | LexAC 216VA1411/316L HTS | 10,5 – 7,0                                | 14,0 – 8,0                                | 1,25 – 0,90            | 0,40 – 1,25                         | 69,0                       | 24x26,5 10                      |
| M20x1,5                                             | 16,0 | LexAC 220VA2009/316L HTS | 9,5 – 6,5                                 | 20,0 – 12,5                               | 1,25 – 0,90            | 0,40 – 1,25                         | 74,0                       | 30x32,5 10                      |
|                                                     |      | LexAC 220VA2014/316L HTS | 14,0 – 9,0                                | 20,0 – 12,5                               | 1,25 – 0,90            | 0,40 – 1,25                         | 74,0                       | 30x32,5 10                      |
| M25x1,5                                             | 16,0 | LexAC 225VA2616/316L HTS | 15,5 – 11,5                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,60 – 1,60                         | 84,0                       | 36x39 10                        |
|                                                     |      | LexAC 225VA2618/316L HTS | 18,0 – 14,0                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,60 – 1,60                         | 84,0                       | 36x39 10                        |
|                                                     |      | LexAC 225VA2620/316L HTS | 20,5 – 17,0                               | 26,0 – 18,5                               | 1,60 – 1,25            | 0,60 – 1,60                         | 84,0                       | 36x39 10                        |
| M32x1,5                                             | 16,0 | LexAC 232VA3420/316L HTS | 20,5 – 17,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 1,00 – 2,00                         | 97,0                       | 46x49 5                         |
|                                                     |      | LexAC 232VA3425/316L HTS | 25,0 – 20,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 1,00 – 2,00                         | 97,0                       | 46x49 5                         |
|                                                     |      | LexAC 232VA3426/316L HTS | 26,0 – 24,0                               | 34,0 – 26,0                               | 2,00 – 1,60            | 1,00 – 2,00                         | 97,0                       | 46x49 5                         |
| M40x1,5                                             | 16,0 | LexAC 240VA4528/316L HTS | 28,0 – 24,0                               | 45,0 – 33,0                               | 2,00 – 1,60            | 1,00 – 2,00                         | 110,0                      | 60x64 2                         |
|                                                     |      | LexAC 240VA4534/316L HTS | 34,0 – 26,0                               | 45,0 – 33,0                               | 2,00 – 1,60            | 1,00 – 2,00                         | 110,0                      | 60x64 2                         |
| M50x1,5                                             | 16,0 | LexAC 250VA5637/316L HTS | 37,0 – 28,0                               | 56,0 – 44,0                               | 2,50 – 2,00            | 1,30 – 2,50                         | 125,0                      | 70x74 2                         |
|                                                     |      | LexAC 250VA5644/316L HTS | 44,0 – 35,0                               | 56,0 – 44,0                               | 2,50 – 2,00            | 1,30 – 2,50                         | 125,0                      | 70x74 2                         |
| M63x1,5                                             | 18,0 | LexAC 263VA6644/316L HTS | 44,0 – 35,0                               | 66,0 – 56,0                               | 2,50 – 2,00            | 1,50 – 2,50                         | 154,0                      | 81x87 1                         |
|                                                     |      | LexAC 263VA6656/316L HTS | 56,0 – 45,0                               | 66,0 – 56,0                               | 2,50 – 2,00            | 1,50 – 2,50                         | 154,0                      | 81x87 1                         |

60100 | TT12900

# LevelEx AC Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx AC cable gland Ex db / Ex eb / Ex ta



Abb. 1  
Fig. 1



Abb. 2  
Fig. 2

**Messing vernickelt**  
**Kegeliges NPT-Anschlussgewinde nach ANSI/ASME B1.20.1**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Conical NPT connection thread according to ANSI/ASME B1.20.1  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| Messing<br>Brass                                      | Vernickelt<br>Nickel-plated        | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

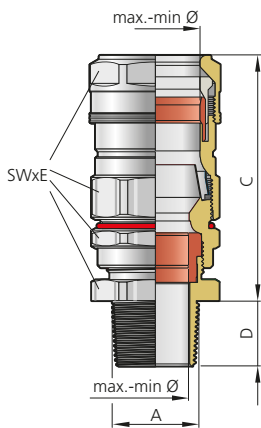


Abb. 3  
Fig. 3

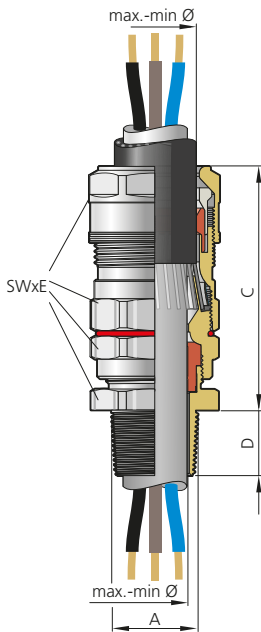


Abb. 4  
Fig. 4

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no.   | Dichtbereich innen<br>Inner sealing range |      | Dichtbereich außen<br>Outer sealing range |      | Armierung<br>Armouring | Band/Ge-<br>flecht<br>Tape/braiding | Bau-<br>höhe<br>Mount-<br>ing<br>height | Schlüs-<br>selweite<br>Spanner<br>width |                                                                                     |
|-----------------------------------------------------|---------|------------------------|-------------------------------------------|------|-------------------------------------------|------|------------------------|-------------------------------------|-----------------------------------------|-----------------------------------------|-------------------------------------------------------------------------------------|
| A                                                   | D<br>mm |                        | max./min. ø<br>mm                         |      | max./min. ø<br>mm                         |      | max./min.<br>mm        | max./min.<br>mm                     | C<br>mm                                 | SW x E<br>mm                            |  |
| NPT1/2" (16H)                                       | 20,0    | LexAC 301223ms1407 HTS | 6,5–                                      | 4,0  | 14,0–                                     | 8,0  | 1,25–0,90              | 0,10–1,25                           | 69,0                                    | 24x26,5                                 | 10                                                                                  |
|                                                     |         | LexAC 301223ms1409 HTS | 9,5–                                      | 6,5  | 14,0–                                     | 8,0  | 1,25–0,90              | 0,10–1,25                           | 69,0                                    | 24x26,5                                 | 10                                                                                  |
|                                                     |         | LexAC 3012ms2009 HTS   | 9,5–                                      | 6,5  | 20,0–                                     | 12,5 | 1,25–0,90              | 0,10–1,25                           | 74,0                                    | 30x32,5                                 | 10                                                                                  |
|                                                     |         | LexAC 301223ms1411 HTS | 10,5–                                     | 7,0  | 14,0–                                     | 8,0  | 1,25–0,90              | 0,10–1,25                           | 69,0                                    | 24x26,5                                 | 10                                                                                  |
|                                                     |         | LexAC 3012ms2014 HTS   | 14,0–                                     | 9,0  | 20,0–                                     | 12,5 | 1,25–0,90              | 0,10–1,25                           | 74,0                                    | 30x32,5                                 | 10                                                                                  |
| NPT3/4" (21H)                                       | 20,5    | LexAC 3034ms2616 HTS   | 15,5–                                     | 11,5 | 26,0–                                     | 18,5 | 1,60–1,25              | 0,30–1,60                           | 84,0                                    | 36x39                                   | 10                                                                                  |
|                                                     |         | LexAC 3034ms2618 HTS   | 18,0–                                     | 14,0 | 26,0–                                     | 18,5 | 1,60–1,25              | 0,30–1,60                           | 84,0                                    | 36x39                                   | 10                                                                                  |
|                                                     |         | LexAC 3034ms2620 HTS   | 20,5–                                     | 17,0 | 26,0–                                     | 18,5 | 1,60–1,25              | 0,30–1,60                           | 84,0                                    | 36x39                                   | 10                                                                                  |
| NPT1" (27H)                                         | 25,0    | LexAC 3100ms3420 HTS   | 20,5–                                     | 17,0 | 34,0–                                     | 26,0 | 2,00–1,60              | 0,60–2,00                           | 97,0                                    | 46x49                                   | 10                                                                                  |
|                                                     |         | LexAC 3100ms3425 HTS   | 25,0–                                     | 20,0 | 34,0–                                     | 26,0 | 2,00–1,60              | 0,60–2,00                           | 97,0                                    | 46x49                                   | 10                                                                                  |
|                                                     |         | LexAC 3100ms3426 HTS   | 26,0–                                     | 24,0 | 34,0–                                     | 26,0 | 2,00–1,60              | 0,60–2,00                           | 97,0                                    | 46x49                                   | 10                                                                                  |
| NPT1 1/4" (35H)                                     | 26,0    | LexAC 3114ms4528 HTS   | 28,0–                                     | 24,0 | 45,0–                                     | 33,0 | 2,00–1,60              | 0,60–2,00                           | 110,0                                   | 60x64                                   | 5                                                                                   |
|                                                     |         | LexAC 3114ms4534 HTS   | 34,0–                                     | 26,0 | 45,0–                                     | 33,0 | 2,00–1,60              | 0,60–2,00                           | 110,0                                   | 60x64                                   | 5                                                                                   |
| NPT2" (53H)                                         | 27,0    | LexAC 3200ms5637 HTS   | 37,0–                                     | 28,0 | 56,0–                                     | 44,0 | 2,50–2,00              | 0,90–2,50                           | 125,0                                   | 70x74                                   | 5                                                                                   |
|                                                     |         | LexAC 3200ms5644 HTS   | 44,0–                                     | 35,0 | 56,0–                                     | 44,0 | 2,50–2,00              | 0,90–2,50                           | 125,0                                   | 70x74                                   | 5                                                                                   |
| NPT2 1/2" (63H)                                     | 40,0    | LexAC 3212ms6644 HTS   | 44,0–                                     | 35,0 | 66,0–                                     | 56,0 | 2,50–2,00              | 1,50–2,50                           | 154,0                                   | 81x87                                   | 1                                                                                   |
|                                                     |         | LexAC 3212ms6656 HTS   | 56,0–                                     | 45,0 | 66,0–                                     | 56,0 | 2,50–2,00              | 1,50–2,50                           | 154,0                                   | 81x87                                   | 1                                                                                   |

9200 | TT12900

60200 | TT12900

# LevelEx AC Kabelverschraubung Ex db / Ex eb / Ex ta

LevelEx AC cable gland Ex db / Ex eb / Ex ta



Abb. 1  
Fig. 1

Abb. 2  
Fig. 2

## Edelstahl

Kegeliges NPT-Anschlussgewinde nach ANSI/ASME B1.20.1  
Schutzart IP 66, IP 68 (10 bar, 1 Stunde)

Stainless steel

Conical NPT connection thread according to ANSI/ASME B1.20.1  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

| Werkstoff Verschraubungskörper<br>Material gland body | Ausführung/Farbe<br>Version/colour | Werkstoff Dichteinsatz<br>Material sealing insert | Farbe<br>Colour           | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|-------------------------------------------------------|------------------------------------|---------------------------------------------------|---------------------------|--------------------------------------------------------------|
| VA 1.4404<br>AISI 316L                                | Blank                              | Silikon HTS                                       | Rotbraun<br>Reddish-brown | -60 °C / +130 °C                                             |

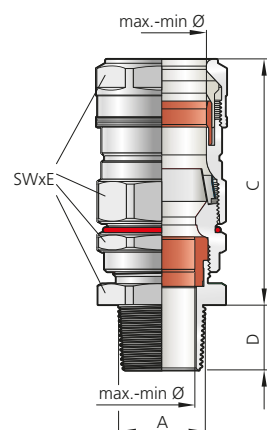


Abb. 3  
Fig. 3

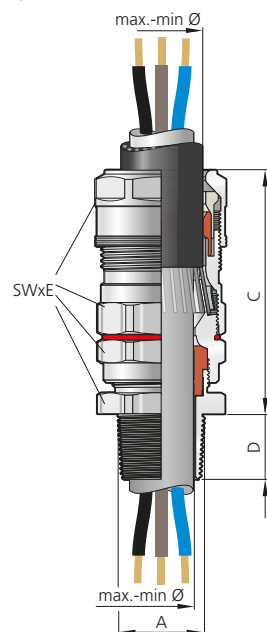


Abb. 4  
Fig. 4

| Anschlussgewinde/-länge<br>Connection thread/length | Art.-Nr.<br>Art. no. | Dichtbereich innen<br>Inner sealing range | Dichtbereich außen<br>Outer sealing range | Armierung<br>Armouring | Band/Ge-<br>flecht<br>Tape/braiding | Bau-<br>höhe<br>Mount-<br>ing<br>height | Schlüs-<br>selweite<br>Spanner<br>width |            |
|-----------------------------------------------------|----------------------|-------------------------------------------|-------------------------------------------|------------------------|-------------------------------------|-----------------------------------------|-----------------------------------------|------------|
|                                                     |                      |                                           |                                           |                        |                                     |                                         |                                         |            |
| A                                                   | D<br>mm              | max./min. ø<br>mm                         | max./min. ø<br>mm                         | max./min.<br>mm        | max./min.<br>mm                     | C<br>mm                                 | SW x E<br>mm                            |            |
| NPT1/2" (16H)                                       | 20,0                 | LexAC 301223VA1407/316L HTS               | 6,5– 4,0                                  | 14,0– 8,0              | 1,25– 0,90                          | 40– 1,25                                | 69,0                                    | 24x26,5 10 |
|                                                     |                      | LexAC 301223VA1409/316L HTS               | 9,5– 6,5                                  | 14,0– 8,0              | 1,25– 0,90                          | 40– 1,25                                | 69,0                                    | 24x26,5 10 |
|                                                     |                      | LexAC 301223VA1411/316L HTS               | 10,5– 7,0                                 | 14,0– 8,0              | 1,25– 0,90                          | 40– 1,25                                | 69,0                                    | 24x26,5 10 |
|                                                     |                      | LexAC 3012VA2009/316L HTS                 | 9,5– 6,5                                  | 20,0– 12,5             | 1,25– 0,90                          | 40– 1,25                                | 74,0                                    | 30x32,5 10 |
|                                                     |                      | LexAC 3012VA2014/316L HTS                 | 14,0– 9,0                                 | 20,0– 12,5             | 1,25– 0,90                          | 40– 1,25                                | 74,0                                    | 30x32,5 10 |
| NPT3/4" (21H)                                       | 20,5                 | LexAC 3034VA2616/316L HTS                 | 15,5– 11,5                                | 26,0– 18,5             | 1,60– 1,25                          | 0,60– 1,60                              | 84,0                                    | 36x39 10   |
|                                                     |                      | LexAC 3034VA2618/316L HTS                 | 18,0– 14,0                                | 26,0– 18,5             | 1,60– 1,25                          | 0,60– 1,60                              | 84,0                                    | 36x39 10   |
|                                                     |                      | LexAC 3034VA2620/316L HTS                 | 20,5– 17,0                                | 26,0– 18,5             | 1,60– 1,25                          | 0,60– 1,60                              | 84,0                                    | 36x39 10   |
| NPT1" (27H)                                         | 25,0                 | LexAC 3100VA3420/316L HTS                 | 20,5– 17,0                                | 34,0– 26,0             | 2,00– 1,60                          | 1,00– 2,00                              | 97,0                                    | 46x49 10   |
|                                                     |                      | LexAC 3100VA3425/316L HTS                 | 25,0– 20,0                                | 34,0– 26,0             | 2,00– 1,60                          | 1,00– 2,00                              | 97,0                                    | 46x49 10   |
|                                                     |                      | LexAC 3100VA3426/316L HTS                 | 26,0– 24,0                                | 34,0– 26,0             | 2,00– 1,60                          | 1,00– 2,00                              | 97,0                                    | 46x49 10   |
| NPT1 1/4" (35H)                                     | 26,0                 | LexAC 3114VA4528/316L HTS                 | 28,0– 24,0                                | 45,0– 33,0             | 2,00– 1,60                          | 1,00– 2,00                              | 110,0                                   | 60x64 5    |
|                                                     |                      | LexAC 3114VA4534/316L HTS                 | 34,0– 26,0                                | 45,0– 33,0             | 2,00– 1,60                          | 1,00– 2,00                              | 110,0                                   | 60x64 5    |
| NPT2" (53H)                                         | 27,0                 | LexAC 3200VA5637/316L HTS                 | 37,0– 28,0                                | 56,0– 44,0             | 2,50– 2,00                          | 1,30– 2,50                              | 125,0                                   | 70x74 1    |
|                                                     |                      | LexAC 3200VA5644/316L HTS                 | 44,0– 35,0                                | 56,0– 44,0             | 2,50– 2,00                          | 1,30– 2,50                              | 125,0                                   | 70x74 1    |
| NPT2 1/2" (63H)                                     | 40,0                 | LexAC 3212VA6644/316L HTS                 | 44,0– 35,0                                | 66,0– 56,0             | 2,50– 2,00                          | 1,50– 2,50                              | 154,0                                   | 81x87 1    |
|                                                     |                      | LexAC 3212VA6656/316L HTS                 | 56,0– 45,0                                | 66,0– 56,0             | 2,50– 2,00                          | 1,50– 2,50                              | 154,0                                   | 81x87 1    |

