## ZB5AX2

Head for non illuminated push button, Harmony XB5, black Ø 60 mushroom pushbutton Ø22 mm latching pull





#### Main

Range of Product	Harmony XB5
Product or Component Type	Head for non-illuminated push-button
Device short name	ZB5
Bezel material	Dark grey plastic
Head type	Standard
Mounting diameter	0.87 in (22 mm)
Sale per indivisible quantity	1
Shape of signaling unit head	Round
Type of operator	latching
Reset	Push-pull
Operator profile	Black mushroom Ø 60 mm, unmarked
Device presentation	Basic element

#### Complementary

Compatibility code	ZB5
	C8 4 single and double front mounting C10 4 single and double front mounting
	C7 4 single front mounting
	SR1 3 single rear mounting
	SF1 3 single front mounting
,	C15 1 single front mounting
Electrical composition code	C11 3 single front mounting
Station name	XALD 1 cut-out
Mechanical durability	500000 cycles
Net Weight	0.15 lb(US) (0.067 kg)
CAD overall depth	2.20 in (56 mm)
CAD overall height	2.36 in (60 mm)
CAD overall width	2.36 in (60 mm)

#### **Environment**

Protective treatment	TH	
Ambient Air Temperature for Storage	-40158 °F (-4070 °C)	
Ambient air temperature for operation	-40158 °F (-4070 °C)	
Overvoltage category	Class II IEC 60536	
IP degree of protection	IP66 IEC 60529 IP67 IP69 IP69K	
NEMA degree of protection	NEMA 13 NEMA 4X	
Resistance to high pressure washer	1015.26 psi (7000000 Pa) 131 °F (55 °C) 0.1 m	
IK degree of protection	IK03 IEC 50102	

Standards	EN/IEC 60947-1		
	EN/IEC 60947-5-1		
	UL 508		
	EN/IEC 60947-5-4		
	JIS C8201-5-1		
	CSA C22.2 No 14		
	JIS C8201-1		
Product Certifications	BV		
	GL		
	LROS (Lloyds register of shipping)		
	DNV		
	CSA		
	UL Listed		
Vibration resistance	5 gn 2500 Hz)IEC 60068-2-6		
Shock resistance	30 gn 18 ms) half sine wave acceleration IEC 60068-2-27		
	50 gn 11 ms) half sine wave acceleration IEC 60068-2-27		

### Ordering and shipping details

0 11 0	
Category	22467 - PUSHBUTTONS,22MM(PLASTIC) NEW
Discount Schedule	CS2
GTIN	3389110924374
Nbr. of units in pkg.	1
Package weight(Lbs)	2.36 oz (67 g)
Returnability	No
Country of origin	CZ

## Packing Units

Unit Type of Package 1	PCE
Package 1 Height	3.54 in (9 cm)
Package 1 width	2.83 in (7.2 cm)
Package 1 Length	2.83 in (7.2 cm)

# Offer Sustainability

Sustainable offer status	Green Premium product	
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	
REACh Regulation	☑ REACh Declaration	
REACh free of SVHC	Yes	
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope)	
Toxic heavy metal free	Yes	
Mercury free	Yes	
RoHS exemption information	₫Yes	
China RoHS Regulation	China RoHS Declaration	
Environmental Disclosure	Product Environmental Profile	
Circularity Profile	End Of Life Information	

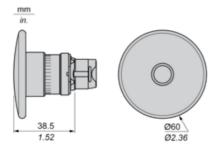
#### Contractual warranty

Warranty	18 months

# Product data sheet Dimensions Drawings

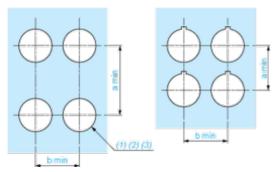
# ZB5AX2

#### **Dimensions**



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

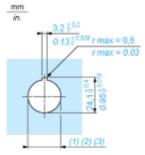
Connection by Screw Clamp Terminals or Plug-in Connectors or on Printed Circuit Board



- (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) Ø22.5 mm recommended (Ø22.3  $_0$   $^{+0.4}$ ) / Ø0.89 in. recommended (Ø0.88 in.  $_0$   $^{+0.016}$ )

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

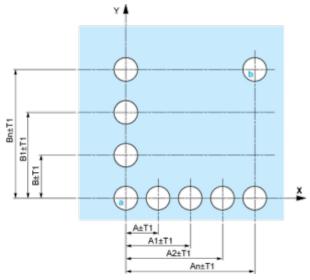
#### **Detail of Lug Recess**



- (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) Ø22.5 mm recommended (Ø22.3  $_0$  <sup>+0.4</sup>) / Ø0.89 in. recommended (Ø0.88 in.  $_0$  <sup>+0.016</sup>)

Pushbuttons, Switches and Pilot Lights for Printed Circuit Board Connection

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

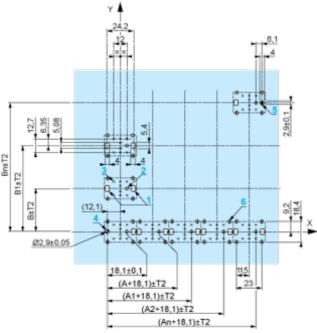


A: 30 mm min. / 1.18 in. min.

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

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

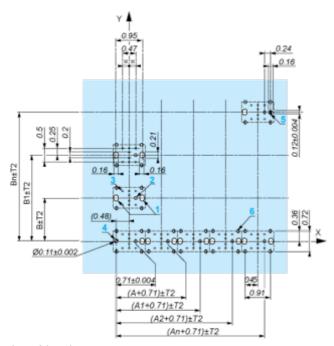
#### Dimensions in mm



A: 30 mm min.

B: 40 mm min.

Dimensions in in.



A: 1.18 in. min. B: 1.57 in. min.

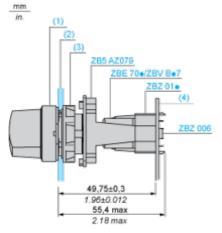
#### General Tolerances of the Panel and Printed Circuit Board

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:
  - $\circ\quad$  every 90 mm / 3.54 in. horizontally (X), and 120 mm / 4.72 in. vertically (Y).
  - o 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•.

# ZB5AX2

Electrical Composition Corresponding to Code C7
Electrical Compositions Corresponding to Code C8
Electrical Compositions Corresponding to Code C10
Electrical Composition Corresponding to Codes C9, C11, SF1 and SR1
Electrical Composition Corresponding to Code C15
1 N/O
1 N/C
1 N/O + N/C or 1 N/O + N/O or 1 N/C + N/C

Legend	
Single contact	
Double contact	
Light block	
Possible location	