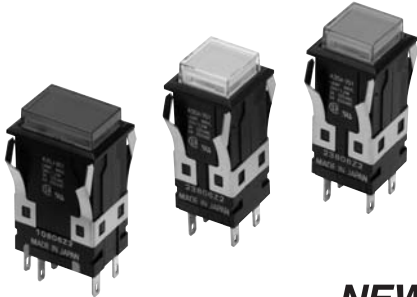


Lighted Pushbutton Switch (Square) Ultra Bright LED Type A3S


Pushbutton Switch Series with Square 40-mm Body.

New models added with Ultra LEDs.

- New models with ultra bright LEDs added to single-screen models.
- Previous models not changed.
Line up of models in seven colors (the previous red, orange, green, and white models, and the new yellow, blue, and pure white models).

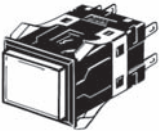
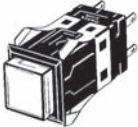


NEW

 Refer to *Safety Precautions for All Pushbutton Switches/Indicators* and *Safety Precautions* in the A3S datasheet.

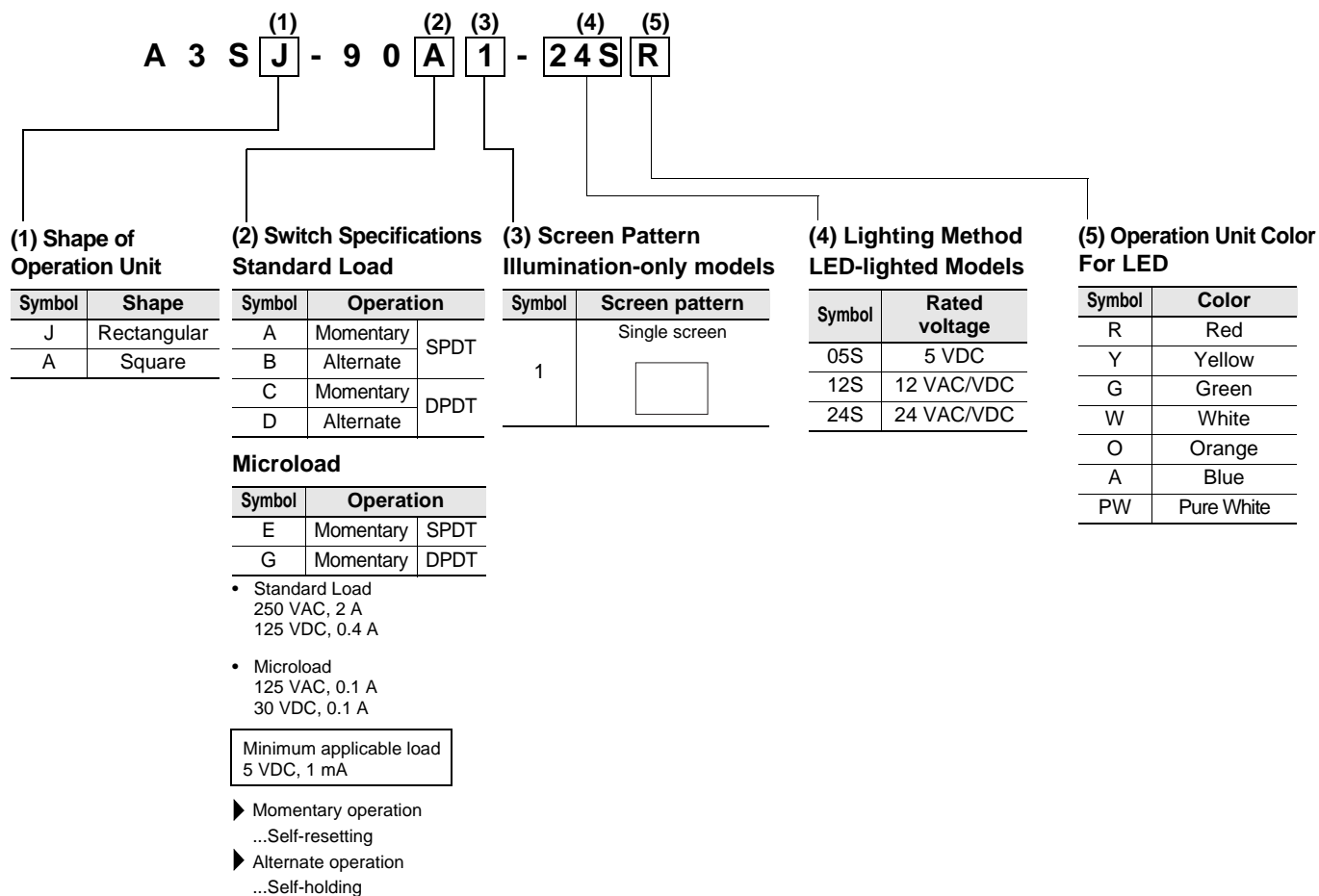
List of Models

Lighted Pushbutton Switches

Appearance	Mode
Rectangular 	A3SJ
Square 	A3SA

Model Number Structure

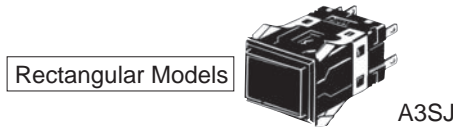
Model Number Legend The model numbers used to order sets are illustrated below. One set comprises the Operation Unit, Lamp, and Socket Unit. For information on combinations, refer to Ordering Information on page 3.



Color of screen	Symbol	R	Y	G	W	O	A	PW
	Color	Red	Yellow	Green	White	Orange	Blue	Pure White
Color of plate		Red	Yellow	Green	White	Orange	Blue	White
LED		Red	Pure White	Green	Amber	Orange	Blue	Pure White

Ordering Information

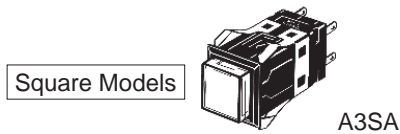
Ordering as a Set The model numbers used to order sets of Units are given in the following tables. One set comprises the Operation Unit, Lamp, and Socket Unit.



Contact type	No. of outputs	Lighting method	Operation Case color	Momentary operation (Self-resetting)	Alternate operation (Self-holding)	Pushbutton color symbol
Standard Loads	SPDT	LED lamp	5 VDC	A3SJ-90A1-05S(1)	A3SJ-90B1-05S(1)	R, O, G, W, Y, A, or PW