603300 | TT12900

## Dichtring – Flach

Sealing ring – Flat

RoHS



**Zubehörartikel für LevelEx und LevelEx AC**  
**PTFE, Farbe: Weiß**  
**Für Anschlussgewinde: metrisch**  
**Temperaturbereich: –150 °C bis +260 °C**

*Accessory for LevelEx and LevelEx AC*  
*PTFE, colour: white*  
*For metric connection thread*  
*Temperature range: –150 °C up to +260 °C*

Abb. 1  
Fig. 1

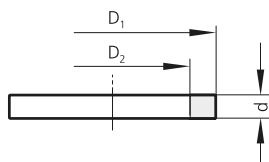


Abb. 2  
Fig. 2

| Nenngröße<br>Nom. size<br><b>A</b> | Art.-Nr.<br>Art. no. | Außendurchmesser<br>Outside diameter<br><b>D1</b><br>mm | Innendurchmesser<br>Inside diameter<br><b>D2</b><br>mm | <b>d</b><br>mm |    |
|------------------------------------|----------------------|---------------------------------------------------------|--------------------------------------------------------|----------------|----|
| M16x1,5                            | Lex DRP 16           | 20,0                                                    | 16,0                                                   | 1,5            | 50 |
| M20x1,5                            | Lex DRP 20           | 24,0                                                    | 20,0                                                   | 1,5            | 50 |
| M25x1,5                            | Lex DRP 25           | 30,0                                                    | 25,0                                                   | 1,5            | 50 |
| M32x1,5                            | Lex DRP 32           | 36,0                                                    | 32,0                                                   | 1,5            | 50 |
| M40x1,5                            | Lex DRP 40           | 46,0                                                    | 40,0                                                   | 1,5            | 50 |
| M50x1,5                            | Lex DRP 50           | 60,0                                                    | 50,0                                                   | 1,5            | 50 |
| M63x1,5                            | Lex DRP 63           | 70,0                                                    | 63,0                                                   | 1,5            | 50 |

54800 | TT07910

## Zahnscheibe

Lock washer

RoHS



**Zubehörartikel für LevelEx und LevelEx AC**  
**Edelstahl 1.4404**

*Accessory for LevelEx and LevelEx AC*  
*Stainless steel AISI 316L*

Abb. 1  
Fig. 1

| Nenngröße<br>Nom. size<br><b>A</b> | Art.-Nr.<br>Art. no. |    |
|------------------------------------|----------------------|----|
| M16x1,5                            | Lex SSWM 16          | 50 |
| M20x1,5                            | Lex SSWM 20          | 50 |
| M25x1,5                            | Lex SSWM 25          | 50 |
| M32x1,5                            | Lex SSWM 32          | 50 |
| M40x1,5                            | Lex SSWM 40          | 50 |
| M50x1,5                            | Lex SSWM 50          | 25 |
| M63x1,5                            | Lex SSWM 63          | 25 |

54700 | TT08400

## Schutzkappe

Shroud

RoHS



Zubehörartikel für LevelEx

PVC

Temperaturbereich: -20 °C bis +115 °C

Accessory for LevelEx

PVC

Temperature range: -20 °C up to +115 °C

Abb. 1  
Fig. 1

| Nenngröße<br>Nom. size<br><b>A</b> | Art.-Nr.<br>Art. no. |    |
|------------------------------------|----------------------|----|
| M16x1,5                            | Lex SPVC 16          | 50 |
| M20x1,5                            | Lex SPVC 20          | 50 |
| M25x1,5                            | Lex SPVC 25          | 50 |
| M32x1,5                            | Lex SPVC 32          | 50 |
| M40x1,5                            | Lex SPVC 40          | 50 |
| M50x1,5                            | Lex SPVC 50          | 25 |
| M63x1,5                            | Lex SPVC 63          | 25 |



54600 | TT08400



**Passende Gegenmuttern und Erdungslaschen für LevelEx Kabelverschraubungen finden Sie im Kapitel „Zubehör“ ab Seite 387.**

Matching lock nuts and earthing straps for LevelEx cable glands can be found in the section on accessories from page 387.

## Ex-Zulassung: Typen Adapter, Reduzierungen und Blindstopfen

Ex approval: Types adapters, reducers and blind plugs



### Varianten:

- EMV-Adapter Ex db / Ex eb / Ex ta
- Blindstopfen Ex db / Ex eb / Ex ta

### Variants:

- EMC adapters Ex db / Ex eb / Ex ta
- Blind plugs Ex db / Ex eb / Ex ta

Abb. 1  
Fig. 1

### Werkstoff

|                                 |                      |                         |
|---------------------------------|----------------------|-------------------------|
| Verschraubung:                  | Messing<br>Edelstahl | vernickelt<br>VA 1.4404 |
| Dichteinsatz:                   | Silikon              | Farbe: Rotbraun         |
| Anschlussgewinde-<br>Dichtring: | Silikon              | Farbe: Rot              |

### Material

|                                    |                          |                            |
|------------------------------------|--------------------------|----------------------------|
| Gland:                             | Brass<br>Stainless steel | Nickel-plated<br>AISI 316L |
| Sealing insert:                    | Silicone                 | Colour: reddish-brown      |
| Connection thread<br>sealing ring: | Silicone                 | Colour: red                |



