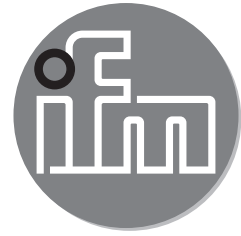


ifm electronic



**Operating instructions**  
(Safety-related part ATEX / IECEx)  
Inductive NAMUR sensors

UK

NS\*\*\*\*

80231776 / 00 01 / 2016

## Remarks for safe use in hazardous areas

### Functions and features

- Use in hazardous areas according to the classification

**II 1G**

(group II, category 1G, apparatus for gas atmosphere).

The requirements of the standards EN 60079-0:2009, EN 60079-11:2012, EN 60079-26:2007+Corr.2009 are met.

**II 2G**

(group II, category 2G, apparatus for gas atmosphere).

The requirements of the standards EN 60079-0:2009, EN 60079-11:2012 are met.

EC type examination certificate

**PTB 02 ATEX 2217**

- Use in hazardous areas according to the classification

**II 1D**

(group II, category 1D, apparatus for dust atmosphere).

The requirements of the standards IEC 60079-0:2011, EN 60079-11:2012 are met.

EC type examination certificate





**BVS 04 ATEX E153**

The requirements of the standards IEC 60079-0:2011+Corr.2012+Corr.2013 and IEC 60079-11:2011+Corr.2012 are met.

IECEx certificate

**IECEx BVS 06.0003**

- Marking

|   |                      |
|---|----------------------|
|  II 1G | Ex ia IIB T6 Ga      |
|  II 1D | Ex ia IIIC T 90°C Da |
|  II 2G | Ex ia IIC T6 Gb      |
|  II 1D | Ex ia IIIC T 90°C Da |

### Installation / Set-up

The units must only be installed, connected and set up by qualified staff. The qualified staff must have knowledge of types of protection, regulations and provisions for apparatus in hazardous areas.

Check whether the classification (see "Marking" above and marking on the unit) is suitable for the application.

- Connection only to intrinsically safe certified circuits or evaluation amplifiers which do not exceed the following maximum values of the units:

**Ui = 15 V, Ii = 50 mA, Pi = 120 mW**

- Permissible operating temperature of the application (referred to the maximum permissible power of 120 mW):

|             |
|-------------|
| -20...+70°C |
|-------------|

- Maximum effective internal inductance (Li) and capacitance (Ci):  
The values apply to potted cables.

| Article no. | Cable length | Internal inductance (total) in $\mu\text{H}$ | Internal capacitance (total) in nF |
|-------------|--------------|--|------------------------------------|
| NS5003      | 2 m          | 110  | 80                                 |
| NS501A      | 12 m         | 120  | 85                                 |

UK

### Installation remarks / Installation

- Adhere to the relevant national regulations and provisions.
- Avoid electrostatic charging on plastic units and cables.
- Protect the units efficiently against damage.
- The cable must be firmly laid and protected efficiently against damage.
- The units are not suitable for installation in walls which separate zone 0 from zone 1.
- The relevant installation regulations (e.g. EN 60079-14) must be adhered to.
- Steps must be taken to ensure the equalisation of potential of metal parts (also fixing material).

### Maintenance / Repair

The unit must not be modified nor can it be repaired. In case of a fault please contact the manufacturer.

If needed, you can obtain data sheets or EC type test certificates from the manufacturer (see cover sheet / back).

You can find the IECEx online certificate at [www.iecex.com](http://www.iecex.com)