

# Product data sheet

Specifications



Illuminated emergency stop switching off head, Harmony XB5, plastic, red mushroom 40mm, 22mm, trigger latching push pull, with state indicator

ZB5AT8643M

## Main

Range Of Product	Harmony XALF Harmony XB5
Product Or Component Type	Head for illuminated emergency stop push-button
Device Short Name	ZB5
Bezel Material	Dark grey plastic
Head Type	Standard
Mounting Diameter	22.5 mm
Sale Per Indivisible Quantity	1
Shape Of Signaling Unit Head	Round
Type Of Operator	trigger action and mechanical latching with mechanical state indicator
Reset	Push-pull
Operator Profile	Red mushroom Ø 40 mm, unmarked
Device Presentation	Basic element

## Complementary

Cad Overall Width	40 mm
Cad Overall Height	40 mm
Cad Overall Depth	59 mm
Net Weight	0.034 kg
Mechanical Durability	300000 cycles
Station Name	XALD 1 cut-out XALK 1 cut-out
Electrical Composition Code	M6 for <2 contacts using single blocks in front mounting with integral LED and transformer M10 for <2 contacts using single blocks in front mounting with integral LED MF1 for <2 contacts using single blocks in front mounting with integral LED MR1 for <2 contacts using single blocks in rear mounting with integral LED
Product Compatibility	Integral LED
Compatibility Code	ZB5

## Environment

Protective Treatment	TH
Ambient Air Temperature For Storage	-40...70 °C

<b>Ambient Air Temperature For Operation</b>	-40...70 °C
<b>Overvoltage Category</b>	Class II conforming to IEC 60536
<b>Ip Degree Of Protection</b>	IP54 conforming to IEC 60529
<b>Nema Degree Of Protection</b>	NEMA 13 NEMA 4X
<b>Resistance To High Pressure Washer</b>	7000000 Pa at 55 °C, distance : 0.1 m
<b>Ik Degree Of Protection</b>	IK05 conforming to IEC 50102
<b>Standards</b>	GB 14048.5 UL 508 ISO 13850 IEC 60204-1 CSA C22.2 No 14 IEC 60947-1 JIS C8201-5-1 IEC 60947-5-4 IEC 60947-5-1 JIS C8201-1
<b>Product Certifications</b>	CSA BV LROS (Lloyds register of shipping) DNV GL UL listed
<b>Vibration Resistance</b>	5 gn (f= 2...500 Hz) conforming to IEC 60068-2-6
<b>Shock Resistance</b>	30 gn (duration = 18 ms) for half sine wave acceleration conforming to IEC 60068-2-27 50 gn (duration = 11 ms) for half sine wave acceleration conforming to IEC 60068-2-27

## Packing Units

<b>Unit Type Of Package 1</b>	PCE
<b>Number Of Units In Package 1</b>	1
<b>Package 1 Height</b>	5.3 cm
<b>Package 1 Width</b>	4.4 cm
<b>Package 1 Length</b>	8.2 cm
<b>Package 1 Weight</b>	45.0 g
<b>Unit Type Of Package 2</b>	S02
<b>Number Of Units In Package 2</b>	42
<b>Package 2 Height</b>	15.0 cm
<b>Package 2 Width</b>	30.0 cm
<b>Package 2 Length</b>	40.0 cm
<b>Package 2 Weight</b>	2.208 kg
<b>Unit Type Of Package 3</b>	P06
<b>Number Of Units In Package 3</b>	672
<b>Package 3 Height</b>	77.0 cm
<b>Package 3 Width</b>	80.0 cm
<b>Package 3 Length</b>	60.0 cm
<b>Package 3 Weight</b>	43.7 kg

## Contractual warranty

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Warranty

18 months

## Sustainability

**Green Premium™** label is Schneider Electric's commitment to delivering products with best-in-class environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO<sub>2</sub> products.

**Guide to assessing product sustainability** is a white paper that clarifies global eco-label standards and how to interpret environmental declarations.