### Explosionsschutz

|                                                                   |                                                                                                         |                                                                                                                     |
|-------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------|
| Zündschutzart:                                                    | Gas<br>Staub                                                                                            | Explosionsschutz – „d“, „e“<br>Schutz durch Gehäuse – „t“<br>Schutzart EN 60529: IP 66, IP 68<br>(10 bar, 1 Stunde) |
| Gerätegruppe/Kategorie:<br>Einsetzbar in:                         | II 2 G/ II 1D<br>Zone 1, Zone 2, Zone 20, Zone 21 und 22<br>(leitender Staub)                           |                                                                                                                     |
| Normen:                                                           | EN IEC 60079-0:2018, EN 60079-1:2014,<br>EN 60079-7:2015 + A1:2018 und<br>EN 60079-31:2014              |                                                                                                                     |
| Kennzeichnung Zulassungsnummer<br>und Kennzeichen der Prüfstelle: | PTB 19 ATEX 1010 xx<br>xx = Größe Anschlussgewinde                                                      | CE 0637                                                                                                             |
| Kennzeichnung Gas:                                                | II 2G Ex db eb IIC Gb                                                                                   |                                                                                                                     |
| Kennzeichnung Staub:                                              | II 1D Ex ta IIIC Da                                                                                     |                                                                                                                     |
| Weitere Zertifikate:                                              | IECEx – IECEx PTB 19.0033<br>CCC – 2021312313000365<br>CCC – 2021312313000366<br>CCC – 2021312313000367 |                                                                                                                     |



### Explosion protection

|                                                    |                                                                                                         |                                                                                                                               |
|----------------------------------------------------|---------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------|
| Ignition protection type:                          | Gas<br>Dust                                                                                             | Increased safety – „d“, „e“<br>Protection by enclosure – „t“<br>Type of protection EN 60529: IP 66,<br>IP 68 (10 bar, 1 hour) |
| Equipment group/category:<br>For use in:           | II 2 G/ II 1D<br>Zone 1, zone 2, zone 20, zones 21 and 22<br>(conductive dust)                          |                                                                                                                               |
| Standards:                                         | EN IEC 60079-0:2018, EN 60079-1:2014<br>EN 60079-7:2015 + A1:2018 and<br>EN 60079-31:2014               |                                                                                                                               |
| Marking, certificate number<br>and test centre ID: | PTB 19 ATEX 1010 xx<br>xx = size of connection thread                                                   | CE 0637                                                                                                                       |
| Gas marking:                                       | II 2G Ex db eb IIC Gb                                                                                   |                                                                                                                               |
| Dust marking:                                      | II 1D Ex ta IIIC Da                                                                                     |                                                                                                                               |
| Other certificates:                                | IECEx – IECEx PTB 19.0033<br>CCC – 2021312313000365<br>CCC – 2021312313000366<br>CCC – 2021312313000367 |                                                                                                                               |

Die Blindstopfen dienen zum Verschließen von nicht benutzten Gehäusebohrungen in einem explosionsgeschützten elektrischen Betriebsmittel (Anschlussraum) der Zündschutzart druckfeste Kapselung „db“ und erhöhte Sicherheit „eb“ und Schutz durch Gehäuse „ta“. Adapter und Reduzierungen dienen zur Aufnahme von Ex-Kabelverschraubungen. Die Schutzarten sind IP 66 und IP 68 (10 bar, 1 Stunde). Bei metrischen Ausführungen ist am Anschlussgewinde standardmäßig eine integrierte O-Ring-Dichtung vorgesehen.

### Betriebstemperaturbereich:

Silikon –60 °C bis +130 °C

Die Adapter, Reduzierungen und Blindstopfen sind erhältlich mit **verschiedenen Anschlussgewinden:**

M-Gewinde Standard, ISO 965-1 und ISO 965-3

NPT-Gewinde, ANSI/ASME B1.20.1

### Hinweis:

Wenn die Adapter, Reduzierungen und Blindstopfen in einem Gehäuse mit der Zündschutzart druckfeste Kapselung „db“ eingebaut werden, wird empfohlen, sie in die Explosionsprüfungen des Gehäuses miteinzubeziehen.

### Besondere Bedingungen:

Keine

The blind plugs are used to seal unused holes leading into explosion-proof electrical equipment (terminal compartment) of protection type „db“ for flameproof enclosure, type „eb“ for increased safety and type „ta“ for protection by enclosure. Adapters and reducers are used to hold Ex cable glands. The types of protection achieved are IP 66 and IP 68 (at 10 bar for 1 hour). Metric versions have an integral o-ring seal on the connection thread as standard.

### Operating temperature range:

Silicone –60 °C to +130 °C.

The adapters, reducers and blind plugs are available with **various connection threads:**

M thread standard, ISO 965-1 and ISO 965-3

NPT thread, ANSI/ASME B1.20.1

### Note:

If the adapters, reducers and blind plugs are installed in enclosures of protection type „db“ for flameproof enclosure, we recommend that they are included in the explosion tests conducted on the enclosure.

### Special conditions:

None

## EMV-Adapter Ex db / Ex eb / Ex ta

EMC adapter Ex db / Ex eb / Ex ta

RoHS    



Abb. 1  
Fig. 1

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Metric connection thread according to ISO 965-1 and ISO 965-3  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

