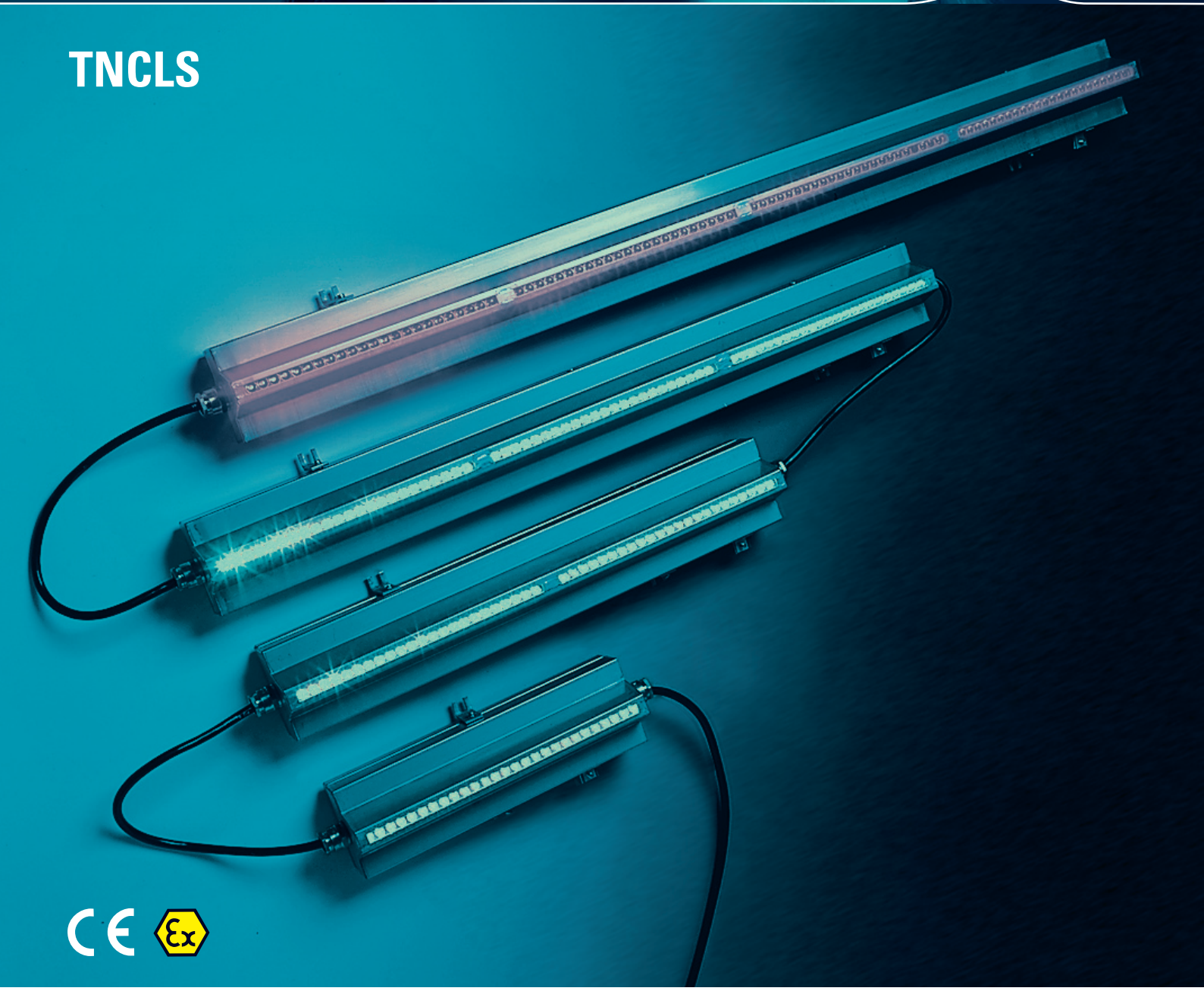
Technor

EEx em Backlights for Level Gauges

TNCLS



Features

Technor's Backlight for Level Gauges is based on the use of the newest within LED technology. The product has been available since 1987, and has proven to be a success. The Backlight is easy to install, and may be adapted to most types of Level Gauges. Additionally, it has a very long lifetime, and the power consumption is low. The equipment is maintenance free.

- Enclosure material in acid resistant stainless steel (SS316).
- LED´s are very resistant against vibrations.
- High mechanical strength and corrosion resistance. Suitable for harsh environments.
- Tailor made installation bracket minimizes time spent on installation.
- High ingress protection, IP66.
- Special assembly kits for high- or low-temperature Level Gauges.
- High operational reliability and low life cycle costs.
- ATEX approved.

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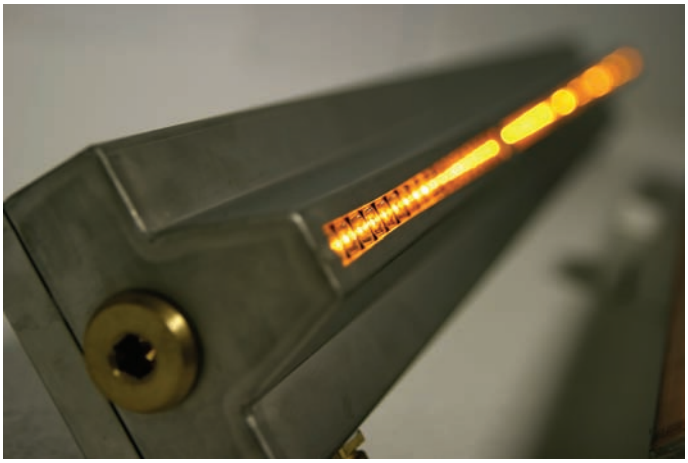
Applications

The range of TNCLS Backlights are designed to meet all kinds of industry where Level Gauges are installed, and an explosive atmosphere may be present.

General Specifications

Material	Acid resistant stainless steel SS316
Surface treatment	Acidized
IP Rating	IP66
Temperature	-20°C - +45°C (T4)
Humidity	100%
Approvals	DNV-2002-OSL-ATEX-0195
Standards	Cenelec EN50014, EN50019, EN50028
Ex-Code	EEx em II T4 Ⓔx II 2 G
Lumination colour	Yellow
Voltage	220-240VAC or 254VAC
Frequency	50-60Hz
Power comsumption	Approx. 3VA per module
Earthing	M6 inside and outside
Terminals	Minimum 4x2,5m²
Cable entry	Max. 2xM25 in top and/or bottom, and/or sides

Size-qty. modules	Total length (A) mm	Light exposure (B) mm	Weight kg
27-1	270	250	2,3
30-1	300	280	2,5
34-1	340	320	2,7
36-1	360	340	2,8
27-2	540	520	4,3
30-2	600	580	4,6
34-2	680	660	5,1
36-2	720	700	5,3
27-3	810	790	6,2
30-3	900	880	6,7
34-3	1020	1000	7,3
36-3	1080	1060	7,5
30-4	1200	1180	8,5



Several units can be assembled to one column

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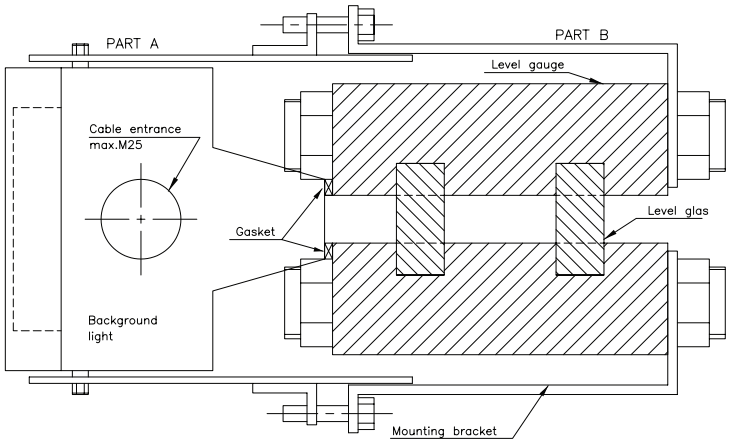
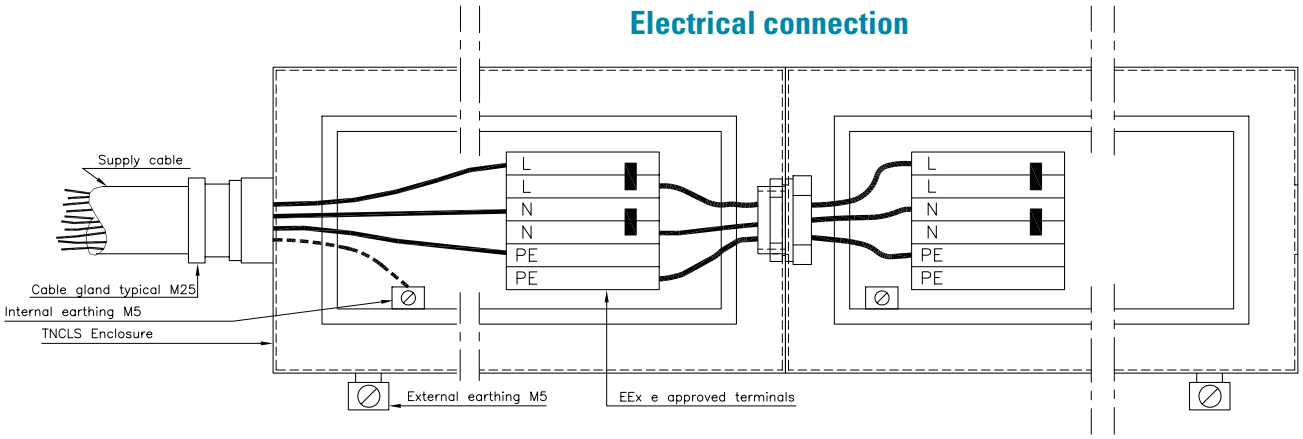
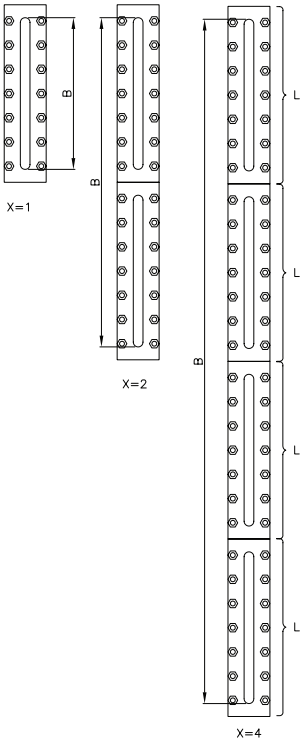
Mounting brackets standard version



Electrical connection



Level Gauge



Type key: TNCLS L-X

L = Module length
X = No. of modules
Total length: A = L * X
Other sizes upon request.

Size-qty. modules	Total length (A) mm	Light exposure (B) mm	Weight kg
27-1	270	250	2,3
30-1	300	280	2,5
34-1	340	320	2,7
36-1	360	340	2,8
27-2	540	520	4,3
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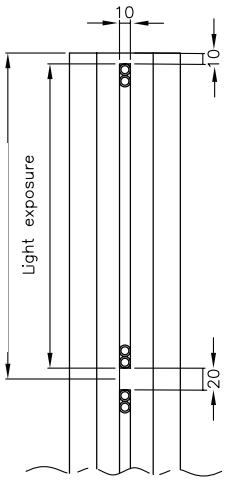
Module details



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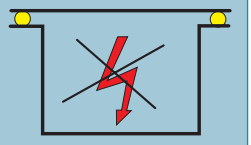
Hazardous area information & terminology