			12 VAC/DC	A3SJ-90A1-12S(1)	A3SJ-90B1-12S(1)	
			24 VAC/DC	A3SJ-90A1-24S(1)	A3SJ-90B1-24S(1)	
	DPDT		5 VDC	A3SJ-90C1-05S(1)	A3SJ-90D1-05S(1)	
			12 VAC/DC	A3SJ-90C1-12S(1)	A3SJ-90D1-12S(1)	
			24 VAC/DC	A3SJ-90C1-24S(1)	A3SJ-90D1-24S(1)	
Microloads	SPDT	5 VDC	A3SJ-90E1-05S(1)	–		
		12 VAC/DC	A3SJ-90E1-12S(1)	–		
		24 VAC/DC	A3SJ-90E1-24S(1)	–		
	DPDT	5 VDC	A3SJ-90G1-05S(1)	–		
		12 VAC/DC	A3SJ-90G1-12S(1)	–		
		24 VAC/DC	A3SJ-90G1-24S(1)	–		

Note: Enter the desired color symbol for the Pushbutton in (1). (R) = Red, (O) = Orange, (G) = Green, (W) = White, (Y) = Yellow, (A) = Blue, (PW) = Pure White.

Example: Red A3SJ-90A1-24SR



Contact type	No. of outputs	Lighting method	Operation Case color	Momentary operation (Self-resetting)	Alternate operation (Self-holding)	Pushbutton color symbol
Standard Loads	SPDT	LED lamp	5 VDC	A3SA-90A1-05S(1)	A3SA-90B1-05S(1)	R, O, G, W, Y, A, or PW
			12 VAC/DC	A3SA-90A1-12S(1)	A3SA-90B1-12S(1)	
			24 VAC/DC	A3SA-90A1-24S(1)	A3SA-90B1-24S(1)	
	DPDT		5 VDC	A3SA-90C1-05S(1)	A3SA-90D1-05S(1)	
			12 VAC/DC	A3SA-90C1-12S(1)	A3SA-90D1-12S(1)	
			24 VAC/DC	A3SA-90C1-24S(1)	A3SA-90D1-24S(1)	
Microloads	SPDT	5 VDC	A3SA-90E1-05S(1)	–		
		12 VAC/DC	A3SA-90E1-12S(1)	–		
		24 VAC/DC	A3SA-90E1-24S(1)	–		
	DPDT	5 VDC	A3SA-90G1-05S(1)	–		
		12 VAC/DC	A3SA-90G1-12S(1)	–		
		24 VAC/DC	A3SA-90G1-24S(1)	–		

Note: Enter the desired color symbol for the Pushbutton in (1). (R) = Red, (O) = Orange, (G) = Green, (W) = White, (Y) = Yellow, (A) = Blue, (PW) = Pure White.

Example: Red A3SA-90A1-24SR

Accessories and Tools

The accessories and tools are the same as those for the A3S. Refer to the A3S datasheet.

