

## Level measurement

Guided wave radar **MOLOS**  
wave **1**

Yo-Yo sensing systems **MOLOS**  
bob **2**

Visualization **MOLOS**  
visu **3**

Rotation **MOLOS**  
roto **4**

Membrane **MOLOS**  
membran **5**

## Level indicator

Vibration **MOLOS**  
vibro **6**

Microwave barrier **MOLOS**  
barrier **7**

Pendulum **MOLOS**  
pendu **8**

Coding **MOLOS**  
code **9**

## Hose couplings

Limit switch **MOLOS**  
switch **10**

Swivelling lever **MOLOS**  
swing **11**

Lockable couplings **MOLOS**  
lock **12**

Overload protection **MOLOS**  
safe **13**

Silo filling device **MOLOS**  
safe **14**

## Bulk solids handling

Pressure device **MOLOS**  
pressdec **15**

Microwave flow sensor **MOLOS**  
flow **16**

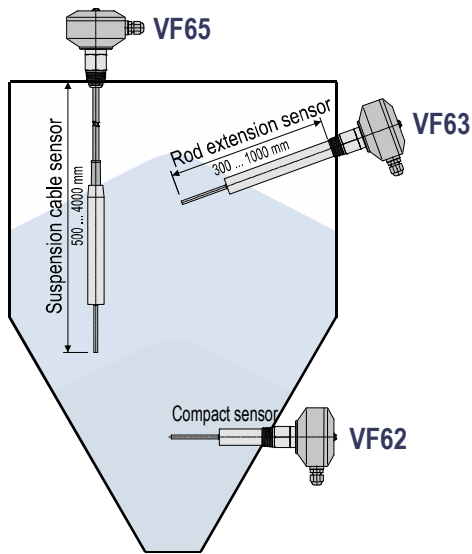
Pinch valves **MOLOS**  
valve **17**



**Advantages of vibro level indicators:**

- full-, demand- and empty indicator for light bulk solids
- reliable level indication for many applications
- low installation depth due to compact structure
- use in potentially dust explosive atmospheres possible
- maintenance-free continuous operation

