

Buzzer

M2BJ-B

16-mm Diameter Panel-Mounted Buzzer Unit

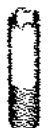
- Four models offer eight different types of sounds, plus two modes newly added to the high-sound type
- Intermittent or continuous sound selected by jumper setting
- Three supply voltages: 6 VAC/DC, 12-24 VDC and 12 to 24 VAC/DC
- Jumper storage provided at bottom of unit
- Complements the A16 range of Pushbuttons, Selector Switches, and Key Switches



Ordering Information

Item		Part number					
		Standard sound				High sound	
Sound	w/jumper	Intermittent	Intermittent (short)	Intermittent (high-pitched)	Intermittent (short, high-pitched)	Intermittent (high-pitched)	Intermittent (short)
	w/o jumper	Continuous	Intermittent (long)	Continuous (high-pitched)	Intermittent (long, high-pitched)	Continuous	Intermittent (long)
Supply voltage	6 VAC/DC	M2BJ-B06	M2BJ-B06A	M2BJ-B06B	M2BJ-B06C	M2BJ-BH06D	M2BJ-BH06E
	12 to 24 VAC/DC	M2BJ-B24	M2BJ-B24A	M2BJ-B24B	M2BJ-B24C	M2BJ-BH24D	M2BJ-BH24E
	12 to 24 DC	M2BJ-B24-D	—	M2BJ-B24B-D	—	M2BJ-BH24D-D	M2BJ-BH24E-D

■ ACCESSORIES (ORDER SEPARATELY)

Name	Shape	Classification	Remarks	Part number
Snap-in mounting leaf spring		—	Cannot be used with mounting nut Panel cutout becomes 16.2 dia. + 0.3, -0	A3B-3001
Panel plug		Rectangular	Reserves hole cut out on panel for future mounting	A3BJ-3003
		Square		A3BA-3003
		Round		A3BT-3003
Tightening tool		—	Useful for mounting buzzers one after another. Do not over-tighten.	A3B-3004

Specifications

■ STANDARD-SOUND TYPE

Rated voltage	6 VAC/DC	M2BJ-B06	M2BJ-B06A	M2BJ-B06B	M2BJ-B06C
	12 to 24 VAC/DC	M2BJ-B24	M2BJ-B24A	M2BJ-B24B	M2BJ-B24C
Sound pressure (distance: 0.1 m, at rated voltage)		Continuous sound: 80 dB min.	Continuous: 80 dB min.	Continuous sound: 80 dB min.	Continuous: 80 dB min.
Driving frequency		2±0.5 kHz		4±0.5 kHz	
Intervals		190 times/minute±10%	Long: 55 times/minute±10% Short: 700 times/minute±10%	190 times/minute±10%	Long: 55 times/minute±10% Short: 700 times/minute±10%
Current consumption	DC	7 mA	7 mA	20 mA	20 mA
	AC	20 mA	20 mA	20 mA	20 mA
Life expectancy		1,000 hours min.			

■ HIGH-SOUND TYPE

Item		High-sound type					
		M2BJ-BH06D	M2BJ-BH24D	M2BJ-BH06E	M2BJ-BH24E	M2BJ-BH24D-D	M2BJ-BH24E-D
Rated voltage		6 VAC/DC	12 to 24 VAC/DC	6 VAC/DC	12 to 24 VAC/DC	12 to 24 VDC	
Sound pressure (adjustable range) (rated voltage, distance of 0.1 m, A range)		70 to 100 dB (Adjustable range)					
Driving frequency		2.8±0.5 kHz					
Intervals		Approx. 190 times/min.		Long: Approx. 55 times/min. Short: Approx. 700 times/min.		Approx. 190 times/min.	Long: Approx. 55 times/min. Short: Approx. 700 times/min.
Current consumption	DC	50 mA max.					
	AC	100 mA max.				—	
Inrush current		1 A max.					
Life expectancy		1,000 hours min.					

