

GELBAU - SENSING STRIPS

3100.1610N

GELBAU PROFILE 51MM NBR

- No mechanical components
- Easy installation
- IP67 (factory fitted)



PRODUCT DESCRIPTION

The sensing strips consist of two layers of rubber, one with conductive and one normal insulating rubber. A copper wire embedded in two separated layers of conductive rubber together with a resistor at the end of the sensing strip, forms a closed circuit. If the separated layers are pressed together there is a short-circuit, the control unit react and its outputs release. In the same set hammer the control unit reacts to an open-circuit in the cable or in the sensing strip's copper conductor. Several sensing strips can be easily connected in series. Up to 100 m of sensing strip can be connected to one control unit.

TECHNICAL DATA

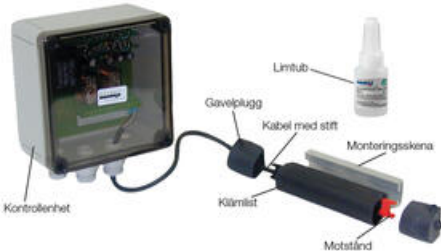
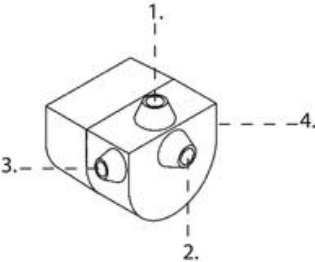
Ingress protection class	IP67 (factory fitted)
Ambient temperature	-20 °C to +80 °C
Cable connection	2, 5 or 15 m cable with pin connector
Max. cable length	50 m
Max. number of sensing strips	No limit (up to 100 m)
Material	EPDM or NBR (nitrile)
Contact voltage (operation)	Approx. 5 V from the control unit
Contact current (operation)	0.6 mA
Min. activation force	10 N
Installation	Use our mounting rail
Safety category	3 in accordance with EN954-1 with control unit
Standard	EN1760-2
Conforming to	MD, EMC, LVD
Approvals	

Chemical properties

Liquid	Resistant:	
	EPDM	Nitrile
Water	Excellent	Excellent
Acids (diluted)	Poor	Good

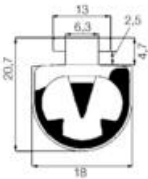
Solvents	Poor	Good
Oils	Poor	Good
Petrol	Poor	Good
Ozone	Excellent	Poor

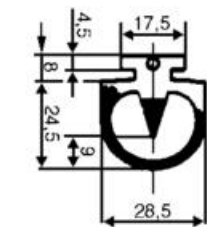
CONNECTION

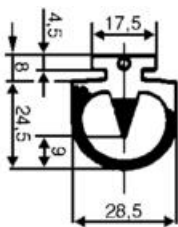
A complete system consists of the following:	Cable outputs
	
Indicate the cable output number when ordering factory fitted strips.	

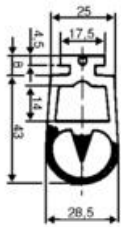
ORDER NUMBER

Sensing strips (dimensions in mm)

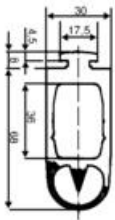
		
Order no.	Description	Material
3100.0118	Sensing strip 21 mm, black	EPDM
3100.0118W	Sensing strip 21 mm, white	EPDM
3100.0118N	Sensing strip 21 mm, black	Nitrile



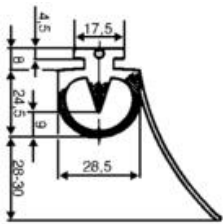
		
Order no.	Description	Material
3100.0110I	Sensing strip 32.5 mm, black	EPDM
3100.0110RED	Sensing strip 32.5 mm, red	EPDM
3100.0110Y	Sensing strip 32.5 mm, yellow	EPDM
3100.0110N	Sensing strip 32.5 mm, black	Nitrile



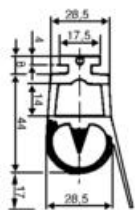
Order no.	Description	Material
3100.1610	Sensing strip 51 mm, black	EPDM
3100.1610N	Sensing strip 51 mm, black	Nitrile



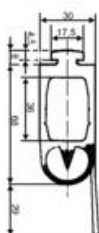
Order no.	Description	Material
3100.0310	Sensing strip 76 mm, black	EPDM



Order no.	Description	Material
3100.0510	Sensing strip 32.5 mm with seal	EPDM



Order no.	Description	Material
3100.0804	Sensing strip 51 mm with seal	EPDM



Order no.	Description	Material
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3100.0210	Sensing strip 76 mm with seal	EPDM
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Installation components

For sensing strip 3100.0118

1. Sensing strip



Order no.	Description	Material
3100.0118	Sensing strip 21 mm, black	EPDM
3100.0118W	Sensing strip 21 mm, white	EPDM
3100.0118N	Sensing strip 21 mm, black	Nitrile

2. End cap



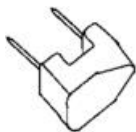
Order no.	Description	Material
3050.1318	End cap (130/18)	EPDM
3050.1318W	End cap (130/18), white	EPDM
3050.1318N	End cap (130/18), nitrile	Nitrile

3. Cable with pin



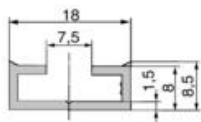
Order no.	Description
3020.1183	Connection cable (118/03), 3 m
3020.1185	Connection cable (118/05), 5 m

4. Resistor with pin



Order no.	Description
3031.1186	Resistor (118), 8.2 kOhm

5.

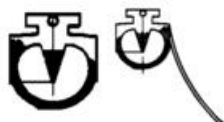


Order no.	Description
3045.1219	Mounting rail (112/A7) Only available in 2000, 4000 mm...

Installation components

For sensing strips 3100.0110 and 3100.0510

1. Sensing strip



Order no.	Description	Material
3100.0110I	Sensing strip 32.5 mm, black	EPDM
3100.0110RED	Sensing strip 32.5 mm, red	EPDM
3100.0110Y	Sensing strip 32.5 mm, yellow	EPDM
3100.0110N	Sensing strip 32.5 mm, black	Nitrile

2. End cap



Order no.	Description	Material
3050.1302	End cap (130/2)	EPDM
3050.1302RED	End cap (130/2), red	EPDM
3050.1302Y	End cap (130/2), yellow	EPDM
3050.1302N	End cap (130/2N), nitrile	Nitrile

3. Cable with pin



Order no.	Description
3020.1300B	Connection cable, 0.35 m
3020.1301B	Connection cable (130/01), 1m
3020.1302B	Connection cable (130/02), 2 m
3020.1305B	Connection cable (130/05), 5 m
3020.1307B	Connection cable (130/07), 15 m

4. Resistor with pin

	
Order no.	Description
3031.1306B	Resistor 8.2 kΩ (red)

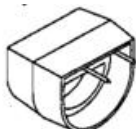
5. Corner connector

		
Order no.	Description	Material
3050.0071	Corner connector 90°, horizontal	EPDM
3050.0071N	Corner connector 90°, horizontal, nitrile	Nitrile
Other angles/colours on request		

6. Corner connector

		
Order no.	Description	Material
3050.0072	Corner connector 90°, vertical	EPDM
3050.0072N	Corner connector 90°, vertical, nitrile	Nitrile
Other colours on request		

7. Connector

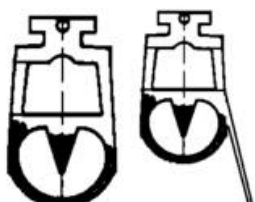
	
Order no.	Description
3050.0061	Straight connector for sensing strip 3100.0110I

*Some order numbers have the additional designation "N" which means they are made of oil-resistant nitrile. Without this additional designation the material is EPDM.

Installation components

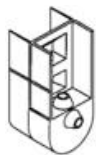
For sensing strips 3100.1610 and 3100.0804

1. Sensing strip

	
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Order no.	Description	Material
3100.1610	Sensing strip 51 mm, black	EPDM
3100.1610N	Sensing strip 51 mm, black	Nitrile
3100.0804	Sensing strip 51 mm with seal	EPDM

2. End cap



Order no.	Description	Material
3050.1303	End cap (130/3)	EPDM
3050.1303N	End cap (130/3N), nitrile	Nitrile

3. Cable with pin



Order no.	Description
3020.1300B	Connection cable, 0.35 m
3020.1302B	Connection cable (130/02), 2 m
3020.1305B	Connection cable (130/05), 5 m
3020.1307B	Connection cable (130/07), 15 m

4. Resistor with pin



Order no.	Description
3031.1306B	Resistor 8.2 kΩ (red)

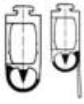
5. Corner connector



Order no.	Description
3050.0074	Corner connector (h=51 mm)

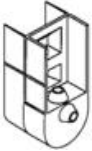
For sensing strips 3100.0310 and 3100.0210

6. Sensing strip



Order no.	Description
3100.0310	Sensing strip 76 mm, black
3100.0210	Sensing strip 76 mm with seal

7. End cap



Order no.	Description	Material
3050.1303	End cap (130/3)	EPDM
3050.1303N	End cap (130/3N), nitrile	Nitrile

8. Cable with pin



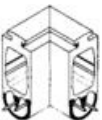
Order no.	Description
3020.1300B	Connection cable, 0.35 m
3020.1302B	Connection cable (130/02), 2 m
3020.1305B	Connection cable (130/05), 5 m
3020.1307B	Connection cable (130/07), 15 m

9. Resistor with pin



Order no.	Description
3031.1306B	Resistor 8.2 k Ω (red)

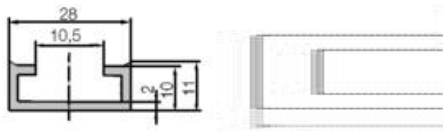
10. Corner connector



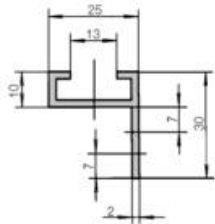
Order no.	Description	Material
3050.0073	Corner connector (h=76 mm)	EPDM

Mounting rail

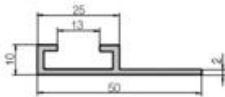
11. Installation rail

	
Order no.	Description
3045.1213	Mounting rail (112/A1) Only available in 2000, 4000 mm etc.
3045.1212	Mounting rail (112/A) Only available in 2000, 4000 mm etc.

12. Installation rail

	
Order no.	Description
3045.1214	Mounting rail (112/A2) Only available in 2000, 4000 mm etc.

13. Installation rail

	
Order no.	Description
3045.1215	Mounting rail (112/A3) Only available in 2000, 4000 mm etc.

*Some order numbers have the additional designation "N" which means they are made of oil-resistant nitrile. Without this additional designation the material is EPDM

SPECIFICATIONS

Approvals	CE, TÜV NORD
Conforming To	EMC, LVD, MD
Contact Current	0.6 mA
Contact Voltage	5 V
Height	51 mm
IP Class	IP67
Material	NBR
Number Of Terminal Strips Max	10
Temperature ambient from	-10 °C

Temperature ambient to	50 °C
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Terminal Strip Length Max	100 m
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