Container

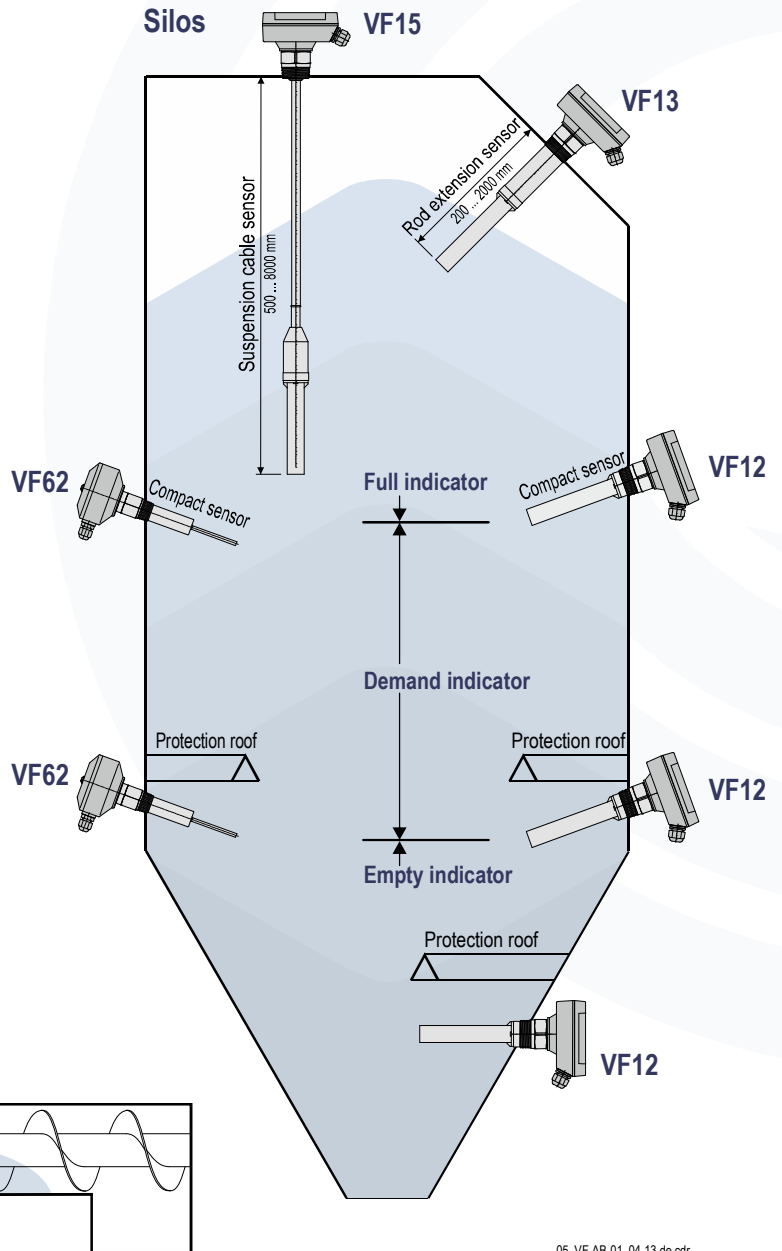


Level indicator for bulk solids.

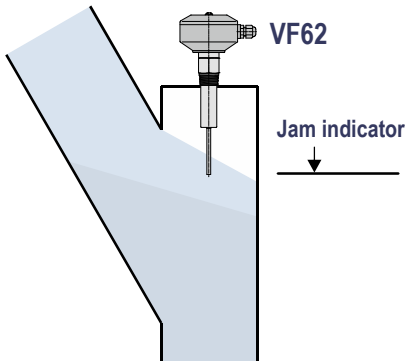
**VF**



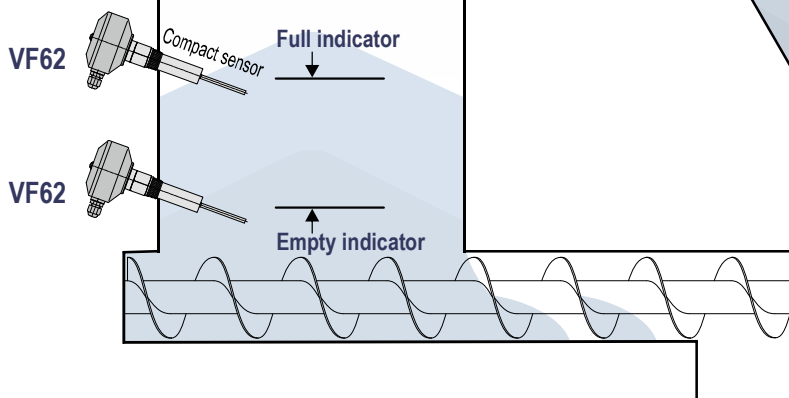
Silos



Drain pipes



Dosing equipment



05\_VF-AB-01\_04-13 de.cdr


## Selection list

# VF12

## Compact sensor

Rhombus-  
vibration rod

ATEX option B1

**Dust**  II 1/2D Ex ta/tb IIIC T95 °C Da/Db

ATEX option B3

**Dust**  II 1/3D Ex ta/tc IIIC T95 °C Da/Dc

ATEX option B11

**Gas+**  II 1/2G Ex ia IIB T4 Ga/Gb  
**Dust**  and II 1/2D Ex ia IIIC TX Da/Db

1) not available with option B3

2) not available with option B1 / B11





## Basic device

### Choice of options with surcharges

#### Housing

- A1 **Standard** = rectangular aluminium housing, coated RAL7001 1) .....  
A22 Separate rectangular-housing, lead-through housing at the probe 2) .....

#### Certifications, certificates, approvals

- B0 **Standard** = CE conform and IP66/IP67 (with A22: IP65) .....  
B1 ATEX  II 1/2D Ex ta/tb IIIC T95°C **Dust** .....  
B3 ATEX  II 1/3D Ex ta/tc IIIC T95°C **Dust** .....  
B11 ATEX  II 1/2G Ex ia IIB T4 **Gas** +  II 1/2D Ex ia IIIC TX **Dust** .....

