



## Level sensors Vibrating level switch, LFV310

LFV310-XXGBVX8CX



**Model Name** > **LFV310-XXGBVX8CX**  
**Part No.** > **6037916**



*Product may differ  
from illustration*

#### At a glance

- Several housing materials and electrical outputs available
- Commissioning without filling
- Process temperature up to 250 °C
- Immune to deposit formation
- Very high repeatability
- Aseptic versions according to EHEDG and FDA available, CIP and SIP resistant
- ATEX and marine certifications available

#### Your benefits

- Easy installation and commissioning, no calibration necessary
- Easy operation and integration, saves time
- Maintenance-free sensor, reduces downtime
- Testing in place possible - no mounting required, which reduces installation time
- Flexible and tough system for a multitude of applications
- Universal technology works in all kinds of liquids



#### Features

|                        |                   |
|------------------------|-------------------|
| Medium:                | Fluids            |
| Measurement:           | Switch            |
| Probe length:          | 66 mm             |
| Process pressure:      | -1 bar ... 64 bar |
| Process temperature:   | -50 °C ... 150 °C |
| WHG approval:          | -                 |
| ATEX certification:    | -                 |
| Fill material density: | 0.5 ... 2.5       |

#### Performance

|                             |                          |
|-----------------------------|--------------------------|
| Accuracy of sensor element: | ± 2 mm                   |
| Repeatability:              | 1                        |
| Viscosity:                  | 0.1 mPas ... 10,000 mPas |
| Response time:              | 500 ms                   |

#### Mechanical data

|                     |                                             |
|---------------------|---------------------------------------------|
| Housing material:   | Stainless steel (electropolished) 316L      |
| Process connection: | G ¾ A PN 64/316L                            |
| Wetted parts:       | Stainless steel 316L (optional Ra ≤ 0.8 µm) |

Sensor material:

