

# Position measurement in elevator technology

- Absolute encoders with EnDra<sup>®</sup> technology
- CANopen LIFT CiA 417
- Galvanic isolated
- LED for diagnosis
- D-SUB connector, 9-pin

**CANopen**<sup>®</sup> **LIFT**



**IndustrieROBUST**

# Position measurement in elevator technology

## ... Encoder WDGA58B CANopen with 9-pin D-SUB connector



**EnDra®**  
Technologie

**CANopen LIFT**

- EnDra® maintenance-free and environmentally friendly
- Galvanic isolation
- Communication Profile according to CiA 301
- Application Profile CANopen LIFT CiA 417
- Single-/Multiturn (max. 14 bit / 39 bit)
- Future-oriented technology with 32 Bit processor
- 2-colour-LED as indicator for operating condition and error message appropriate CiA 303-3
- Connector outlet male: D-SUB, 9-pin

### Mechanical Data

#### Housing

Flange	clamping flange
Flange material	aluminum
Housing cap	steel case chrome-plated, magnetic shielding
Housing	Ø 58 mm

#### Shaft(s)

Shaft material	stainless steel
Shafts	Ø 6 mm / Ø 8 mm / Ø 10 mm / Ø 3/8"
Shaft length	L: 12 mm / 20 mm
Permis. shaftloading radial	max. 125 N / 220 N
Permis. shaftloading axial	max. 120 N
Max. operating speed	8000 rpm

### Electrical Data

Power supply/ Current consumption	10 VDC up to 32 VDC: max. 100 mA
Power consumption	max. 1 W

### Sensor data

Singleturn technology	innovative hall sensor technology
Singleturn resolution	16,384 steps/360° (14 bit)
Singleturn accuracy	< ±0,35°
Singleturn repeat accuracy	< ±0,20°
Intern cycle time	≤ 600 µs
Multiturn technology	patented EnDra®technology no battery and no gear.
Multiturn resolution	up to 262,144 revolution (18 bit) with high precision value up to 39 bit.

### General Data

Connections	connector outlet male D-SUB, 9-pin
Protection rating (EN 60529)	IP40
Operating temperature	-40 °C up to +80 °C
Storage temperature	-40 °C up to +100 °C

### Interface

#### Interface: CAN

Protocol:	CANopen
	<ul style="list-style-type: none"> <li>• Communication profil CiA 301</li> <li>• Application Profile CANopen LIFT CiA 417 V2.0</li> <li>• Up to three virtual devices <i>car position unit (configurable)</i></li> </ul>

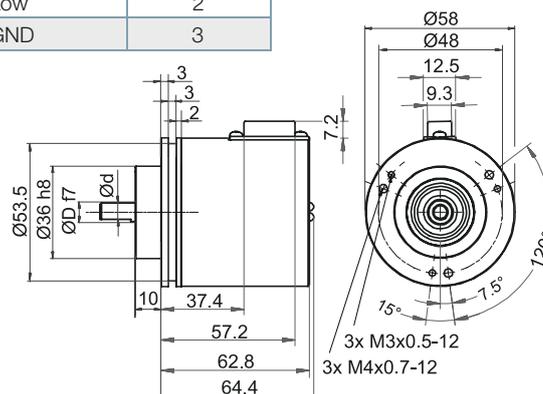
Node number: 1 up to 127 (default 4)

Baud rate: 50 kBaud up to 1 MBaud with automatic bit rate detection.

Advice: The standard settings as well as any customization in the software can be changed via LSS (CiA 305) and the SDO protocol, e. g. PDOs, Scaling, Heartbeat, Node-ID, Baud rate, etc.

Programmable CAN transmission modes: **Synchronous mode:** when a synchronisation telegram (SYNC) is received from another busnode, PDOs are transmitted independently. **Asynchronous mode:** a PDO message is triggered by an internal event. (e.g. change of measured valued, internal timer, etc.)

Assignments	
+UB	9
GND	6
CANHigh	7
CANLow	2
CANGND	3



**Have any questions?** Call us at tel. +49 (0) 67 22 / 99 65 - 414, send us an e-mail at support-wdga@wachendorff.de or visit our website: [www.wachendorff-automation.com/wdga58bcanceliftgalv](http://www.wachendorff-automation.com/wdga58bcanceliftgalv)



Wachendorff Automation GmbH & Co. KG  
Industriestrasse 7 • D-65366 Geisenheim

Tel.: +49 (0) 67 22 / 99 65 - 25  
Fax: +49 (0) 67 22 / 99 65 - 70  
E-Mail: [wdg@wachendorff.de](mailto:wdg@wachendorff.de)  
[www.wachendorff-automation.com](http://www.wachendorff-automation.com)



Your distributor: