## Product data sheet Characteristics

## ZB5AW143 red projecting illuminated pushbutton head Ã<sup>2</sup>2 spring return for integral LED

Product availability: Stock - Normally stocked in distribution facility



Main				
Range of product	Harmony XB5			
Product or component type	Head for illuminated push-button			
Device short name	ZB5			
Product compatibility	Integral LED			
Bezel material	Dark grey plastic			
Mounting diameter	0.87 in (22 mm)			
Sale per indivisible quantity	1			
Head type	Standard			
Shape of signaling unit head	Round			
Type of operator	Spring return			
Operator profile	Red projecting unmarked			
Operator additional in- formation	With plain lens			

### Complementary

CAD overall width	1.14 in (29 mm)				
CAD overall height	1.14 in (29 mm)				
CAD overall depth	1.3 in (33 mm)				
Product weight	0.04 lb(US) (0.018 kg)				
Resistance to high pressure washer	1015.26 psi (7000000 Pa) at 131 °F (55 °C),distance: 0.1 m				
Mechanical durability	1000000 cycles				
Station name	XALD 15 cut-outs XALK 25 cut-outs				
Electrical composition code	M1 6 contacts using single blocks in front mounting with integral LED M2 6 contacts using single and double blocks in front mounting with integral LED M6 2 contacts using single blocks in front mounting with integral LED and trans- former M10 2 contacts using single blocks in front mounting with integral LED MF1 2 contacts using single blocks in front mounting with integral LED MR1 2 contacts using single blocks in rear mounting with integral LED				

#### Environment тс Protective treatment -40...158 °F (-40...70 °C) Ambient air temperature for storage Ambient air temperature for operation -40...158 °F (-40...70 °C) Overvoltage category Class II conforming to IEC 60536 IP degree of protection IP69 IP66 conforming to IEC 60529 IP69K NEMA degree of protection NEMA 13 NEMA 4X IK degree of protection IK05 conforming to EN 50102 GB 14048.5 Standards EN/IEC 60947-5-4 UL 508 CSA C22.2 No 14 EN/IEC 60947-5-1 JIS C 4520 EN/IEC 60947-1



Product certifications	DNV			
	GL			
	LROS (Lloyds register of shipping)			
	CSA			
	UL listed			
	RINA			
	BV			
Vibration resistance	5 gn (f = 2500 Hz) conforming to IEC 60068-2-6			
Shock resistance	30 gn (duration = 18 ms) half sine wave acceleration conforming to IEC			
	60068-2-27			
	50 gn (duration = 11 ms) half sine wave acceleration conforming to IEC 60068-2-27			

## Ordering and shipping details

Category	22467 - PUSHBUTTONS,22MM(PLASTIC) NEW CS2		
Discount Schedule			
GTIN	00785901355250		
Nbr. of units in pkg.	1		
Package weight(Lbs)	4.0000000000001E-2		
Returnability	Υ		
Country of origin	FR		

## Offer Sustainability

California proposition 65	WARNING: This product can expose you to chemicals including:
Substance 1	Lead and lead compounds, which is known to the State of California to cause can- cer and birth defects or other reproductive harm.
More information	For more information go to www.p65warnings.ca.gov

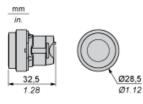
## Contractual warranty

Warranty period

18 months

Product data sheet Dimensions Drawings ZB5AW143

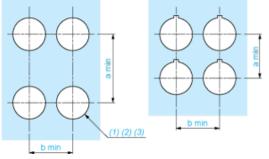
## Dimensions



## **ZB5AW143**

## 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



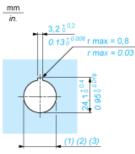
Diameter on finished panel or support (1)

For selector switches and Emergency stop buttons, use of an anti-rotation plate type ZB5AZ902 is recommended.  $\emptyset$ 22.5 mm recommended ( $\emptyset$ 22.3  $_0^{+0.4}$ ) /  $\emptyset$ 0.89 in. recommended ( $\emptyset$ 0.88 in.  $_0^{+0.016}$ ) (2)

(3)

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

For selector switches and Emergency stop buttons, use of an anti-rotation plate type ZB5AZ902 is recommended. (2)

(3) Ø22.5 mm recommended (Ø22.3  $_{0}^{+0.4}$ ) / Ø0.89 in. recommended (Ø0.88 in.  $_{0}^{+0.016}$ )

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)





- A: 30 mm min.
- B: 40 mm 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

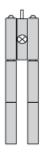
### Mounting of Adapter (Socket) ZBZ01•

- 1 2 elongated holes for ZBZ006 screw access
- 2 1 hole Ø 2.4 mm  $\pm$  0.05 / 0.09 in.  $\pm$  0.002 for centring adapter ZBZ01•
- 3 8 × Ø 1.2 mm / 0.05 in. holes
- 4 1 hole Ø 2.9 mm ± 0.05 / 0.11 in. ± 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 Ø 2.4 mm / 0.09 in. for clipping in adapter ZBZ01•

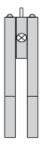
Dimensions An + 18.1 relate to the Ø 2.4 mm  $\pm$  0.05 / 0.09 in.  $\pm$  0.002 holes for centring adapter ZBZ01.

## ZB5AW143

## Electrical Composition Corresponding to Codes M1 and M7



## Electrical Composition Corresponding to Codes M2 and M8



## Electrical Composition Corresponding to Codes M6 and P2



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



## Legend

#### Single contact

#### Double contact

Light block



Possible location



# **Mouser Electronics**

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

Schneider Electric: ZB5AW143