Specifications

Approved Standard Ratings

UL (File No. E41515), CSA (File No. LR45258)

Standard Load: 3 A at 125 VAC
2 A at 250 VAC

Microload: 0.1 A at 125 VAC
0.1 A at 30 VDC

Note: Certification has been obtained for the Switch Unit.
For detailed information on individual products that have received certification, consult your supplier.

Ratings

For Standard Loads

Rated voltage	Non-inductive load (A)				Inductive load (A)			
	Resistive load		Lamp load		Inductive load		Motor load	
	NC	NO	NC	NO	NC	NO	NC	NO
125 VAC	3	1	0.7	0.7	2	1.5	1	0.7
250 VAC	2	0.7	0.5	0.5	1.5	1	0.7	0.7
8 VDC	3	1			2	1.5		
14 VDC	3	1			1.5	1.5		
30 VDC	2	1			1.5	1		
125 VDC	0.4	0.05			0.4	0.05		
250 VDC	0.2	0.03			0.2	0.03		

- Note:** 1. The above values are for steady-state currents.
2. Inductive load: Power factor = 0.4; time constant = 7 ms.
3. The lamp load has an inrush current of 10 times the steady-state current.
4. The motor load has an inrush current of 6 times the steady-state current.

The rated values are for testing conducted under the following conditions.

- (1) Ambient temperature: 20±2°C
- (2) Ambient humidity: 65% ±5%RH
- (3) Operating frequency: 20 times/min

For Microloads

Rating	0.1 A at 30 VDC (resistive load); 0.1 A at 125 VAC (resistive load)
Minimum applicable load	1 mA at 5 VDC

LED Lamp

Applied voltage	Rated voltage	Rated current
5 VDC±5%	5 VDC	8 mA
12 VAC/VDC±5%	12 VAC/VDC	
24 VAC/VDC±5%	24 VAC/VDC	

Characteristics

Operating frequency	Mechanical	Momentary operation models: 120 operations/min max. *1
	Electrical	20 operations/min max.
Insulation resistance		100 MΩ min. (at 500 VDC)
Contact resistance	Standard load	50 mΩ max. (initial value)
	Microload	50 mΩ max. (initial value)
Dielectric strength	Between terminals of same polarity	1,000 VAC, 50/60 Hz for 1 minute
	Between terminals of different polarity	2,000 VAC, 50/60 Hz for 1 minute
	Between current-carrying metal part and ground	2,000 VAC, 50/60 Hz for 1 minute
	Between each terminal and non-current-carrying metal part	2,000 VAC, 50/60 Hz for 1 minute
	Between lamp terminals	1,000 VAC, 50/60 Hz for 1 minute *2
Vibration resistance	Malfunition	10 to 55 Hz, 1.5-mm double amplitude *3
Shock resistance	Destruction	500 m/s ² max.
	Malfunition	200 m/s ² max. *3
Life expectancy	Mechanical	Momentary operation models: 1,000,000 operations min. Alternate operation models: 100,000 operations min. (One operation consists of set and reset operations.)
	Electrical	100,000 operations min. (rated load)
Weight		Approx. 10 g
Inrush current	NC	Standard load: 10 A max.
	NO	Standard load: 10 A max.
Ambient operating temperature		-10 to 50°C (with no icing or condensation)
Ambient operating humidity		35% to 85% RH
Ambient storage temperature		-25 to 65°C (with no icing or condensation)
Degree of protection		IP00
Electric shock protection class		Class II
PTI (proof tracking index)		175
Pollution degree		3 (IEC 60947-5-1)

*1. With alternate operation models, 60 operations/min max. One operation cycle consists of set and reset operations.

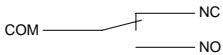
*2. With no incandescent lamp or LED lamp mounted.

*3. Malfunition : 1 ms max.

Operating Characteristics

Operation	Momentary operation models	Alternate operation models
Operating force OF max.	3.92 N	4.90 N
Releasing force RF min.	0.49 N	0.294 N
Total travel TT	Approx. 3 mm	Approx. 3 mm
Pretravel PT max.	2.2 mm	2.2 mm
Lock travel alternate LTA min.	-	0.5 mm