[Learn more about Green Premium >](#)

[Guide to assess a product's sustainability >](#)



RoHS/REACH

## Well-being performance

✓ Reach Free Of Svhc

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✓ Toxic Heavy Metal Free

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✓ Mercury Free

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✓ Rohs Exemption Information Yes

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## Certifications & Standards

**Reach Regulation** [REACH Declaration](#)

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**Eu Rohs Directive** Pro-active compliance (Product out of EU RoHS legal scope)  
[EU RoHS Declaration](#)

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**China Rohs Regulation** [China RoHS declaration](#)

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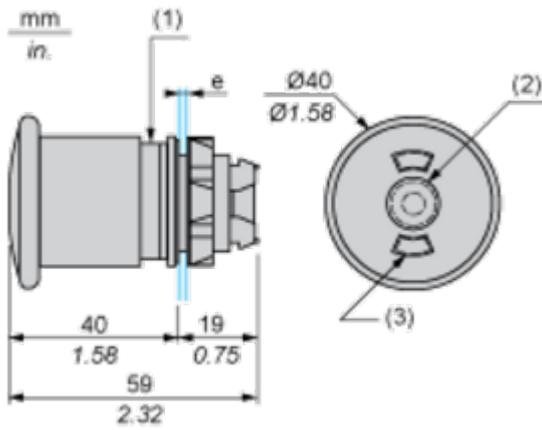
**California Proposition 65** WARNING: This product can expose you to chemicals including: Di-isodecyl phthalate (DIDP), which is known to the State of California to cause birth defects or other reproductive harm. For more information go to [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov)

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Dimensions Drawings

Dimensions

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e: panel thickness: 1 to 6 mm / 0.04 to 0.24 in.

(1) 360° "red/green" mechanical indicator

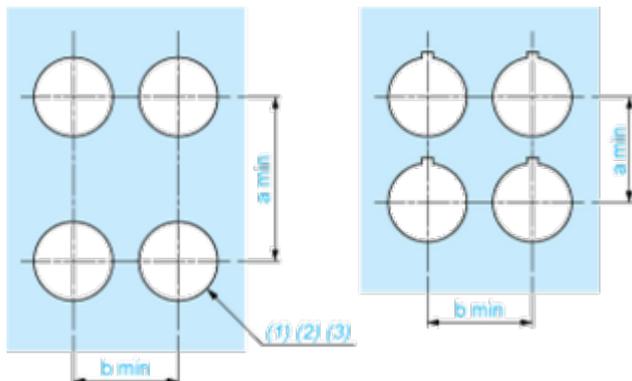
(2) Pilot light

(3) "Red/green" mechanical indicator

Mounting and Clearance

Panel Cut-out for Pushbuttons, Switches and Pilot Lights (Finished Holes, Ready for Installation)

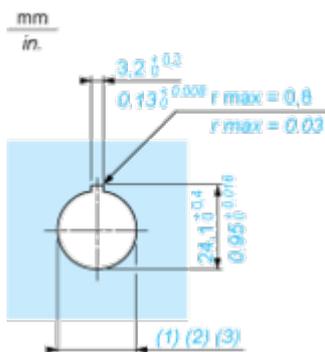
Connection by Screw Clamp Terminals or Plug-in Connectors or on Printed Circuit Board



- (1) Diameter on finished panel or support
- (2) For selector switches and Emergency stop buttons, use of an anti-rotation plate type ZB5AZ902 is recommended.
- (3)  $\varnothing 22.5$  mm recommended ( $\varnothing 22.3_0^{+0.4}$ ) /  $\varnothing 0.89$  in. recommended ( $\varnothing 0.88_0^{+0.016}$ )

Connections	a in mm	a in in.	b in mm	b in in.
By screw clamp terminals or plug-in connector	40	1.57	30	1.18
By Faston connectors	45	1.77	32	1.26
On printed circuit board	30	1.18	30	1.18