ATEX Directive

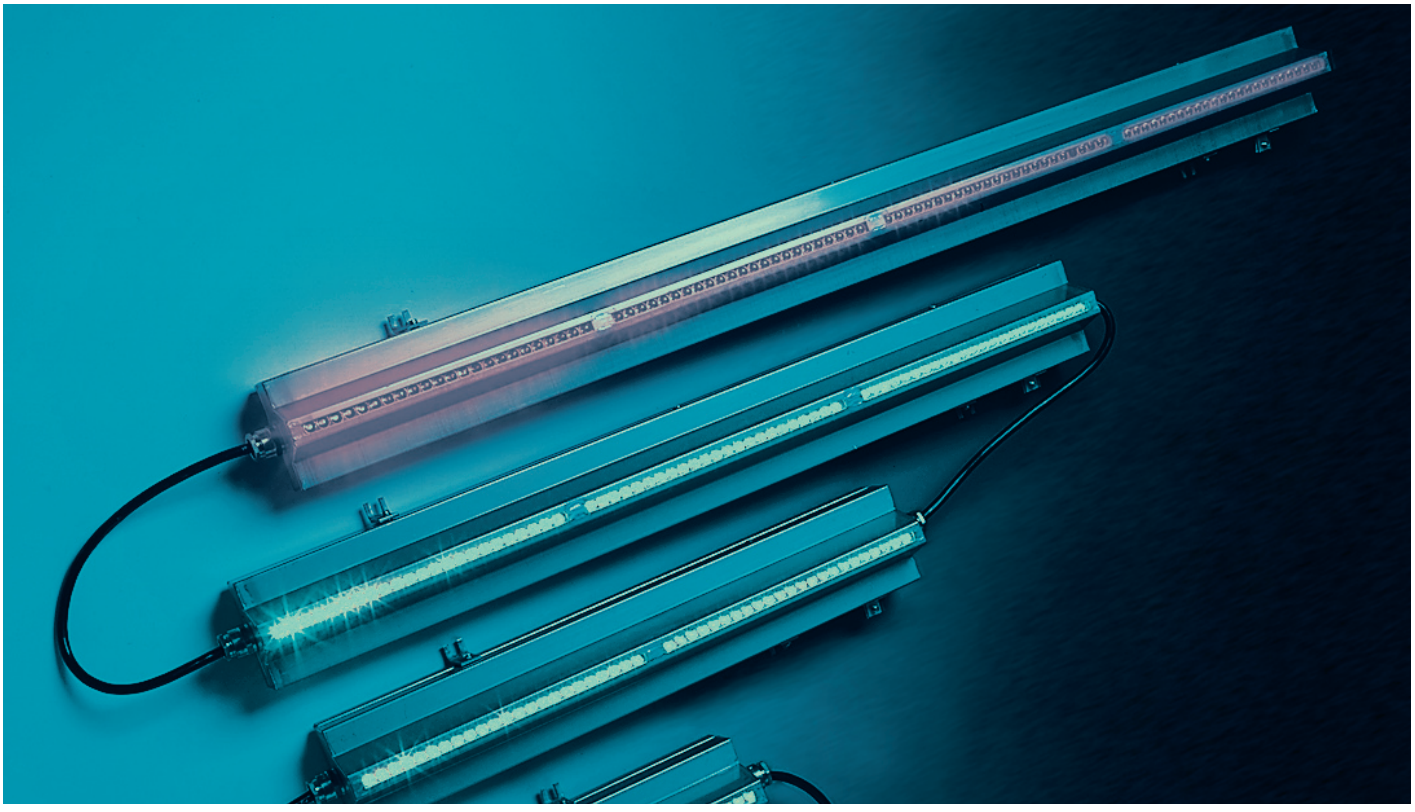
The ATEX Directive, derived from the French "ATmosphères EXplosibles" and formally known as 94/9/EC, contains the ESR (Essential Safety Requirements) to which electrical equipment and protective systems used within potentially explosive atmospheres must conform.

The new ATEX Directive currently in place within the European Union was made mandatory on 1st July 2003. Primarily intended for manufacturers of hazardous area equipment for use in the presence of flammable gases, vapours, fumes or dusts, the new directive requires a quality management system to be implemented.

Procedures for the design, manufacture and verification of products are to be approved by a notified body (i.e. DNV, NEMKO, etc.) and all equipment conforming to the new directive will feature CE and Ex Marking.

Applicable EX protection	
EEx e Protection for electrical components that do not spark under normal working conditions but where measures are applied to prevent high temperatures and the occurence of arcs and sparks internally.	
EEx m Protection Parts that could ignite a potentially explosive atmosphere by means of heat or sparks are embedded in a sealing compound such that the potentially explosive atmosphere cannot be ignited. The compound is resistant to physical, electrical, thermal and chemical influences.	

Zone Classification with the presence of GAS	
Zone 1 (Category 2)	An area in which explosive gas is likely to be present during normal operation of the plant.
Zone 2 (Category 3)	An area in which explosive gas is not continuously present, but may exist for a short period of time.



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