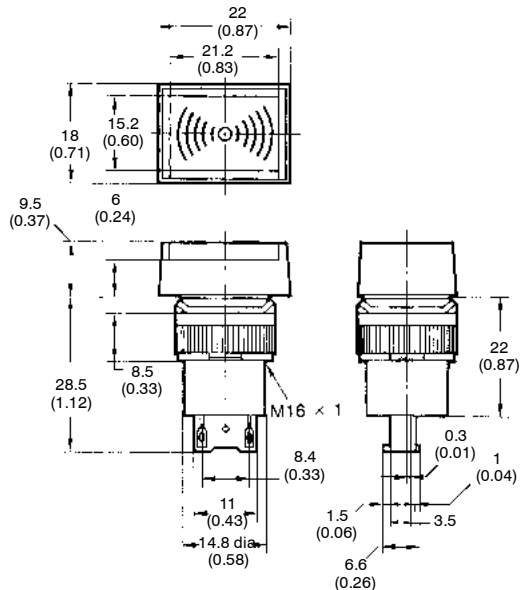
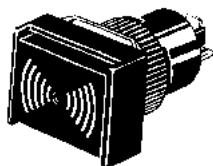
■ CHARACTERISTICS

Insulation resistance	100 MΩ min. (between ground and current-carrying parts)
Dielectric strength	1,000 VAC for 1 minute (between grounds)
Ambient temperature	Operating: -10°C to 55°C (14°F to 131°F) with no icing or condensation Storage: -25°C to 65°C (-13°F to 149°F) with no icing or condensation
Humidity	35% to 85% RH

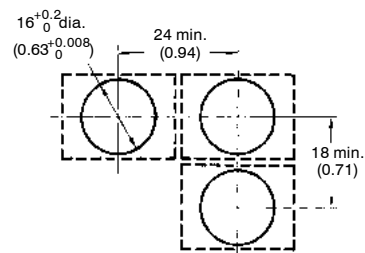
Dimensions

Unit: mm (inch)

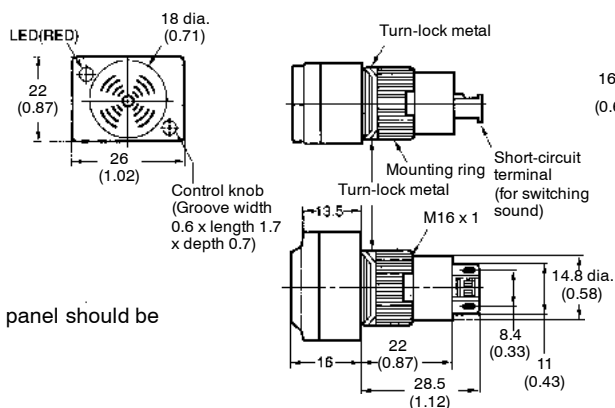
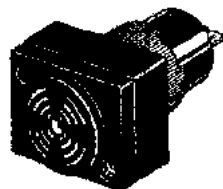
■ M2BJ-B



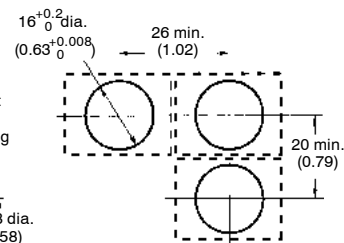
Panel cutout (Top view)



■ M2BJ-BH



Panel cutout*

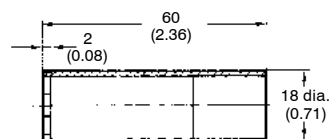


Note: Plate thickness of the panel should be 1.0 to 3.2 mm.

Unit: mm (inch)

■ ACCESSORIES

Tightening Tool



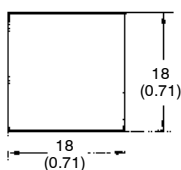
Panel Plug

Select a panel plug which best compliments the design of the mounting panel. The dimensions of the hole cutout for the panel plugs are the same as those of the buzzer unit.