Further approvals ..... on request

#### Supply voltage

- C8 **Standard** = 20 ... 250 V AC/DC not with B11 .....  
C5 24 V DC transistor output PNP/NPN, not with B11 .....  
C5i 23,7 V DC only with B11 GasEx, supply and evaluation with VF-VEC8-B22 .....

#### Special equipment

- S0 **Standard** = useable for light bulk goods above 0,02 kg/l .....  
SE High sensitivity useable for very light bulk goods above 0,01 kg/l .....  
SA Sediment version, detection of deposited bulk goods in water ..... on request

#### Signal lamps

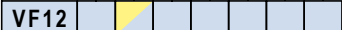
- H0 **Standard** = with function LED .....  
H1 Function LED visible from the outside, only with B0 .....

#### Process temperature

- E0 **Standard** = -40°C ... +80°C .....  
E1 -40°C ... +150°C .....  
E2 -40°C ... +200°C only with S0<sup>1/2</sup>) .....  
E3 -40°C ... +250°C only with S0<sup>1/2</sup>) .....  
E9 Further temperatures ..... on request

#### Process connection

- R3 **Standard** = R1½ EN 10226, steel 1.4301 / 304 ..  
N3 1½" NPT, steel 1.4301 / 304 .....

VF12  ← Order code

## Selection list

# VF13

## Rod extension sensor

6

Rhombus-  
vibration rod

ATEX option B1

**Dust**  II 1/2D Ex ta/tb IIIC T95 °C Da/Db

ATEX option B3

**Dust**  II 1/3D Ex ta/tc IIIC T95 °C Da/Dc

ATEX option B11

**Gas+**  II 1/2G Ex ia IIB T4 Ga/Gb  
**Dust**  II 1/2D Ex ia IIIC TX Da/Db

1) not available with option B3

2) not available with option B1 / B11





## Basic device

### Choice of options with surcharges

#### Housing

- A1 **Standard** = rectangular aluminium housing, coated RAL7001<sup>1)</sup> .....  
A22 Separate rectangular-housing, lead-through housing at the probe<sup>2)</sup> .....

#### Certifications, certificates, approvals

- B0 **Standard** = CE conform and IP66/IP67 (with A22: IP65) .....  
B1 ATEX  II 1/2D Ex ta/tb IIIC T95°C **Dust** .....  
B3 ATEX  II 1/3D Ex ta/tc IIIC T95°C **Dust** .....  
B11 ATEX  II 1/2G Ex ia IIB T4 **Gas** +  II 1/2D Ex ia IIIC TX **Dust** .....

Further approvals ..... on request

#### Supply voltage

- C8 **Standard** = 20 ... 250 V AC/DC not with B11 .....  
C5 24 V DC transistor output PNP/NPN, not with B11 .....  
C5i 23,7 V DC only with B11 GasEx, supply and evaluation with VF-VEC8-B22 .....

#### Special equipment

- S0 **Standard** = useable for light bulk goods above 0,02 kg/l .....  
SE High sensitivity useable for very light bulk goods above 0,01 kg/l .....  
SA Sediment version, detection of deposited bulk goods in water ..... on request

#### Signal lamps

- H0 **Standard** = with function LED .....  
H1 Function LED visible from the outside, only with B0 .....

#### Process temperature

- E0 **Standard** = -40°C ... +80°C .....  
E1 -40°C ... +150°C .....  
E2 -40°C ... +200°C only with S0<sup>1/2)</sup> .....  
E3 -40°C ... +250°C only with S0<sup>1/2)</sup> .....  
E9 Further temperatures ..... on request

#### Process connection

- R3 **Standard** = R1½ EN 10226, steel 1.4301 / 304 ..  
N3 1½" NPT, steel 1.4301 / 304 .....

