

W7BB-X01

Bash Button

Bash Button & Halo Lighting Function

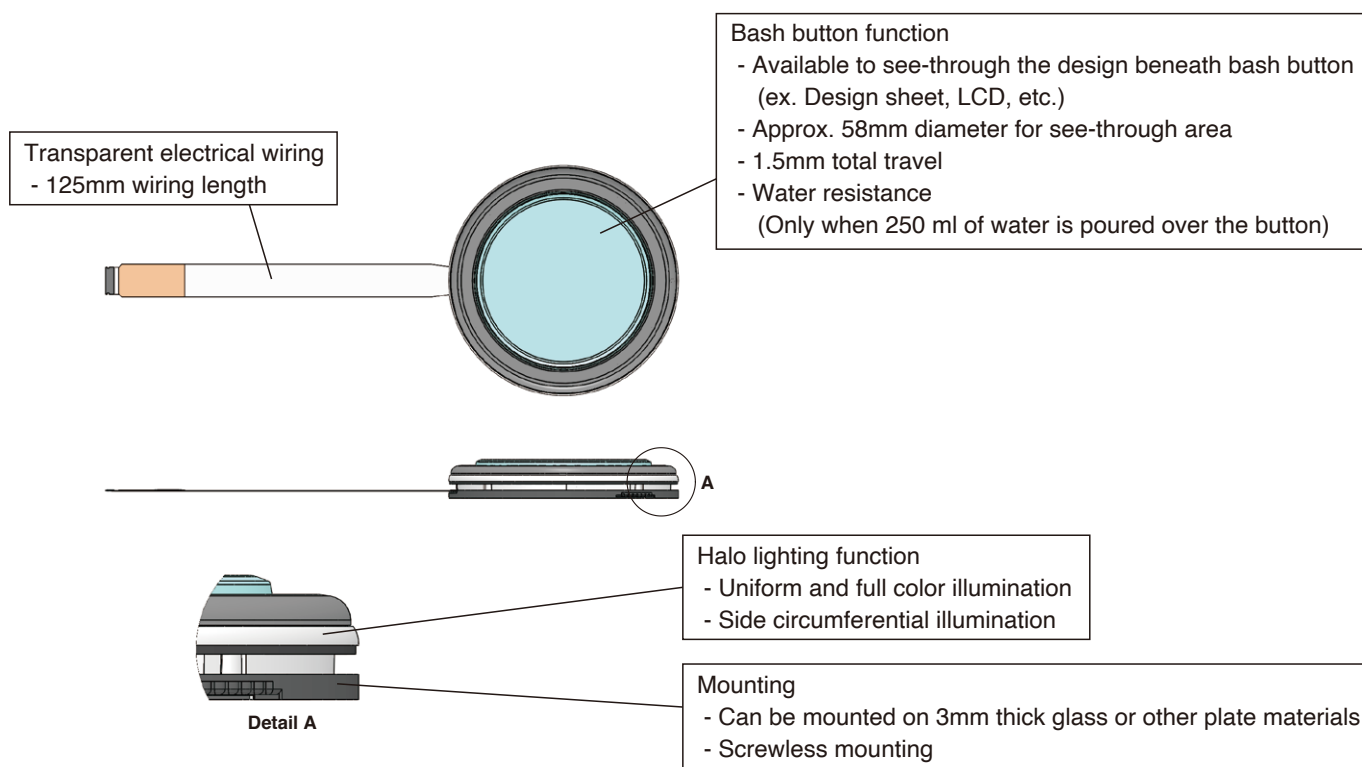
- Seamless housing design
 - Thinner bash button
 - Screwless assembly to casino glass deck
- High degree of freedom in designing the casino glass deck
 - See-through keytop
 - Transparent FPC
 - Halo lighting
- High durability and water resistance



Refer to "Precautions" on page 7.



Product Overview



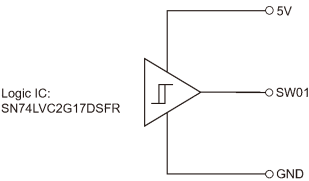
Ordering Information

Model	Minimum packing unit
W7BB-X01	100 Pieces
W7BB-X01-2	20 Pieces

Main Electrical Characteristics

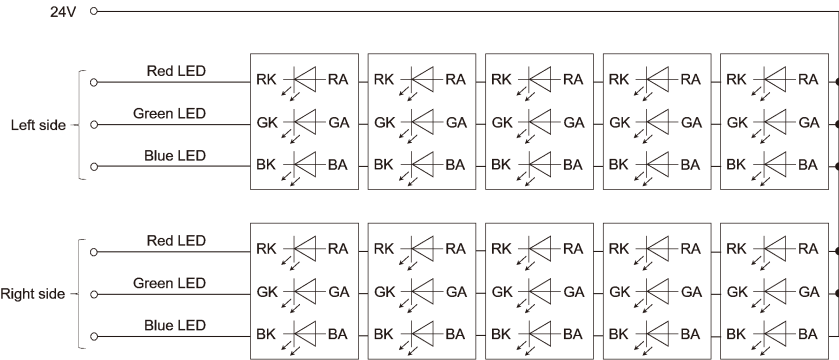
Item	Rating /Performance	Remarks
Power Voltage	DC 5V ± 5% DC 24V ± 5%	For switch function For halo lighting function
Consumption Current	DC 5V MAX 0.1A DC 24V MAX 0.1A	For switch function For halo lighting function

(1) Switch output circuits



(2) LED output circuits

LED type: LTRB RASF (OSRAM)
Constant current circuit is recommended for LED control circuit.
If you need LED versions, please contact us.