Contact Form

Name	Contact Form
Double-throw contacts	

Nomenclature

Model Structure

Rectangular
A3SJ

Square
A3SA

Single
screen

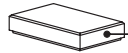
Single
screen



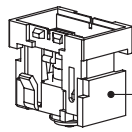
Color cap



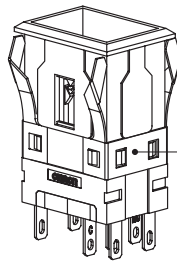
Legend plate



Diffusion plate



Operation Unit



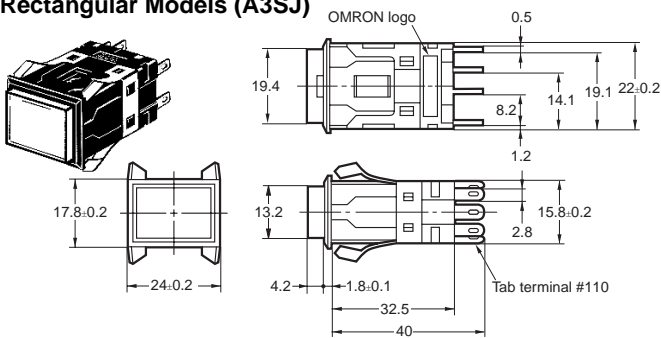
Socket Unit

Dimensions

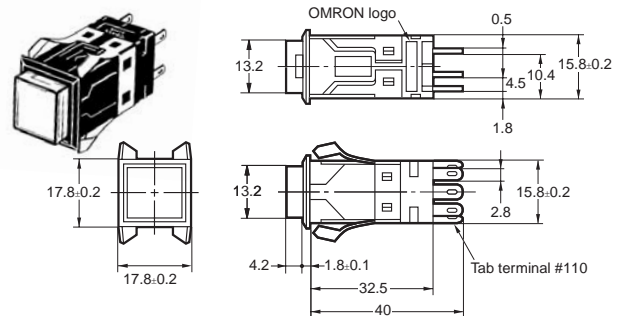
The Dimension shows 2-switch outputs.

(Unit: mm)

Rectangular Models (A3SJ)



Square Models (A3SA)



Note: Unless specified, a tolerance of ±0.4 mm applies for all dimensions. Use a mounting panel thickness of 1 to 4 mm.

Contact Type

Lamp-lighted Models

Type	Model	Rectangular Models (A3SJ)	Square Models (A3SA)
SPDT	Bottom view		
	Top view		

Panel Cutout (If you use a Switch Guard or Seal Cover, refer to *Switch and Guard Mounting Dimensions* or *Seal Cover Mounting Dimensions* in the A3S datasheet.)

Rectangular Models (A3SJ)

Classification	Mounting design	Panel cutout	Remarks
Flange mount models	Individual mounting, horizontal 		Panel cutout spacing between rows of Units:
	Multiple mounting, horizontal 		
	Individual mounting, vertical 		Panel cutout spacing between rows of Units:
	Multiple mounting, vertical 		
Barrier mount models	Individual mounting, horizontal 		Panel cutout spacing between rows of Units:
	Multiple mounting, horizontal 		
	Individual mounting, vertical 		Dotted line indicates the position of each mounting Barrier.
	Multiple mounting, vertical 		

* If the panel is to be finished (e.g., coated), make sure that the panel meets the specified dimensions after the coating.

Square Models (A3SA)

Classification	Mounting design	Panel cutout	Remarks
Flange mount models	Individual mounting 		Panel cutout spacing between rows of Units:
	Multiple mounting 		
Barrier mount models	Individual mounting 		Panel cutout spacing between rows of Units:
	Multiple mounting 		

* If the panel is to be finished (e.g., coated), make sure that the panel meets the specified dimensions after the coating.

Safety Precautions

Refer to *Safety Precautions for all Pushbutton Switches/Indicators* for common precautions.

Read the *Safety Precautions* in the A3S datasheet.

For technical information and FAQs, refer to Technical Support on the OMRON Industrial Automation website (<http://www.ia.omron.com>).

Safety Precautions

Refer to *Safety Precautions for All Pushbutton Switches/Indicators*.

Precautions for Correct Use

Mounting

- Always make sure that the power is turned OFF before mounting, removing, or wiring the Switch, or performing maintenance. Electric shock or fire may occur.

Wiring

- For wiring, use a wire size that is appropriate for the applied voltage and the supplied current. Be sure to perform soldering according to the following conditions. Using the Switch with incomplete soldering may result in errors and heat, which may cause fire.

(1) Manual soldering: Use a soldering iron with a tip temperature of 350°C maximum and complete soldering within 3 seconds.

(2) Dip soldering: Solder at 350°C for 3 s or less.

Wait for one minute after soldering before exerting any external force on the solder.

- Use non-corrosive liquid rosin as the flux.
- If screw-tightened terminals are used, hold the Socket Unit Set or Socket Unit and install the lead wiring applying a torque of less than 0.98 N·m to the Socket Unit. Applying a torque of more than 0.98 N·m may result in damage. The tightening torque is 0.59 to 0.78 N·m.
- Make sure that the insulating sheath of the wires does not come in contact with the Unit. If wiring is performed with the insulating sheath of the wires coming in contact with the Unit, use wire with a minimum heat resistance of 100°C.
- After wiring the Switch, make sure that there is a suitable isolation distance.

Operating Environment

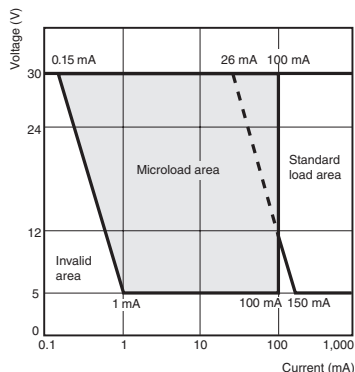
- Do not use in locations that are subject to dust, oil, or metal fillings, because these may penetrate the interior the Switch and cause malfunction.

Using Microloads

- Using a standard load switch when a microload circuit is opened or closed may cause wear on the contacts. Use the switch within the operating range. (Refer to the diagram below.) Even when using microload models within the operating range shown below, if inrush current occurs when the contacts are opened or closed, it may cause the contact surface to become rough, and so decrease life expectancy. Therefore, insert a contact protection circuit where necessary.

The minimum applicable load is the N-level reference value. This value indicates the malfunction reference level for the reliability level of 60% (λ 60) (conforming to JIS C5003).

The equation λ 60 = $0.5 \times 10^{-6}/\text{time}$ indicates that the estimated malfunction rate is less than 1/2,000,000 with a reliability level of 60%.



LED Lamp

- A current-limiting resistor for the LED lamp is built in, so no external resistor is required.

Rated voltage	Built-in limiting resistance
5 VDC	39 Ω
12 VDC	270 Ω
24 VDC	1300 Ω

Incandescent Lamp

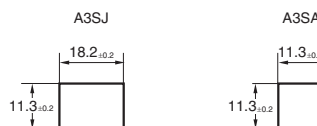
- It is advantageous in terms of service life and heat generation to apply 80% of the rated voltage (operating voltage) to the incandescent lamp.

Operation

- Always mount the Operation Unit before operating the Switch. (Using your fingers or tweezers to operate moving parts of the Switch may deform internal parts and cause malfunctions.)

Character Film

- If the character film is to be specially prepared, use heat-resistant film with a maximum thickness of 0.2 mm.



Others

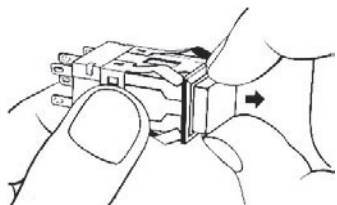
- If the panel is to be finished (e.g., coated), make sure that the panel meets the specified dimensions after the coating.

Application

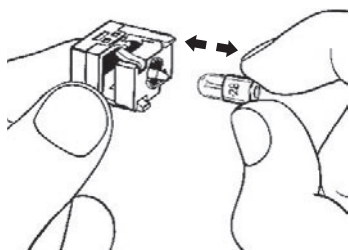
Replacing Incandescent and LED Lamps and Panel Mounting

Removing the Display

- Grasp the groove on the color cap surface, and pull it firmly toward you to remove the Display.
- An Extractor (A3PJ-5080) is available to conveniently remove the Display.

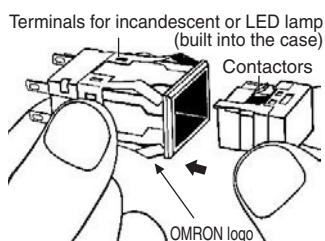


Mounting and Replacing Incandescent and LED Lamps



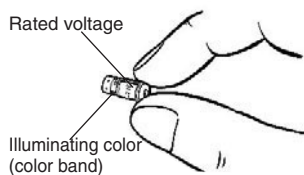
Inserting the Display into the Socket Unit

Insert the Operation Unit in the proper direction. With the OMRON logo downward, insert the Operation Unit so that the lamp/LED terminals on the inside surface of the Unit case and the contactors of the Display.



Rated Voltage and Color of LED

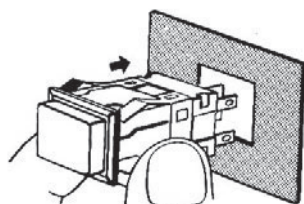
The LED voltage rating is indicated on the base. Use the LED within $\pm 5\%$ of voltage range.



Mounting to the Switch Panel

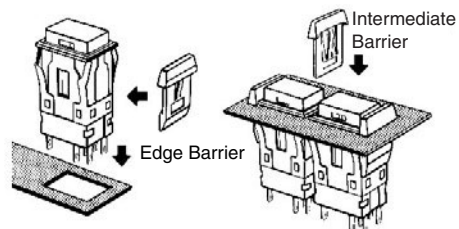
Mount the Socket Unit to the panel by inserting it from the front of the panel.

Mount the Socket Unit so that the OMRON logo is downward.



Barrier Mounting

- Place the Edge Barrier on the side of the Socket Unit, and then insert it into the panel.
- Insert the Intermediate Barrier between the Switches after inserting the Socket Units into the panel.