Stainless steel 1.4404

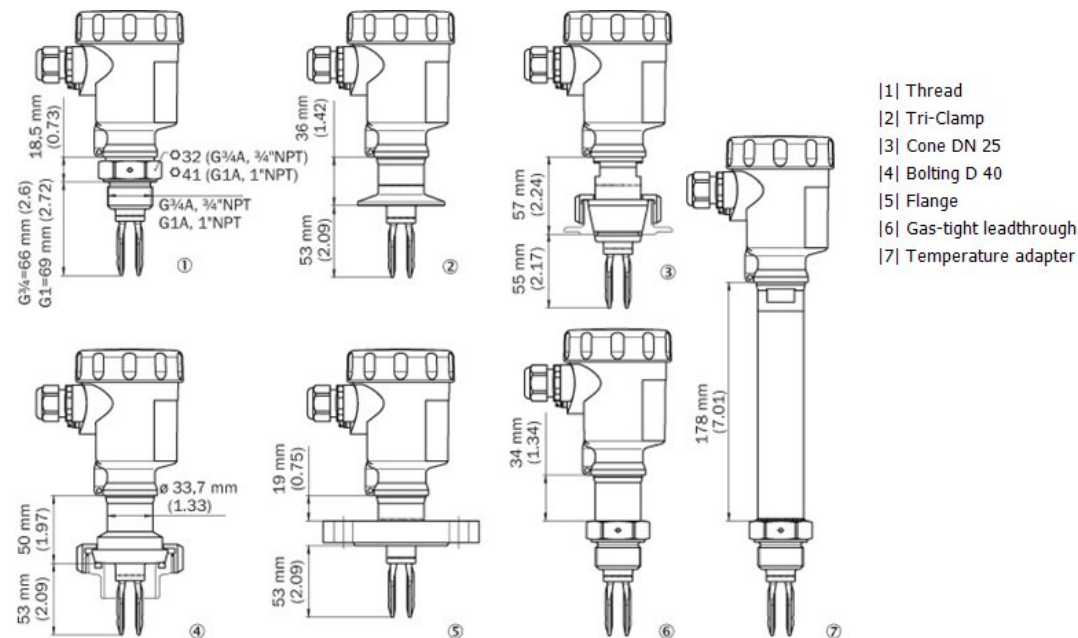
### Electrical data

|                      |                                                           |
|----------------------|-----------------------------------------------------------|
| Temperature drift:   | 0,03 mm/K                                                 |
| Enclosure rating:    | IP 66                                                     |
| Power consumption:   | < 4.2 mA                                                  |
| Protection class:    | 0, 1                                                      |
| Initialization time: | 3                                                         |
| Output signal:       | Contactless electronic switch: 20 V AC/DC ... 253 V AC/DC |
| Hysteresis:          | 2 mm                                                      |
| Output current:      | < 400 mA                                                  |
| Capacitive load:     | 100                                                       |
| Inductive load:      | 1 H                                                       |
| Connection type:     | M20 x 1.5                                                 |

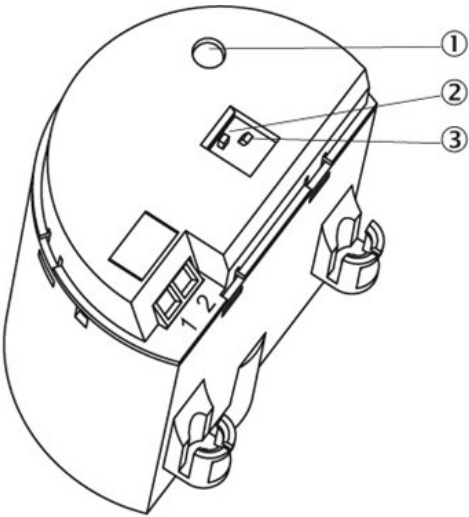
### Ambient data

|                                |                  |
|--------------------------------|------------------|
| Ambient operating temperature: | -40 °C ... 70 °C |
| Ambient storage temperature:   | -40 °C ... 80 °C |

