# LED illuminated pushbutton for panel mounting Series 8018 for ATEX/IECEx applications



**E4** 



- For installation in enclosure wall, enclosure cover, panels or control
- Installation using a single dia. 30 mm hole
- Beneficial LED technology: Extremely long service life, high luminance, low heat build-up
- Reliable explosion protection thanks to flameproof contact elements and lighting elements

### MY R. STAHL 8018B



R. STAHL Series 8018 LED illuminated pushbuttons switch load, control and signal circuits and show command statuses via a light signal, the colour of which can be determined using the colour filter included in the delivery: Red, yellow, green, blue or white. The long-lasting LEDs ensure high luminance and minimal heat build-up. The buttons are supplied with a connection cable.

	IECEx / ATEX					
Zone	0	1	2	20	21	22
Installation in		•	•		•	•

Selection Table				
Product variant	LED illuminated pushbutto	n Ex e		
Contact material	Contacts	Product Type	Art. No.	Weight
Silver-nickel	1 NC + 1 NO	8018/3113-al-6	269788	740 g
	2 NC	8018/3123-al-6	269789	740 g
	2 NO	8018/3133-al-6	269790	740 g
Product variant	LED illuminated pushbutto	n Ex i		
Contact material	Contacts	Product Type	Art. No.	Weight
Silver-nickel, gold-plated	1 NC + 1 NO	8018/3213-al-6	269791	740 g
	2 NC	8018/3223-al-6	269792	740 g
	2 NO	8018/3233-al-6	269793	740 g

The red, yellow, green, blue and white colour filters are included in the packaging.

Technical Data		
Variant	LED illuminated pushbutton Ex e	LED illuminated pushbutton Ex i
Explosion Protection		
IECEx gas explosion protection	Ex db mb IIC T6 Gb	Ex db mb ia IIC T6 Gb
IECEx dust explosion protection	Ex tb IIIC T80 °C Db	Ex tb IIIC T80 °C Db
ATEX gas explosion protection	II 2 G Ex db mb IIC T6 Gb	II 2 G Ex db mb ia IIC T6 Gb
ATEX dust explosion protection	II 2 D Ex tb IIIC T80 °C Db	II 2 D Ex tb IIIC T80 °C Db
Certificates	ATEX (PTB), China (CQST), IECEx (PTB)	ATEX (PTB), China (CQST), IECEx (PTB)
Declaration of Conformity	ATEX (EUK), China (CCC)	ATEX (EUK), China (CCC)
Notes	Product label may vary. Series devices are labelled wit	n ATEX and IECEx.