#### Length rod extension

- |    |   |   |   |   |    |   |
|----|---|---|---|---|----|---|
| LA | 0 | 2 | 0 | 0 | mm | basic length .....  |
|    | 0 | 0 | 0 | 0 | mm | ... any further 100 mm<br>insert required length<br>in steps of 100 mm,<br>range 0200 ... 2000 mm |

VF13  LA 0 0 0 0 ← **Order code**



## Selection list

# VF62

## Compact sensor

(VF06 changed to VF62)

6

Mini-vibration rod

ATEX option B1

**Dust**  II 1/2D Ex ta/tb IIIC T95 °C Da/Db

ATEX option B3

**Dust**  II 1/3D Ex ta/tc IIIC T95 °C Da/Dc

ATEX option B11

**Gas+**  II 1/2G Ex ia IIB T4 Ga/Gb  
**Dust**  II 1/2D Ex ia IIIC TX Da/Db

- 1) not available with option B3
- 2) not available with option B1 / B11
- 3) not available with option B1 / B11 / E1





## Basic device

### Choice of options with surcharges

#### Housing

- A1 **Standard** = round aluminium housing, coated RAL7001 1) .....  
 A22 Separate round-housing, round lead-through housing at the probe 2) .....  
 A23 Separate round-housing, angled screw coupling at the probe 3) .....

#### Certifications, certificates, approvals

- B0 **Standard** = CE conform and IP66/IP67 (with A22, A23: IP65) .....  
 B1 ATEX  II 1/2D Ex ta/tb IIIC T95°C **Dust** .....  
 B3 ATEX  II 1/3D Ex ta/tc IIIC T95°C **Dust** .....  
 B11 ATEX  II 1/2G Ex ia IIB T4 **Gas** +  II 1/2D Ex ia IIIC TX **Dust** .....

Further approvals ..... on request

#### Supply voltage

- C8 **Standard** = 20 ... 250 V AC/DC not with B11 .....  
 C5i 23,7 V DC only with B11 GasEx, supply and evaluation with VF-VEC8-B22 .....

#### Special equipment

- S0 **Standard** = useable for light bulk goods above 0,02 kg/l .....  
 SE High sensitivity useable for very light bulk goods above 0,01 kg/l .....  
 SA Sediment version, detection of deposited bulk goods in water .....

#### Process temperature

- E0 **Standard** = -20°C ... +80°C .....  
 E1 -20°C ... +150°C .....  
 E9 Further temperatures ..... on request

#### Process connection

- R1 **Standard** = R1 EN 10226, stainless steel 1.4301 / 304 .....  
 N1 1" NPT, stainless steel 1.4301 / 304 .....

VF62  **Order code**


## Selection list

# VF63


## Rod extension sensor

Mini-vibration rod

ATEX option B1

**Dust**  II 1/2D Ex ta/tb IIIC T95 °C Da/Db

ATEX option B3

**Dust**  II 1/3D Ex ta/tc IIIC T95 °C Da/Dc

ATEX option B11

**Gas**<sub>und</sub>  II 1/2G Ex ia IIB T4 Ga/Gb  
**Dust** II 1/2D Ex ia IIIC TX Da/Db

1) not available with option B3

2) not available with option B1 / B11

3) not available with option B1 / B11 / E1





## Basic device

### Choice of options with surcharges

#### Housing

- A1 **Standard** = round aluminium housing, coated RAL7001 <sup>1)</sup> .....
- A22 Separate round-housing, round lead-through housing at the probe <sup>2)</sup> .....
- A23 Separate round-housing, angled screw coupling at the probe <sup>3)</sup> .....

#### Certifications, certificates, approvals

- B0 **Standard** = CE conform and IP66/IP67 (with A22, A23: IP65) .....
- B1 ATEX  II 1/2D Ex ta/tb IIIC T95°C **Dust** .....
- B3 ATEX  II 1/3D Ex ta/tc IIIC T95°C **Dust** .....
- B11 ATEX  II 1/2G Ex ia IIB T4 **Gas** +  II 1/2D Ex ia IIIC TX **Dust** .....

Further approvals ..... on request

#### Supply voltage

- C8 **Standard** = 20 ... 250 V AC/DC not with B11 .....
- C5i 23,7 V DC only with B11 GasEx, supply and evaluation with VF-VEC8-B22 .....

