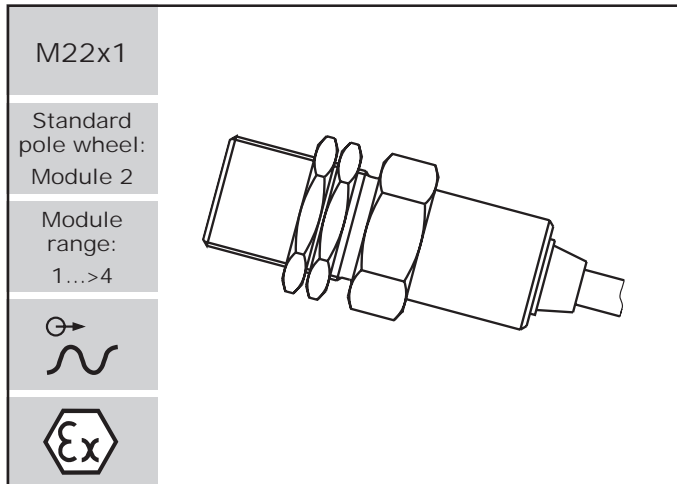


DSE 2210 A, S, M

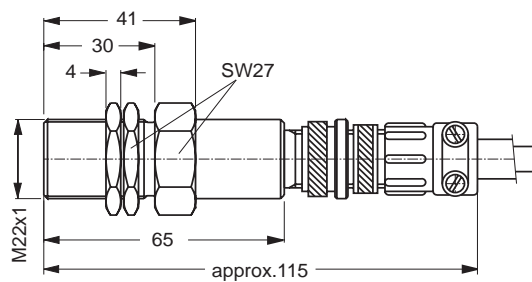


Features

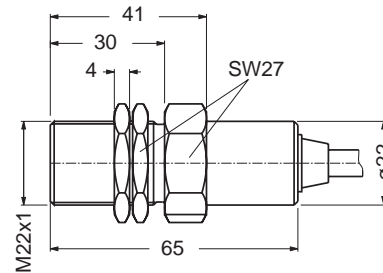
- Without line amplifier
- High temperature version
- Available as model FTG...Ex in intrinsically safe class Ex i G5 (zone 1)

Dimensions

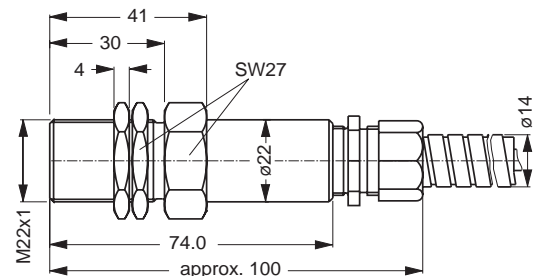
Version A



Version S



Version M



Model overview

Type	Part Nr.	Connection	Housing thread.	Weight [g]	Operating temperature [°C]	Notes
DSE 2210 ATZ	304Z-03022	Connector	M22x1	200	-25...+85	previously FTG 1051 A
DSE 2210.10 ATZ Ex	347Z-03164	Connector	M22x1	200	-20...+65	previously FTG 1055 A Ex
DSE 2210 STZ	304Z-03023	Cable 5 m	M22x1	580	-25...+85	previously FTG 1051 S
DSE 2210.10 STZ Ex	347Z-03165	Cable 5 m	M22x1	580	-20...+65	previously FTG 1055 S Ex
DSE 2210 MTZ	304Z-03024	Protection hose 5 m	M22x1	1400	-25...+85	previously FTG 1051 SM
DSE 2210.10 MTZ Ex	347Z-03261	Protection hose 5 m	M22x1	1400	-20...+65	previously FTG 1055 SM Ex
DSE 2210 AHZ	304Z-03025	Connector	M22x1	200	-40...+150	previously FTG 1051 AH
DSE 2210 SHZ	304Z-03026	Cable 2 m	M22x1	340	-40...+150	previously FTG 1051 SH