**Werkstoff Verschraubungskörper**  
Material gland body

Messing  
Brass

**Ausführung/Farbe**  
Version/colour

Vernickelt  
Nickel-plated

**Temperaturbereich min./max.**  
Temperature range (min./max.)

-60 °C / +130 °C

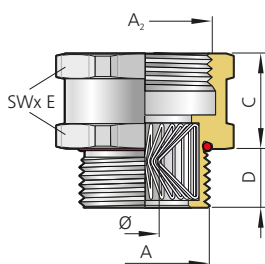


Abb. 2  
Fig. 2

| Anschlussgewinde/-länge<br>Connection thread/length | Innengewinde<br>Female thread | Art.-Nr.<br>Art. no. | Schirmbereich<br>Screening range | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                     |
|-----------------------------------------------------|-------------------------------|----------------------|----------------------------------|----------------------------|---------------------------------|-------------------------------------------------------------------------------------|
| A<br>A                                              | D<br>mm                       | A2<br>A2             | max./min. ø<br>mm                | C<br>mm                    | SW x E<br>mm                    |  |
| M16x1,5                                             | 16,0                          | M16x1,5              | 9,0 – 5,0                        | 19,0                       | 20x22,2                         | 10                                                                                  |
| M20x1,5                                             | 16,0                          | M20x1,5              | 12,0 – 7,0                       | 20,0                       | 24x26,5                         | 10                                                                                  |
| M25x1,5                                             | 16,0                          | M25x1,5              | 16,0 – 10,0                      | 20,0                       | 30x33                           | 10                                                                                  |
| M32x1,5                                             | 16,0                          | M32x1,5              | 20,0 – 13,0                      | 20,0                       | 36x39,5                         | 10                                                                                  |
| M40x1,5                                             | 16,0                          | M40x1,5              | 28,0 – 20,0                      | 26,5                       | 45x48                           | 5                                                                                   |
| M50x1,5                                             | 16,0                          | M50x1,5              | 37,0 – 28,0                      | 26,5                       | 57x61                           | 5                                                                                   |
| M63x1,5                                             | 19,0                          | M63x1,5              | 46,0 – 37,0                      | 26,5                       | 68x72                           | 1                                                                                   |



Für das Einführen des Kabels wird für den oberen Schirmbereich die Verwendung einer Montagehülse empfohlen, siehe Seite 209  
We recommend using an assembly sleeve to feed the cable at the top of the screening range, see page 209

## Blindstopfen Ex db / Ex eb / Ex ta

Blind plug Ex db / Ex eb / Ex ta

RoHS    



Abb. 1  
Fig. 1

**Messing vernickelt**  
**Metrisches Anschlussgewinde nach ISO 965-1 und ISO 965-3**  
**Schutzart IP 66, IP 68 (10 bar, 1 Stunde)**

Brass, nickel-plated  
Metric connection thread according to ISO 965-1 and ISO 965-3  
Type of protection IP 66, IP 68 (10 bar, 1 hour)

**Werkstoff Verschraubungskörper**  
Material gland body

Messing  
Brass

**Ausführung/Farbe**  
Version/colour

Vernickelt  
Nickel-plated

**Temperaturbereich min./max.**  
Temperature range (min./max.)

-60 °C / +130 °C

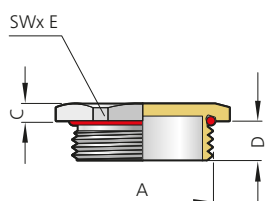


Abb. 2  
Fig. 2

| Nenngröße<br>Nom. size |         | Art.-Nr.<br>Art. no. | Bauhöhe<br>Mounting height | Schlüsselweite<br>Spanner width |                                                                                       |
|------------------------|---------|----------------------|----------------------------|---------------------------------|---------------------------------------------------------------------------------------|
| A                      | D<br>mm |                      | C<br>mm                    | SW x E<br>mm                    |  |
| M16x1,5                | 16,0    | BSM 216ms exd        | 3,5                        | 20x22,2                         | 10                                                                                    |
| M20x1,5                | 16,0    | BSM 220ms exd        | 3,8                        | 24x26,5                         | 10                                                                                    |
| M25x1,5                | 16,0    | BSM 225ms exd        | 4,0                        | 30x33                           | 10                                                                                    |
| M32x1,5                | 16,0    | BSM 232ms exd        | 4,5                        | 36x39,5                         | 10                                                                                    |
| M40x1,5                | 16,0    | BSM 240ms exd        | 4,5                        | 45x48                           | 5                                                                                     |
| M50x1,5                | 16,0    | BSM 250ms exd        | 5,0                        | 57x61                           | 5                                                                                     |
| M63x1,5                | 19,0    | BSM 263ms exd        | 6,0                        | 68x72                           | 1                                                                                     |



Reduzierung Ex db / Ex eb / Ex ta auf Anfrage  
Reducer Ex db / Ex eb / Ex ta on request

### K36. Entlüftungsstutzen Ex eb, Ex ta

K36. Breather drain Ex eb, Ex ta



Abb. 1  
Fig. 1

### Entlüftungsstutzen Ex eb, Ex ta (ACDP\*\*E)

Messing und Edelstahl 1.4404

Metrisches Anschlussgewinde nach EN 60423

Schutzart IP 66, NEMA 4X

Breather drain Ex eb, Ex ta (ACDP\*\*E)