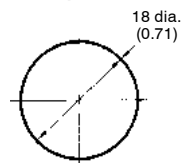
Rectangular



Square



Round



Correct Use

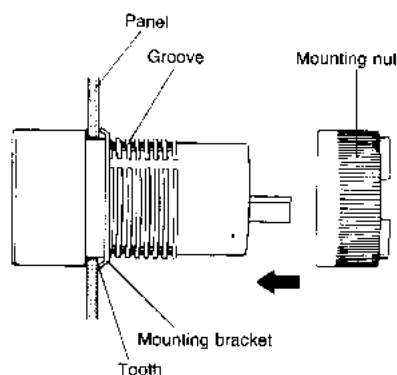
■ NUT MOUNTING

Insert the buzzer unit from the front of the panel and tighten the mounting nut inserted from the rear of the panel.

Since a projection exists on the rear portion of the buzzer unit, if the mounting nut cannot be fitted into position, turn the nut slightly.

The tightening torque of the mounting nut should be less than 5 kg-cm.

Solder the terminals after mounting the nut. Otherwise, the terminals, when thickened by solder, may prevent the nut from being screwed down onto the buzzer unit.



■ MOUNTING

Tighten the mounting nut at a torque of less than 5 kg-cm.

■ WIRING

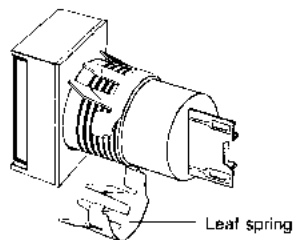
Exercise caution that the input terminals are not short-circuited by the short-circuiting jumper.

Finish soldering within 5 seconds with a 30 watt soldering iron, or within 3 seconds at a solder temperature of 240°C. For about a minute after soldering, do not apply any force to the buzzer unit, to avoid deforming the softened plastic buzzer unit base.

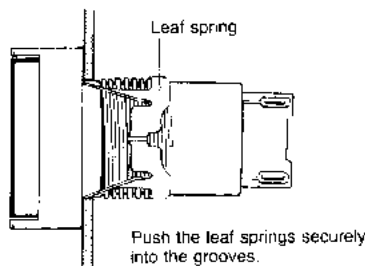
Use an non-corrosive, resin-based soldering flux.

■ SNAP-IN MOUNTING

Attach the mounting leaf spring to the buzzer. Engage the edges of the leaf spring in the two grooves on the threaded section of the buzzer. After inserting the leaf spring edges into the grooves, confirm that the leaf spring has seated. Be sure to attach both leaf springs.

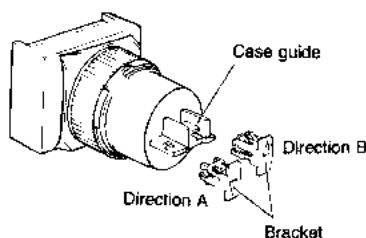


Insert the buzzer assembly into the hole on the mounting panel from the front.

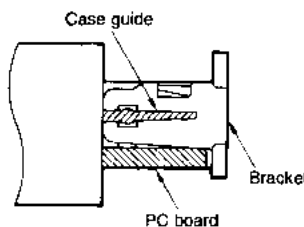


■ SHORT-CIRCUITING JUMPER

The buzzer sounds continuously or intermittently depending on how the short-circuiting bracket is attached to the case guide. When the bracket is attached with the triangle on it facing direction A (PC board side), the buzzer sounds intermittently.



To produce continuous sounds, attach the bracket to the case guide so that the triangle on the bracket faces direction B.



NOTE: DIMENSIONS SHOWN ARE IN MILLIMETERS. To convert millimeters to inches divide by 25.4.

OMRON[®]
OMRON ELECTRONICS LLC
One East Commerce Drive
Schaumburg, IL 60173
1-800-55-OMRON

OMRON ON-LINE
Global - <http://www.omron.com>
USA - <http://www.omron.com/oei>
Canada - <http://www.omron.com/oci>

OMRON CANADA, INC.
885 Milner Avenue
Scarborough, Ontario M1B 5V8
416-286-6465