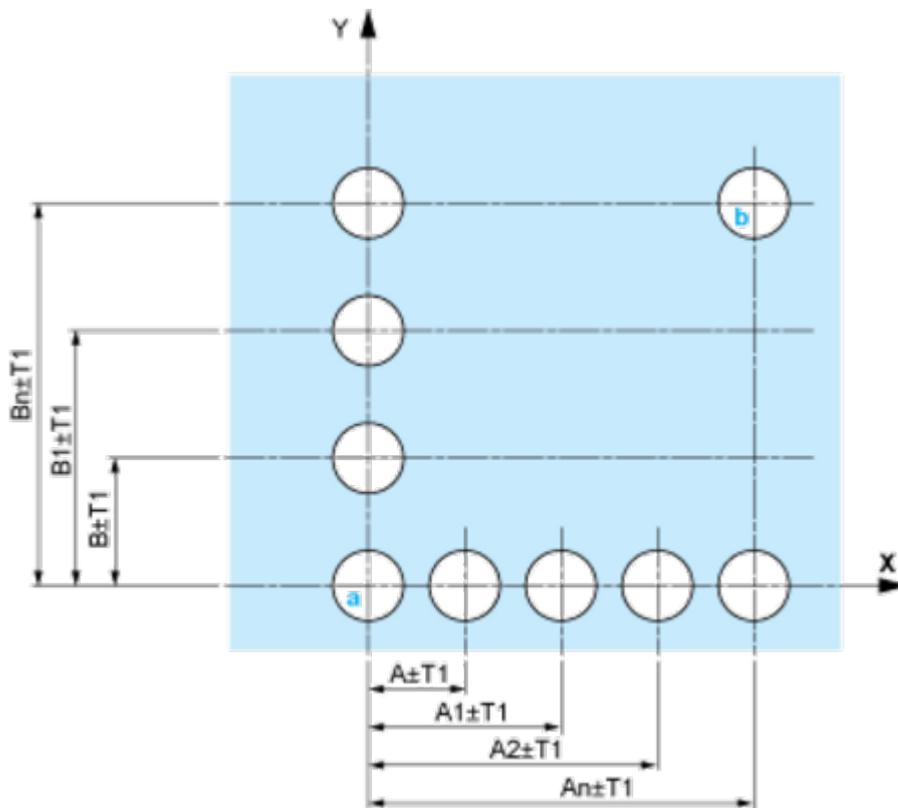
Detail of Lug Recess



- (1) Diameter on finished panel or support
- (2) For selector switches and Emergency stop buttons, use of an anti-rotation plate type ZB5AZ902 is recommended.
- (3)  $\varnothing 22.5$  mm recommended ( $\varnothing 22.3_0^{+0.4}$ ) /  $\varnothing 0.89$  in. recommended ( $\varnothing 0.88_0^{+0.016}$ )

Pushbuttons, Switches and Pilot Lights for Printed Circuit Board Connection

Panel Cut-outs (Viewed from Installer's Side)