**CONTROL DEVICES** 18.02.2024 · PO·en



## **LED illuminated pushbutton for panel mounting**Series 8018 for ATEX/IECEx applications

ectrical service life 10° lighting hours 10° lighting hours  witching capacity AC-12 270 V / 6 A / max. 3000 VA  witching capacity AC-15 270 V / 6 A / max. 1250 VA  witching capacity DC-13 110 V / 1 A / max. 110 W  mbient Conditions  mbient temperature -30 °C +60 °C -30 °C +60 °C  mbient temperature -22 °F +140 °F -22 °F +140 °F  ghting Data  mp White LED White Red Green Blue Yellow Pellow  echanical Data  egree of protection (IP) (IEC 60529) IP65  lictoure material Polyamide Polyamide  Yes Yes  and Other A / max. 1250 VA  110 V / 1 A / max. 110 W  110 V / 1 A / max. 1250 VA  110 V / 1 A / max.			
ated operational voltage AC         270 V           ated operational voltage DC         30 V           ated operational voltage, indicator lamp part         12 (-10%) to 254 (+6%) V AC/DC         U, = 10.8 to 28 V DC           ated operational current, indicator lamp part         0.014 A at 24 V DC         I, = 150 mA           equency         0 to 60 Hz         I0° lighting hours           extrical service life         10° lighting hours         10° lighting hours           witching capacity AC-12         270 V / 6 A / max. 3000 VA         VIII A / max. 110 W           witching capacity AC-15         270 V / 6 A / max. 1250 VA         VIII A / max. 110 W           witching practure         -30 °C +60 °C         -30 °C +60 °C           wibinent temperature         -30 °C +60 °C         -30 °C +60 °C           witching Data         White LED         White LED           winnous colour         White LED         White LED           winnous colour         White Red         Red           Green         Blue         Pelow           yellow         Yellow           eschanical Data         Polyamide         Polyamide           pagee of protection (IP) (IEC 60529)         IP65         IP65           productor length         6 m         6 m		LED illuminated pushbutton Ex e	LED illuminated pushbutton Ex i
Section   Sect			
sated operational voltage, indicator lamp part         12 (-10%) to 254 (+6%) V AC/DC         U, = 10.8 to 28 V DC           ated operational current, indicator lamp part         0.014 A at 24 V DC         I, = 150 mA           equency         0 to 60 Hz         I0° lighting hours         10° lighting hours           witching capacity AC-12         270 V / 6 A / max. 3000 VA         VICHA (Max. 1250 VA           witching capacity AC-15         270 V / 6 A / max. 1250 VA         VICHA (Max. 110 W)           mbient Conditions         30°C +60°C         -30°C +60°C           mbient temperature         -30°C +60°C         -30°C +60°C           mbient temperature         -22°F +140°F         -22°F +140°F           shiring Data         White LED         White LED           minous colour         White Red         Red           Red         Green         Blue           Blue         Yellow         Yellow           sectorical Data         Polyamide         Polyamide           licone-free         Yes         Yes           anductor length         6 m         6 m           anductor length, inches         236 in         104.5 mm		270 V	
150 mA   1	•		30 V
sequency         0 to 60 Hz           sectrical service life         10° lighting hours         10° lighting hours           vitching capacity AC-12         270 V / 6 A / max. 3000 VA         Image: Acceptable of the properties of the	• • • • • • • • • • • • • • • • • • • •		U <sub>i</sub> = 10.8 to 28 V DC
10° lighting hours   10° lig	ated operational current, indicator lamp part	0.014 A at 24 V DC	I <sub>i</sub> = 150 mA
witching capacity AC-12 270 V / 6 A / max. 3000 VA witching capacity AC-15 270 V / 6 A / max. 1250 VA witching capacity DC-13 110 V / 1 A / max. 110 W  mbient Conditions  mbient temperature -30 °C +60 °C -30 °C +60 °C  mbient temperature -22 °F +140 °F -22 °F +140 °F  mbient temperature -22 °F +140 °F  mbient temperature -22 °F +140 °F  white LED White Red Green Bulue Yellow  echanical Data  gree of protection (IP) (IEC 60529) IP65  IP66  I	requency	0 to 60 Hz	
witching capacity AC-15       270 V / 6 A / max. 1250 VA         witching capacity DC-13       110 V / 1 A / max. 110 W         mbient Conditions       -30 °C +60 °C         mbient temperature       -30 °C +60 °C         -22 °F +140 °F       -22 °F +140 °F         ghting Data       White LED         Imp       White LED         White Red Green       Red Red Red Green Blue Yellow         Blue Yellow       Yellow         vertical Data       1965         pagee of protection (IP) (IEC 60529)       IP65         page of protection (IP) (IEC 60529)       IP65         pack of protection (IP) (IEC 60529)       IP65	lectrical service life	10⁵ lighting hours	10⁵ lighting hours
	witching capacity AC-12	270 V / 6 A / max. 3000 VA	
mbient Conditions mbient temperature -30 °C +60 °C -22 °F +140 °F -22 °F +140 °F  ghting Data  Imp White LED White Red Green Blue Yellow Yellow  echanical Data  geree of protection (IP) (IEC 60529) IP65 IP65  inclosure material Polyamide Polyamide  licone-free Yes Yes  and Conductor length, inches 236 in 104.5 mm  104.5 mm  -30 °C +60 °C	witching capacity AC-15	270 V / 6 A / max. 1250 VA	
Inbient temperature -30 °C +60 °C +6	witching capacity DC-13	110 V / 1 A / max. 110 W	
Inbient temperature -22 °F +140 °F  -22 °F	mbient Conditions		
sphting Data Imp White LED White Red Red Green Blue Yellow Yellow  echanical Data  grae of protection (IP) (IEC 60529) IP65 IP65 Iclosure material Polyamide Polyamide Icione-free Yes Yes Inductor length inches 236 in 104.5 mm	mbient temperature	-30 °C +60 °C	-30 °C +60 °C
White LED White Red Red Green Blue Yellow  sechanical Data  egree of protection (IP) (IEC 60529) IP65 IP65 Inclosure material Polyamide Polyamide Iticone-free Yes Yes Senductor length, inches 236 in 104.5 mm  White LED White Red Red Green Blue Yellow Yes IP65 IP65 IP65 IP65 IP65 IP65 IP65 IP65	mbient temperature	-22 °F +140 °F	-22 °F +140 °F
White Red Red Green Blue Yellow Yellow  Echanical Data  Egree of protection (IP) (IEC 60529) IP65 IP65  Inclosure material Polyamide Polyamide  Iticone-free Yes Yes  Enductor length inches 236 in 236 in 104.5 mm	ighting Data		
Red Green Blue Yellow Yellow Yellow  echanical Data  geree of protection (IP) (IEC 60529) IP65 IP65  aclosure material Polyamide Polyamide Polyamide  licone-free Yes Yes  anductor length inches 236 in 236 in 104.5 mm	amp	White LED	White LED
echanical Data  egree of protection (IP) (IEC 60529)  IP65  IP66  IP66	uminous colour	Red Green Blue	Red Green Blue
Polyamide Polyamide Polyamide Polyamide Polyamide Polyamide Polyamide Polyamide Petropoly Pes Ponductor length 6 m 6 m 236 in 236 in 104.5 mm	Mechanical Data	TOTION	I GILOW
Polyamide Polyamide Polyamide Polyamide Polyamide Polyamide Polyamide Propher Pres Pres Pres Pres Pres Pres Pres Pr	egree of protection (IP) (IEC 60529)	IP65	IP65
ponductor length         6 m         6 m           ponductor length, inches         236 in         236 in           epth of cut-out         104.5 mm         104.5 mm	nclosure material	Polyamide	Polyamide
ponductor length         6 m         6 m           ponductor length, inches         236 in         236 in           epth of cut-out         104.5 mm         104.5 mm	licone-free	Yes	Yes
onductor length, inches 236 in 236 in 236 in 104.5 mm 104.5 mm	onductor length	6 m	6 m
·	onductor length, inches	236 in	236 in
	pth of cut-out	104.5 mm	104.5 mm
	•	4.11 in	4.11 in