Inscribing Legend Plate Characters

Inscribing

A3SJ (M2SJ)

- Inscription depth: 0.5 mm max.
- The legend plate is made of polycarbonate, so apply an alcohol-based paint coating, such as melamine, phthalate, or acrylic resin paint when marking the legend.



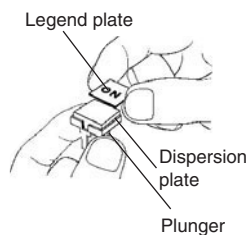
Legend plate

- When replacing the legend plate, be careful that the coil spring in the Display does not become removed.

**Assembling the Legend Plate (Plunger)
A3SA (M2SA)**

(LED Lamp)

(1) Assemble the color plate to the plunger, and then assemble the legend plate on top.

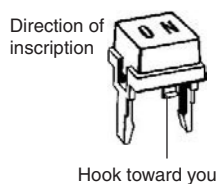


(Incandescent Lamp)

(2) Inscribe the surface of the plunger, and then coat the surface.

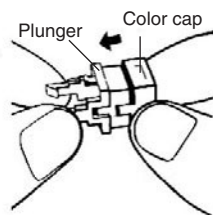
Lighted Square Pushbutton Switches

Assemble models A3SA-5301 to A3SA-5305 so that the hook is toward you.



Note: Legend plates cannot be used with A3SA Displays for incandescent lamps.

(3) Assemble the color cap to the inscribed plunger.

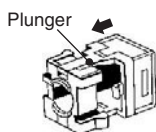


(4) Push in the color in the direction of the arrow to assemble the plunger and the lamp holder.

Lighted Square Pushbutton Switches

A3SA

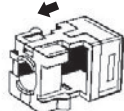
Perform the assembly so that the wide groove and the hook on the plunger are in the same direction.



Indicator

M2SA

Perform the assembly so that the wide groove and the hook on the plunger are in the same direction.