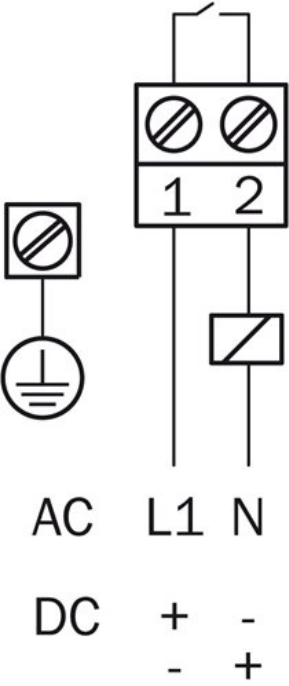
### Dimensional drawing



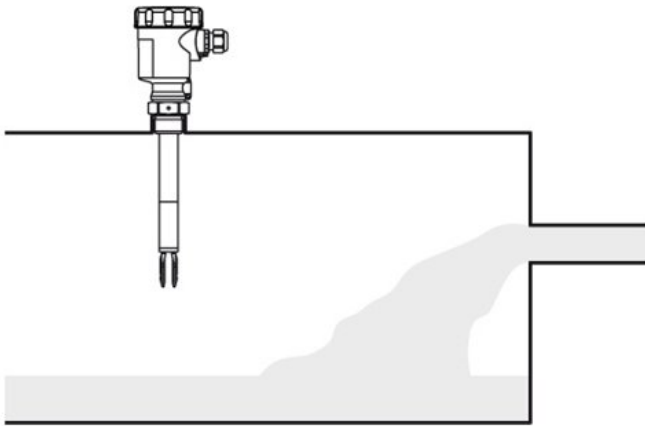
Electronic module



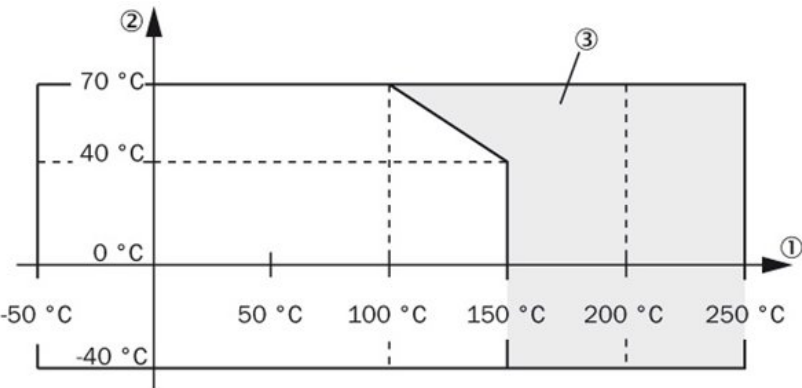
Contactless electronic switch connection diagram



Instruction for installation

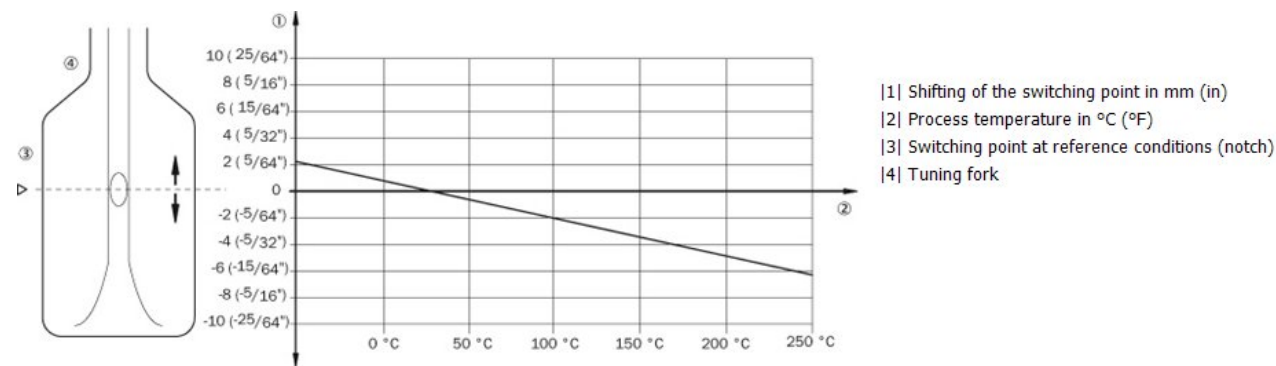


Ambient temperature - process temperature



- [1] Process temperature in °C (°F)
- [2] Ambient temperature in °C (°F)
- [3] Temperature range with temperature adapter

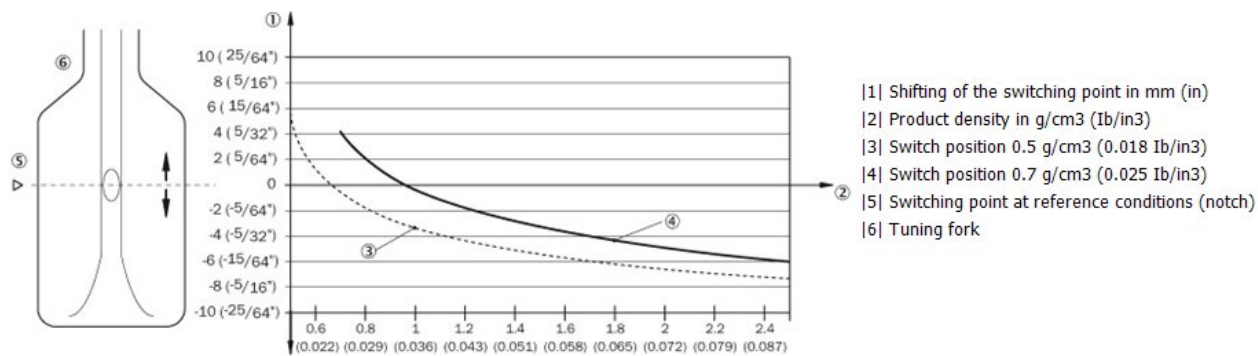
Influence of the process temperature on the switching point



Influence of the process temperature to the switching point



Influence of the product density on the switching point



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