#### Special equipment

- S0 **Standard** = useable for light bulk goods above 0,02 kg/l .....
- SE High sensitivity useable for very light bulk goods above 0,01 kg/l .....
- SA Sediment version, detection of deposited bulk goods in water .....

#### Process temperature

- E0 **Standard** = -20°C ... +80°C .....
- E1 -20°C ... +150°C .....
- E9 Further temperatures ..... on request

#### Process connection

- R1 **Standard** = R1 EN 10226, stainless steel 1.4301 / 304 .....
- N1 1" NPT, stainless steel 1.4301 / 304 .....

#### Length rod extension

- |    |   |   |   |   |    |                          |
|----|---|---|---|---|----|--------------------------|
| LA | 0 | 3 | 0 | 0 | mm | basic length .....       |
|    | 0 | 0 | 0 | 0 | mm | ..... any further 100 mm |
|    |   |   |   |   |    | insert required length   |
|    |   |   |   |   |    | in steps of 100 mm,      |
|    |   |   |   |   |    | range 0300 ... 1000 mm   |

VF63  LA 0 3 0 0 ← Order code

## Selection list

# VF65

## Suspension cable sensor

6

Mini-vibration rod

ATEX option B1

**Dust**  II 1/2D Ex ta/tb IIIC T95 °C Da/Db

ATEX option B3

**Dust**  II 1/3D Ex ta/tc IIIC T95 °C Da/Dc

ATEX option B11

**Gas+**  II 1/2G Ex ia IIB T4 Ga/Gb  
**Dust**  und II 1/2D Ex ia IIIC TX Da/Db

- 1) not available with option B3  
2) not available with option B1 / B11





## Basic device

### Choice of options with surcharges

#### Housing

- A1 **Standard** = round aluminium housing, coated RAL7001 1) .....  
A22 Separate round-housing, round lead-through housing at the probe 2) .....  
A23 Separate round-housing, angled screw coupling at the probe 2) .....

#### Certifications, certificates, approvals

- B0 **Standard** = CE conform and IP66/IP67 (with A22, A23: IP65) .....  
B1 ATEX  II 1/2D Ex ta/tb IIIC T95°C **Dust** .....  
B3 ATEX  II 1/3D Ex ta/tc IIIC T95°C **Dust** .....  
B11 ATEX  II 1/2G Ex ia IIB T4 **Gas** +  II 1/2D Ex ia IIIC TX **Dust** .....  
Further approvals ..... on request

#### Supply voltage

- C8 **Standard** = 20 ... 250 V AC/DC not with B11 .....  
C5i 23,7 V DC only with B11 GasEx, supply and evaluation with VF-VEC8-B22 .....

#### Special equipment

- S0 **Standard** = useable for light bulk goods above 0,02 kg/l .....  
SE High sensitivity useable for very light bulk goods above 0,01 kg/l .....  
SA Sediment version, detection of deposited bulk goods in water .....

#### Process temperature

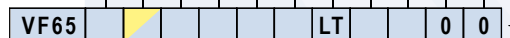
- E0 **Standard** = -20°C ... +70°C .....  
E9 Further temperatures ..... on request

#### Process connection

- R1 **Standard** = R1 EN 10226, stainless steel 1.4301 / 304 .....  
N1 1" NPT, stainless steel 1.4301 / 304 .....

#### Length suspension cable

- |    |   |   |   |   |    |  |
|----|---|---|---|---|----|--|
| LT | 0 | 5 | 0 | 0 | mm | basic length   |
|    | 0 | 0 | 0 | 0 | mm | any further 500 mm insert required length in steps of 500 mm, range 0500 ... 4000 mm |

VF65  LT 0 0 ← Order code



## Selection list

# VF

## Accessories

ATEX option B22

Gas+  
Dust  II (1)G [Ex ia Ga] IIB  
and  
II (1)D [Ex ia Da] IIIC

### Accessory



for VF ... B11 and VF ... B22 this device has to be used **always**:

**VF-VEC8-B22** Supply and evaluation device for supply voltage C5i .....

We provide deliveries, services and offers exclusively on the basis of our General Terms and Conditions that are available for viewing and download at [www.mollet-level.com](http://www.mollet-level.com).

Technical alteration rights reserved.