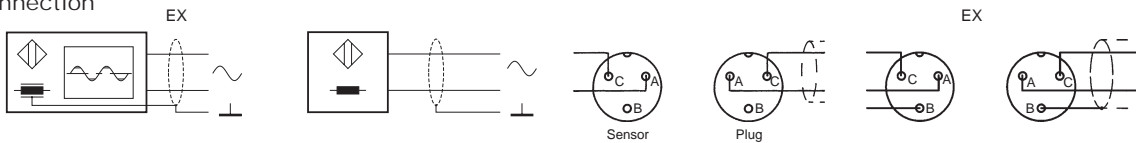
Electromagnetic Sensor without line amplifier

Type DSE 2210
Version A, S, M

Technical Data

Supply Power supply	Active sensor without power supply. Reverse polarity protection. No current consumption. Coil inductance acc. to Technical Data (see table 1).
Input Frequency range	~10 Hz...25 kHz
Noise immunity	Cable shield connected to the supply negative pole. Noise generator between housing and electronics. 1.5 kV/1.5 ms/max. 5 Hz (source resistance 500 Ω), 2.0 kV/HF-bursts (level 4 in accordance with IEC 801-4), 2.5 kV/1 MHz damped resonance (class III in accordance with IEC 255-4).
Pole wheel	Ferromagnetic toothed wheel i.e. Ust37-2, involute gear form preferred. Module ≥ 1 , min. tooth width 6 mm, side offset with min. tooth width: < 0.2 mm, eccentricity < 0.2 mm. <u>Pole wheel-sensor gap</u> ≥ 0.1 mm. Gap depending on rotational speed (circumferential) and module acc. to diagrams A1, B1 and Technical Data (see table 1).
Output Signal output	A.C. voltage, approx. sinusoidal. Amplitude dependent on rotational speed, pole wheel-sensor gap, pole dimensions and structural shape (involute gear form preferred). Characteristics in diagram A1 show the dependence on gap d. Diagram B1 shows lowest measuring speed N100 for different modules and gaps d. Output voltage U_n at rotational speed of 5 m/sec is the reference value. (I.e. at pole wheel- \varnothing 64 mm, $n = 1500 \text{ min}^{-1}$) acc. to Technical Data (see table 1). Short circuit proof and protected against reverse polarity.

Connection



Shield to be connected with 0 V of power supply.

Mechanical Protection class	IP67 (cable connection), IP50 (jack connection). IP67 (head version T), IP68 (head version H and Ex).
Vibration immunity	20 g_n in the range 5...2000 Hz.
Shock immunity	50 g_n during 20 ms, half sine wave.
Operating temperature	Acc. to model overview.
Insulation	Housing, cable screen and system galvanically isolated (500 V/50 Hz/1 min).
Housing	Stainless steel 1.4305, front side hermetically sealed, electronic components potted in a chemical- and age-proof synthetic resin. Dimensions acc. to model overview and dimensional drawings.
Weight	Acc. to model overview.
Operating instructions	304E-63918 Standard, 347E-63910 Ex-version.

Versions

Version ST	<u>PVC cable</u> : Part nr. 824L-30894, 2wire, 2 x 0.75 mm ² , stranded wire (metal net insulated from the housing), grey. Outer \varnothing max. 6.7 mm, bending radius min. 60 mm, weight 70 g/m.
Version SH	<u>Teflon cable</u> : Part nr. 824L-31841, 2wire, 2 x 0.75 mm ² , stranded wire (metal net insulated from the housing), black. Outer \varnothing max. 5.0 mm, bending radius min. 80 mm, weight 45 g/m. Standard length for version SH: 5 m.
Version MT	<u>Protection hose over PVC cable</u> : Part nr. 825G-30924, tube made of profile milled steel plate with PVC cover, grey. Weather and water proof, conditionally oil and acid resistant. Outer \varnothing 14 mm, bending radius min. 40 mm, weight 130 g/m. Standard length for version MT: 5 m.
Version A	<u>Connection type</u> : 820E-31142. <u>Connection plug</u> : 820E-31141

DSE
...Z