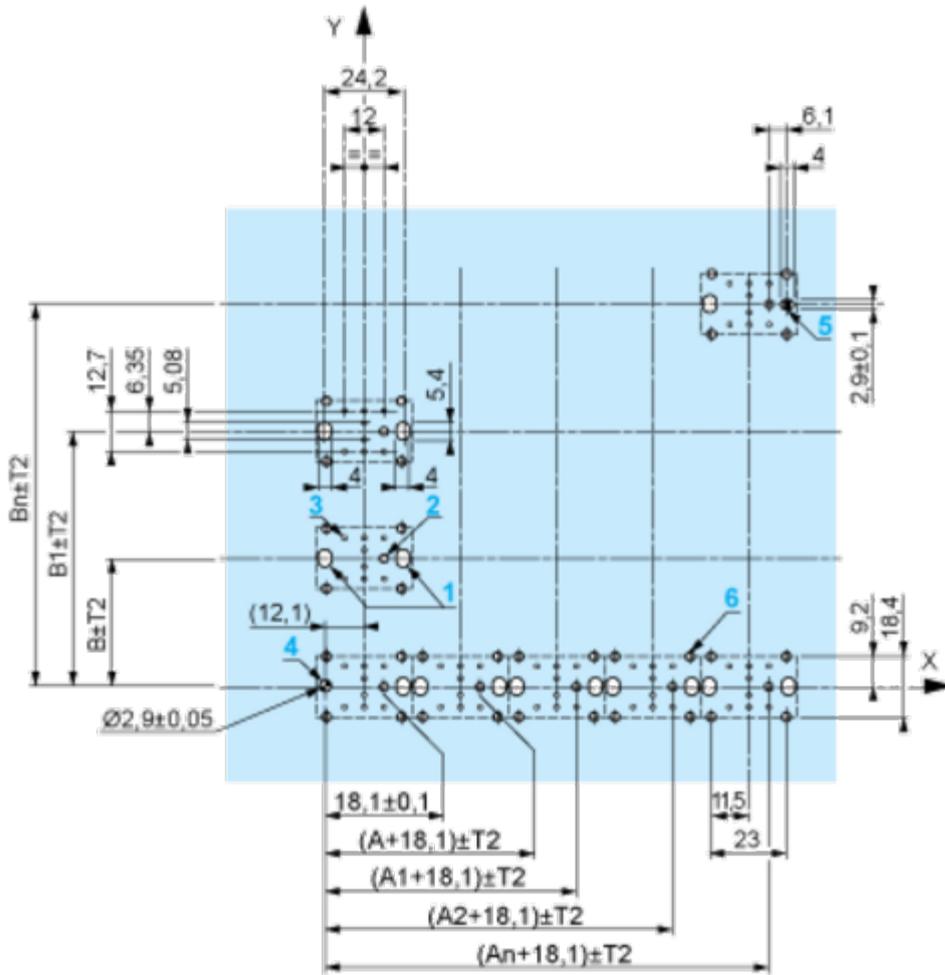


A: 30 mm min. / 1.18 in. min.

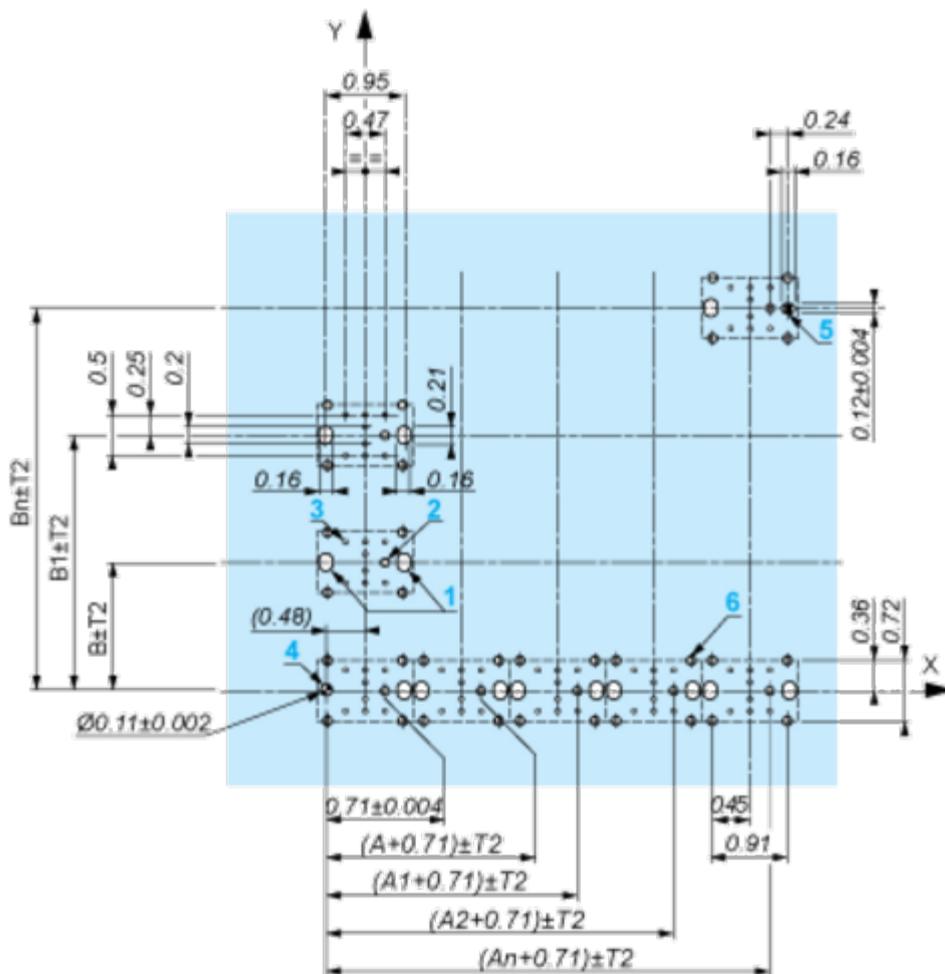
B: 40 mm min. / 1.57 in. min.