### Technical Drawings – Subject to Alterations

Schematic 8018/3.13 The numbers in brackets correspond to the core Schematic 8018/3.23 The numbers in brackets correspond to the core Schematic 8018/3.33
The numbers in brackets correspond to the core marking

Accessories			
Figure	Description	Art. No.	Weight
Actuator			
	for illuminated pushbutton (spring return)	155163	19 g

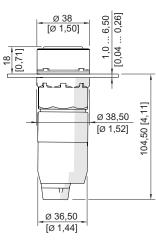
2

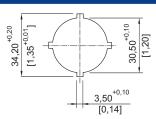
### LED illuminated pushbutton for panel mounting Series 8018 for ATEX/IECEx applications



Spare Parts			
Figure	Description	Art. No.	Weight
Colour filter			
	Colour filter for illuminated pushbutton 8018, all colours	155461	1 g
Closing part			
	8602C3-733-B for closing unused holes in cover, dia. 30.5 mm, NBR	244306	25 g
	8602C3-733-S for closing unused holes in cover, dia. 30.5 mm, silicone	244307	25 g
Colour filter			
	for white illuminated pushbutton	155877	1 g
	for red illuminated pushbutton	155882	1 g
	for yellow illuminated pushbutton	155885	1 g
	for green illuminated pushbutton	155888	1 g
	for blue illuminated pushbutton	155891	1 g

#### Dimensional Drawings (All Dimensions in mm [inches]) – Subject to Alterations





Punch pattern

#### LED illuminated pushbutton