Terms and Conditions of Sale

1. **Offer; Acceptance.** These terms and conditions (these "**Terms**") are deemed part of all quotes, agreements, purchase orders, acknowledgments, price lists, catalogs, manuals, brochures and other documents, whether electronic or in writing, relating to the sale of products or services (collectively, the "**Products**") by Omron Electronics LLC and its subsidiary companies ("**Omron**"). Omron objects to any terms or conditions proposed in Buyer's purchase order or other documents which are inconsistent with, or in addition to, these Terms.
2. **Prices; Payment Terms.** All prices stated are current, subject to change without notice by Omron. Omron reserves the right to increase or decrease prices on any unshipped portions of outstanding orders. Payments for Products are due net 30 days unless otherwise stated in the invoice.
3. **Discounts.** Cash discounts, if any, will apply only on the net amount of invoices sent to Buyer after deducting transportation charges, taxes and duties, and will be allowed only if (i) the invoice is paid according to Omron's payment terms and (ii) Buyer has no past due amounts.
4. **Interest.** Omron, at its option, may charge Buyer 1-1/2% interest per month or the maximum legal rate, whichever is less, on any balance not paid within the stated terms.
5. **Orders.** Omron will accept no order less than \$200 net billing.
6. **Governmental Approvals.** Buyer shall be responsible for, and shall bear all costs involved in, obtaining any government approvals required for the importation or sale of the Products.
7. **Taxes.** All taxes, duties and other governmental charges (other than general real property and income taxes), including any interest or penalties thereon, imposed directly or indirectly on Omron or required to be collected directly or indirectly by Omron for the manufacture, production, sale, delivery, importation, consumption or use of the Products sold hereunder (including customs duties and sales, excise, use, turnover and license taxes) shall be charged to and remitted by Buyer to Omron.
8. **Financial.** If the financial position of Buyer at any time becomes unsatisfactory to Omron, Omron reserves the right to stop shipments or require satisfactory security or payment in advance. If Buyer fails to make payment or otherwise comply with these Terms or any related agreement, Omron may (without liability and in addition to other remedies) cancel any unshipped portion of Products sold hereunder and stop any Products in transit until Buyer pays all amounts, including amounts payable hereunder, whether or not then due, which are owing to it by Buyer. Buyer shall in any event remain liable for all unpaid accounts.
9. **Cancellation; Etc.** Orders are not subject to rescheduling or cancellation unless Buyer indemnifies Omron against all related costs or expenses.
10. **Force Majeure.** Omron shall not be liable for any delay or failure in delivery resulting from causes beyond its control, including earthquakes, fires, floods, strikes or other labor disputes, shortage of labor or materials, accidents to machinery, acts of sabotage, riots, delay in or lack of transportation or the requirements of any government authority.
11. **Shipping; Delivery.** Unless otherwise expressly agreed in writing by Omron:
 - a. Shipments shall be by a carrier selected by Omron; Omron will not drop ship except in "break down" situations.
 - b. Such carrier shall act as the agent of Buyer and delivery to such carrier shall constitute delivery to Buyer;
 - c. All sales and shipments of Products shall be FOB shipping point (unless otherwise stated in writing by Omron), at which point title and risk of loss shall pass from Omron to Buyer; provided that Omron shall retain a security interest in the Products until the full purchase price is paid;
 - d. Delivery and shipping dates are estimates only; and
 - e. Omron will package Products as it deems proper for protection against normal handling and extra charges apply to special conditions.
12. **Claims.** Any claim by Buyer against Omron for shortage or damage to the Products occurring before delivery to the carrier must be presented in writing to Omron within 30 days of receipt of shipment and include the original transportation bill signed by the carrier noting that the carrier received the Products from Omron in the condition claimed.
13. **Warranties.** (a) **Exclusive Warranty.** Omron's exclusive warranty is that the Products will be free from defects in materials and workmanship for a period of twelve months from the date of sale by Omron (or such other period expressed in writing by Omron). Omron disclaims all other warranties, express or implied. (b) **Limitations.** OMRON MAKES NO WARRANTY OR REPRESENTATION, EXPRESS OR IMPLIED, ABOUT NON-INFRINGEMENT, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OF THE PRODUCTS. BUYER ACKNOWLEDGES THAT IT ALONE HAS DETERMINED THAT THE PRODUCTS WILL SUITABLY MEET THE REQUIREMENTS OF THEIR INTENDED USE. Omron further disclaims all warranties and responsibility of any type for claims or expenses based on infringement by the Products or otherwise of any intellectual property right. (c) **Buyer Remedy.** Omron's sole obligation hereunder shall be, at Omron's election, to (i) replace (in the form originally shipped with Buyer responsible for labor charges for removal or replacement thereof) the non-complying Product, (ii) repair the non-complying Product, or (iii) repay or credit Buyer an amount equal to the purchase price of the non-complying Product; provided that in no event shall Omron be responsible for warranty, repair, indemnity or any other claims or expenses regarding the Products unless Omron's analysis confirms that the Products were properly handled, stored, installed and maintained and not subject to contamination, abuse, misuse or inappropriate modification. Return of any Products by Buyer must be approved in writing by Omron before shipment. Omron Companies shall not be liable for the suitability or unsuitability or the results from the use of Products in combination with any electrical or electronic components, circuits, system assemblies or any other materials or substances or environments. Any advice, recommendations or information given orally or in writing, are not to be construed as an amendment or addition to the above warranty. See <http://www.omron247.com> or contact your Omron representative for published information.
14. **Limitation on Liability; Etc.** OMRON COMPANIES SHALL NOT BE LIABLE FOR SPECIAL, INDIRECT, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, LOSS OF PROFITS OR PRODUCTION OR COMMERCIAL LOSS IN ANY WAY CONNECTED WITH THE PRODUCTS, WHETHER SUCH CLAIM IS BASED IN CONTRACT, WARRANTY, NEGLIGENCE OR STRICT LIABILITY. Further, in no event shall liability of Omron Companies exceed the individual price of the Product on which liability is asserted.
15. **Indemnities.** Buyer shall indemnify and hold harmless Omron Companies and their employees from and against all liabilities, losses, claims, costs and expenses (including attorney's fees and expenses) related to any claim, investigation, litigation or proceeding (whether or not Omron is a party) which arises or is alleged to arise from Buyer's acts or omissions under these Terms or in any way with respect to the Products. Without limiting the foregoing, Buyer (at its own expense) shall indemnify and hold harmless Omron and defend or settle any action brought against such Companies to the extent based on a claim that any Product made to Buyer specifications infringed intellectual property rights of another party.
16. **Property; Confidentiality.** Any intellectual property in the Products is the exclusive property of Omron Companies and Buyer shall not attempt to duplicate it in any way without the written permission of Omron. Notwithstanding any charges to Buyer for engineering or tooling, all engineering and tooling shall remain the exclusive property of Omron. All information and materials supplied by Omron to Buyer relating to the Products are confidential and proprietary, and Buyer shall limit distribution thereof to its trusted employees and strictly prevent disclosure to any third party.
17. **Export Controls.** Buyer shall comply with all applicable laws, regulations and licenses regarding (i) export of products or information; (ii) sale of products to "forbidden" or other proscribed persons; and (iii) disclosure to non-citizens of regulated technology or information.
18. **Miscellaneous.** (a) **Waiver.** No failure or delay by Omron in exercising any right and no course of dealing between Buyer and Omron shall operate as a waiver of rights by Omron. (b) **Assignment.** Buyer may not assign its rights hereunder without Omron's written consent. (c) **Law.** These Terms are governed by the law of the jurisdiction of the home office of the Omron company from which Buyer is purchasing the Products (without regard to conflict of law principles). (d) **Amendment.** These Terms constitute the entire agreement between Buyer and Omron relating to the Products, and no provision may be changed or waived unless in writing signed by the parties. (e) **Severability.** If any provision hereof is rendered ineffective or invalid, such provision shall not invalidate any other provision. (f) **Setoff.** Buyer shall have no right to set off any amounts against the amount owing in respect of this invoice. (g) **Definitions.** As used herein, "including" means "including without limitation"; and "Omron Companies" (or similar words) mean Omron Corporation and any direct or indirect subsidiary or affiliate thereof.