**Printed Circuit Board Cut-outs (Viewed from Electrical Block Side)**

Dimensions in mm



A: 30 mm min.  
 B: 40 mm min.  
 Dimensions in in.



A: 1.18 in. min.

B: 1.57 in. min.

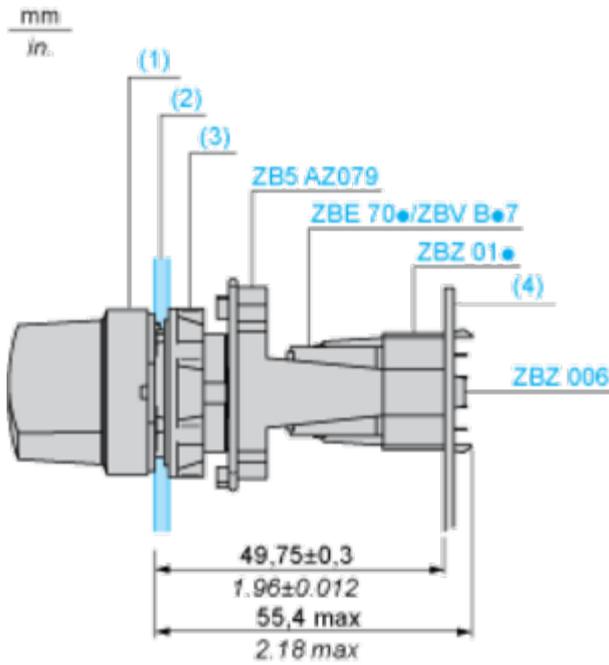
**General Tolerances of the Panel and Printed Circuit Board**

The cumulative tolerance must not exceed 0.3 mm / 0.012 in.: T1 + T2 = 0.3 mm max.

**Installation Precautions**

- Minimum thickness of circuit board: 1.6 mm / 0.06 in.
- Cut-out diameter: 22.4 mm ± 0.1 / 0.88 in. ± 0.004
- Orientation of body/fixing collar ZB5AZ009: ± 2°30' (excluding cut-outs marked a and b).
- Tightening torque of screws ZBZ006: 0.6 N.m (5.3 lbf.in) max.
- Allow for one ZB5AZ079 fixing collar/pillar and its fixing screws:
  - every 90 mm / 3.54 in. horizontally (X), and 120 mm / 4.72 in. vertically (Y).
  - with each selector switch head (ZB5AD\*, ZB5AJ\*, ZB5AG\*).

The fixing centers marked a and b are diagonally opposed and must align with those marked 4 and 5.



- (1) Head ZB5AD•
- (2) Panel
- (2) Nut
- (4) Printed circuit board

**Mounting of Adapter (Socket) ZBZ01•**

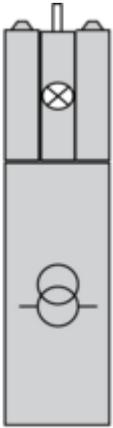
- 1 2 elongated holes for ZBZ006 screw access
- 2 1 hole  $\varnothing 2.4 \text{ mm} \pm 0.05 / 0.09 \text{ in.} \pm 0.002$  for centring adapter ZBZ01•
- 3  $8 \times \varnothing 1.2 \text{ mm} / 0.05 \text{ in.}$  holes
- 4 1 hole  $\varnothing 2.9 \text{ mm} \pm 0.05 / 0.11 \text{ in.} \pm 0.002$ , for aligning the printed circuit board (with cut-out marked a)
- 5 1 elongated hole for aligning the printed circuit board (with cut-out marked b)
- 6 4 holes  $\varnothing 2.4 \text{ mm} / 0.09 \text{ in.}$  for clipping in adapter ZBZ01•

Dimensions An + 18.1 relate to the  $\varnothing 2.4 \text{ mm} \pm 0.05 / 0.09 \text{ in.} \pm 0.002$  holes for centring adapter ZBZ01•.

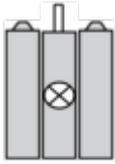
Technical Description

Electrical Composition Corresponding to Codes M6 and P2

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Electrical Composition Corresponding to Codes M5, M10, MF1, MR1 and MF2



**Legend**

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Single contact



Double contact



Light block



Possible location