Brass and stainless steel AISI 316L

Metric connection thread according to EN 60423

Type of protection IP 66, NEMA 4X



#### Explosionsschutz (Angaben Peppers – Typ ACDP)

|                           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
|---------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Normen:                   | EN 60079-0, EN 60079-7, EN 60079-31, IEC 60079-0, IEC 60079-7, IEC 60079-31 & 60529 C22.2 (siehe Zertifikate), UL514B, ANSI/UL 60079-0/7, ISA 60079-31, UL 50E                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Zertifizierung:           | ATEX I M2 II 2GD Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>IECEX Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>UL Class I Zone 1 AEx eb IIC Gb / Zone 20 AEx ta IIIC Da<br>CEC – Canada Ex eb IIC Gb; Ex ta IIIC Da / Type 4<br>NEC – USA Class I Zone 1 AEx eb IIC Gb / Class II Zone 20 AEx ta IIIC Da / Type 4<br>EAC PII Ex e I Mc X / 1Ex e IIC Gb X/Ex ta IIIC Da X<br>INMETRO – Brazil Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>SAC – China Ex e IIC Gb<br>UKRAINE I M2 Ex eb I Mb / II 2G Ex eb IIC Gb / II 1D Ex ta IIIC Da<br>CCoE – India Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>ABS Specified ABS Rules<br>LLOYD'S Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>RS – Russia Ex e IC / Ex e IIC / Ex tb IIIC |
| Zertifikats-Nr.:          | ATEX CML 19ATEX3347X<br>IECEX IECEX CML 19.0105X<br>UL E340660<br>CEC – Canada CSA 2310046<br>NEC – USA CSA 2310046<br>EAC TC RU C-GB.BH02.B.00693-18<br>INMETRO – Brazil NCC 13.2191 X<br>SAC – China NEPSI GY16.1407X<br>UKRAINE CLJ 18.0319 X<br>CCoE – India PESO P494321/11<br>ABS 20-LD1944057-PDA<br>LLOYD'S LR2124442TA<br>RS – Russia 19.00189.278                                                                                                                                                                                                                                                                                                                                                                         |
| IP-Schutzart:             | IP 66, NEMA 4X                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Durchflussmenge Wasser:   | 0,25 Liter pro Stunde                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Durchflussmenge Luft:     | 280 Liter pro Stunde (bei M25)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Betriebs-temperatur:      | Anschlussgewinde-Dichtring Nitril –30 °C bis +100 °C<br>Anschlussgewinde-Dichtring Silikon –60 °C bis +200 °C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| Material:                 | Messing, Edelstahl oder Aluminium                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| Oberflächen-beschichtung: | vernickelt                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| O-Ring:                   | Nitril (Schwarz), Silikon (Rot)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |



#### Explosion protection (information from Peppers – type ACDP)

|                        |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
|------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Compliance standards:  | EN 60079-0, EN 60079-7, EN 60079-31 IEC 60079-0, IEC 60079-7, IEC 60079-31 & 60529 C22.2 (see certificate), UL514B, ANSI/UL 60079-0/7, ISA 60079-31, UL 50E                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| Certification:         | ATEX I M2 II 2GD Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>IECEX Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>UL Class I Zone 1 AEx eb IIC Gb / Zone 20 AEx ta IIIC Da<br>CEC – Canada Ex eb IIC Gb; Ex ta IIIC Da / Type 4<br>NEC – USA Class I Zone 1 AEx eb IIC Gb / Class II Zone 20 AEx ta IIIC Da / Type 4<br>EAC PII Ex e I Mc X / 1Ex e IIC Gb X/Ex ta IIIC Da X<br>INMETRO – Brazil Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>SAC – China Ex e IIC Gb<br>UKRAINE I M2 Ex eb I Mb / II 2G Ex eb IIC Gb / II 1D Ex ta IIIC Da<br>CCoE – India Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>ABS Specified ABS Rules<br>LLOYD'S Ex eb I Mb / Ex eb IIC Gb / Ex ta IIIC Da<br>RS – Russia Ex e IC / Ex e IIC / Ex tb IIIC |
| Certificate nos.:      | ATEX CML 19ATEX3347X<br>IECEX IECEX CML 19.0105X<br>UL E340660<br>CEC – Canada CSA 2310046<br>NEC – USA CSA 2310046<br>EAC TC RU C-GB.BH02.B.00693-18<br>INMETRO – Brazil NCC 13.2191 X<br>SAC – China NEPSI GY16.1407X<br>UKRAINE CLJ 18.0319 X<br>CCoE – India PESO P494321/11<br>ABS 20-LD1944057-PDA<br>LLOYD'S LR2124442TA<br>RS – Russia 19.00189.278                                                                                                                                                                                                                                                                                                                                                                         |
| IP rating:             | IP 66, NEMA 4X                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Flow rate water:       | 0.25 litres per hour                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| Flow rate air:         | 280 litres per hour (at M25)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| Operating temperature: | O-ring – nitrile –30 °C to +100 °C<br>O-ring – silicone –60 °C to +200 °C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Materials:             | Brass, stainless steel or aluminium                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| Plating:               | Nickel-plated                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| O-ring:                | Nitrile (black), silicone (red)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |

Die Entlüftungsstutzen der ACDP-Serie ermöglichen den Ausrüstungsinnenteilen das „Atmen“ mithilfe der Außenatmosphäre und somit die effektive Beseitigung entstandener Feuchtigkeit. Die Entlüftungsstutzen der ACDP-Serie gewährleisten die Schutzarten Ex eb und IP 66 bei IEC-Anwendungen. Jedem Entlüftungsstutzen liegen eine Kronenmutter und ein O-Ring bei.

“ACDP” series breather drains allow the inside of the equipment to breathe with the outside atmosphere and provide a method of effectively draining any moisture from within the equipment. ACDP Series Breather Drains maintain the Ex eb method of protection and IP 66 for IEC type applications. A castellated lock nut and o-ring are supplied with every breather drain.

## K36. Entlüftungsstutzen Ex eb, Ex ta

K36. Breather drain Ex eb, Ex ta



**Entlüftungsstutzen Ex eb, Ex ta (ACDP\*\*E)**  
**Messing und Edelstahl 1.4404**  
**Metrisches Anschlussgewinde nach EN 60423**  
**Schutzart IP 66, NEMA 4X**

*Breather drain Ex eb, Ex ta (ACDP\*\*E)*  
*Brass and stainless steel AISI 316L*  
*Metric connection thread according to EN 60423*  
*Type of protection IP 66, NEMA 4X*

Abb. 1  
Fig. 1

- Durchgangsloch:**
- 10 mm Gewindelänge
  - Zwei direkt gegenüberliegende Löcher an der Gewindewand
  - Komplett mit Kronenmutter
- Gewindebohrung:**
- 15 mm Gewindelänge
  - Mit drei um 9 mm versetzten Löchern an der Gewindewand (um unterschiedliche Wanddicken zuzulassen)
  - Mit und ohne Kronenmutter