Certain Precautions on Specifications and Use

1. **Suitability of Use.** Omron Companies shall not be responsible for conformity with any standards, codes or regulations which apply to the combination of the Product in the Buyer's application or use of the Product. At Buyer's request, Omron will provide applicable third party certification documents identifying ratings and limitations of use which apply to the Product. This information by itself is not sufficient for a complete determination of the suitability of the Product in combination with the end product, machine, system, or other application or use. Buyer shall be solely responsible for determining appropriateness of the particular Product with respect to Buyer's application, product or system. Buyer shall take application responsibility in all cases but the following is a non-exhaustive list of applications for which particular attention must be given: (i) Outdoor use, uses involving potential chemical contamination or electrical interference, or conditions or uses not described in this document. (ii) Use in consumer products or any use in significant quantities. (iii) Energy control systems, combustion systems, railroad systems, aviation systems, medical equipment, amusement machines, vehicles, safety equipment, and installations subject to separate industry or government regulations. (iv) Systems, machines and equipment that could present a risk to life or property. Please know and observe all prohibitions of use applicable to this Product. NEVER USE THE PRODUCT FOR AN APPLICATION INVOLVING SERIOUS RISK TO LIFE OR PROPERTY OR IN LARGE QUANTITIES WITHOUT ENSURING THAT THE SYSTEM AS A WHOLE HAS BEEN DESIGNED TO ADDRESS THE RISKS, AND THAT THE OMRON'S PRODUCT IS PROPERLY RATED AND INSTALLED FOR THE INTENDED USE WITHIN THE OVERALL EQUIPMENT OR SYSTEM.
2. **Programmable Products.** Omron Companies shall not be responsible for the user's programming of a programmable Product, or any consequence thereof.
3. **Performance Data.** Data presented in Omron Company websites, catalogs and other materials is provided as a guide for the user in determining suitability and does not constitute a warranty. It may represent the result of Omron's test conditions, and the user must correlate it to actual application requirements. Actual performance is subject to the Omron's Warranty and Limitations of Liability.
4. **Change in Specifications.** Product specifications and accessories may be changed at any time based on improvements and other reasons. It is our practice to change part numbers when published ratings or features are changed, or when significant construction changes are made. However, some specifications of the Product may be changed without any notice. When in doubt, special part numbers may be assigned to fix or establish key specifications for your application. Please consult with your Omron's representative at any time to confirm actual specifications of purchased Product.
5. **Errors and Omissions.** Information presented by Omron Companies has been checked and is believed to be accurate; however, no responsibility is assumed for clerical, typographical or proofreading errors or omissions.

OMRON INDUSTRIAL AUTOMATION • THE AMERICAS HEADQUARTERS

Schaumburg, IL USA • 847.843.7900 • 800.556.6766 • www.omron247.com

OMRON CANADA, INC. • HEAD OFFICE

Toronto, ON, Canada • 416.286.6465 • 866.986.6766 • www.omron247.com

OMRON ELECTRONICS DE MEXICO • HEAD OFFICE

México DF • 52.55.59.01.43.00 • 001.800.556.6766 • mela@omron.com

OMRON ELECTRONICS DE MEXICO • SALES OFFICE

Apodaca, N.L. • 52.81.11.56.99.20 • 001.800.556.6766 • mela@omron.com

OMRON ELETRÔNICA DO BRASIL LTDA • HEAD OFFICE

São Paulo, SP, Brasil • 55.11.2101.6300 • www.omron.com.br

OMRON ARGENTINA • SALES OFFICE

Cono Sur • 54.11.4783.5300

OMRON CHILE • SALES OFFICE

Santiago • 56.9.9917.3920

OTHER OMRON LATIN AMERICA SALES

54.11.4783.5300

OMRON EUROPE B.V. • Wegalaan 67-69, NL-2132 JD, Hoofddorp, The Netherlands. • Tel: +31 (0) 23 568 13 00

Fax: +31 (0) 23 568 13 88 • www.industrial.omron.eu