- Clearance hole:**
- 10 mm thread length
  - Two holes directly opposite each other in the thread wall
  - Complete with castellated locknut
- Threaded entry:**
- 15 mm thread length
  - Three holes 9 mm apart in the thread wall (to accommodate different wall thickness)
  - With or without castellated locknut

**Andere Anschlussgewinde und Materialien auf Anfrage**

**Other connection threads and materials on request**

| Werkstoff<br>Material  | Bestellschlüssel<br>Art. no. supplement | Ausführung/Farbe<br>Version/colour  | Bestellschlüssel<br>Art. no. supplement | Werkstoff Dichting<br>Material sealing insert | Bestellschlüssel<br>Art. no. supplement | Temperaturbereich min./max.<br>Temperature range (min./max.) |
|------------------------|-----------------------------------------|-------------------------------------|-----------------------------------------|-----------------------------------------------|-----------------------------------------|--------------------------------------------------------------|
| Messing<br>Brass       | d                                       | Blank (b)                           |                                         | Nitril (Ni)<br>Nitrile (Ni)                   |                                         | -30 °C / +100 °C                                             |
| Messing<br>Brass       | d                                       | Blank (b)                           |                                         | Silikon (Si)<br>Silicone (Si)                 | 3                                       | -60 °C / +200 °C                                             |
| Messing<br>Brass       | d                                       | Vernickelt (v)<br>Nickel-plated (n) | /NP                                     | Nitril (Ni)<br>Nitrile (Ni)                   |                                         | -30 °C / +100 °C                                             |
| Messing<br>Brass       | d                                       | Vernickelt (v)<br>Nickel-plated (n) | /NP                                     | Silikon (Si)<br>Silicone (Si)                 | 3                                       | -60 °C / +200 °C                                             |
| VA 1.4404<br>AISI 316L | st                                      | Blank (b)                           |                                         | Nitril (Ni)<br>Nitrile (Ni)                   |                                         | -30 °C / +100 °C                                             |
| VA 1.4404<br>AISI 316L | st                                      | Blank (b)                           |                                         | Silikon (Si)<br>Silicone (Si)                 | 3                                       | -60 °C / +200 °C                                             |

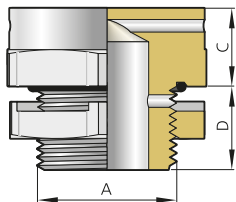


Abb. 2  
Fig. 2

| Anschlussgewinde/-länge<br>Connection thread/length |         | Art.-Nr.<br>Art. no. |      | Ausführung bitte ergänzen<br>Please indicate product details |           |         | Bauhöhe<br>Mounting height | Anzahl Boh-<br>rungen<br>Holes | Schlüssel-<br>weite<br>Spanner<br>width |
|-----------------------------------------------------|---------|----------------------|------|--------------------------------------------------------------|-----------|---------|----------------------------|--------------------------------|-----------------------------------------|
| A                                                   | D<br>mm | Messing/Brass        | = d  | Nitril (Ni)/<br>Nitrile (Ni) =                               | b =       | C<br>mm |                            |                                | SW x E<br>mm                            |
|                                                     |         | VA 1.4404/AISI 316L  | = st | Si =                                                         | v/n = /NP |         |                            |                                |                                         |
| M12x1,5                                             | 10,0    | 16.12                |      | ACD                                                          | ex        | 12,0    | 2                          | 19x20,9                        | 50                                      |
| M12x1,5                                             | 15,0    | 16.12                |      | ACD                                                          | ex        | /15     | 12,0                       | 19x20,9                        | 50                                      |
| M16x1,5                                             | 10,0    | 16.16                |      | ACD                                                          | ex        | 12,0    | 2                          | 24x26,4                        | 50                                      |
| M16x1,5                                             | 15,0    | 16.16                |      | ACD                                                          | ex        | /15     | 12,0                       | 24x26,4                        | 50                                      |
| M20x1,5                                             | 10,0    | 16.20                |      | ACD                                                          | ex        | 12,0    | 2                          | 27x29,7                        | 50                                      |
| M20x1,5                                             | 15,0    | 16.20                |      | ACD                                                          | ex        | /15     | 12,0                       | 27x29,7                        | 50                                      |
| M25x1,5                                             | 10,0    | 16.25                |      | ACD                                                          | ex        | 12,0    | 2                          | 31,8x34,9                      | 25                                      |
| M25x1,5                                             | 15,0    | 16.25                |      | ACD                                                          | ex        | /15     | 12,0                       | 31,8x34,9                      | 25                                      |
| M32x1,5                                             | 10,0    | 16.32                |      | ACD                                                          | ex        | 12,0    | 2                          | 37,6x41,3                      | 25                                      |
| M32x1,5                                             | 15,0    | 16.32                |      | ACD                                                          | ex        | /15     | 12,0                       | 37,6x41,3                      | 25                                      |

38600 | TT08700

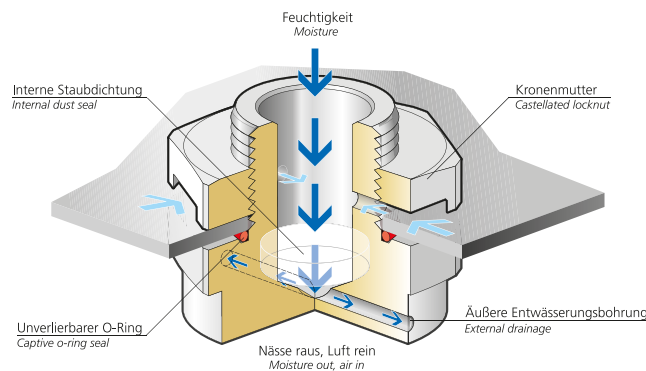


Abb. 3  
Fig. 3