(3) Interface

FPC spec: 0.25mm pitch, 35pin

Receptacle housing type: FH62-35S-0.25SHW(10) (HIROSE ELECTRIC CO.,LTD.)

FPC pin-out: Shown in following table

No	IO	Function	Remarks
1	I	+24V	Power supply for LED
2	NC		
3	I	+24V	Power supply for LED
4	NC		
5	I	+24V	Power supply for LED
6	NC		
7	-	GND	GND
8	NC		
9	I	+5V	Power supply for logic IC
10	NC		
11	O	LED-L-G	Left side Green LED
12	NC		
13	O	LED-L-R	Left side Red LED
14	NC		
15	O	LED-L-B	Left side Blue LED
16	NC		
17	O	SW01	Switch output signal Low level for SW on / High level for SW off
18	NC		
19	O	SW01	Switch output signal Low level for SW on / High level for SW off
20	NC		
21	O	LED-R-G	Right side Green LED
22	NC		
23	O	LED-R-R	Right side Red LED
24	NC		
25	O	LED-R-B	Right side Blue LED
26	NC		
27	I	+5V	Power supply for logic IC
28	NC		
29	-	GND	GND
30	NC		
31	I	+24V	Power supply for LED
32	NC		
33	I	+24V	Power supply for LED
34	NC		
35	I	+24V	Power supply for LED

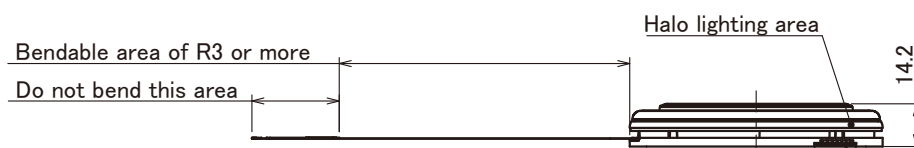
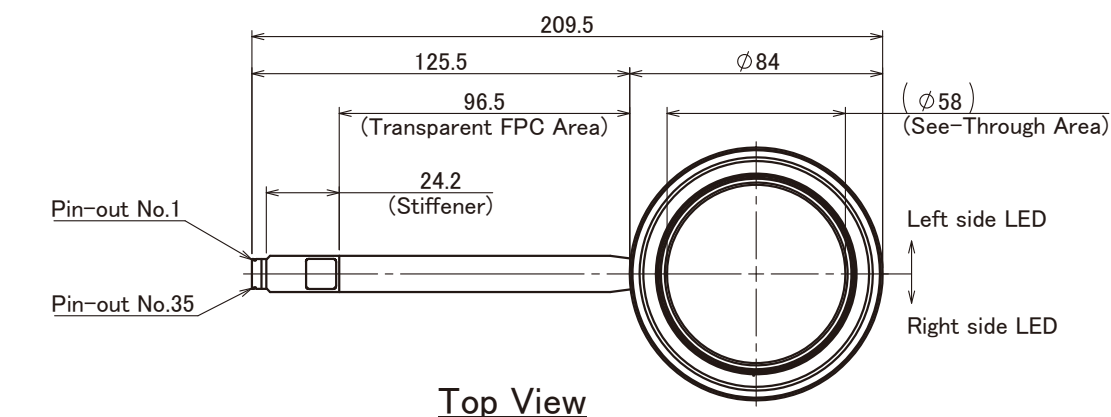
Main Mechanical Characteristics

Item	Rating / Performance	Remarks
Operating Force(OF)	2.1 N	Typical
Pre Travel(PT)	1.0 mm	Typical
Total Travel(TT)	1.5 mm	Typical
Durability	4,000,000 operations	at center / 30N pressing force

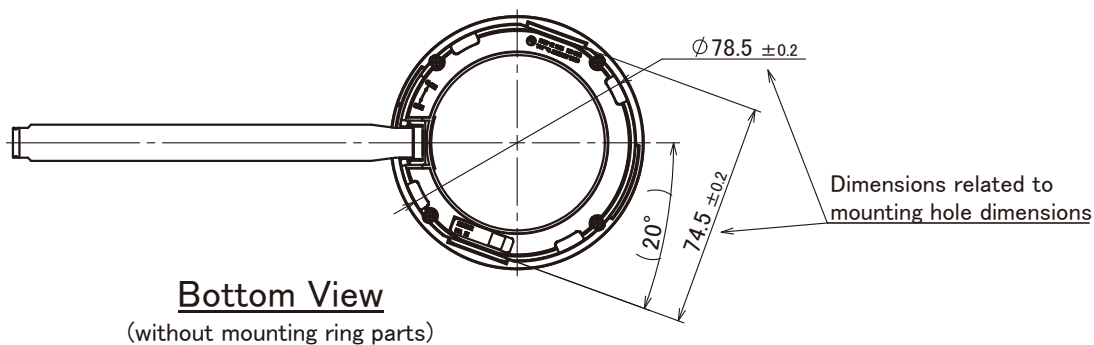
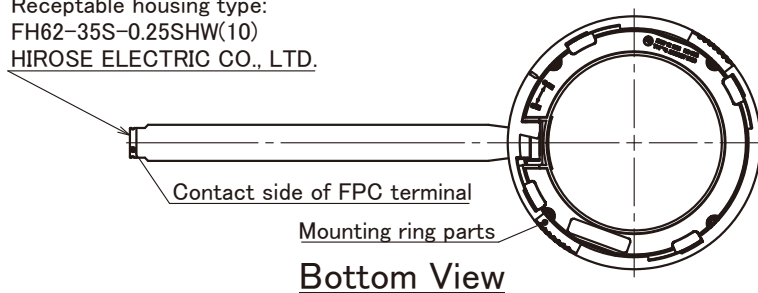
Dimensions

(Unit: mm)

(1) Outline

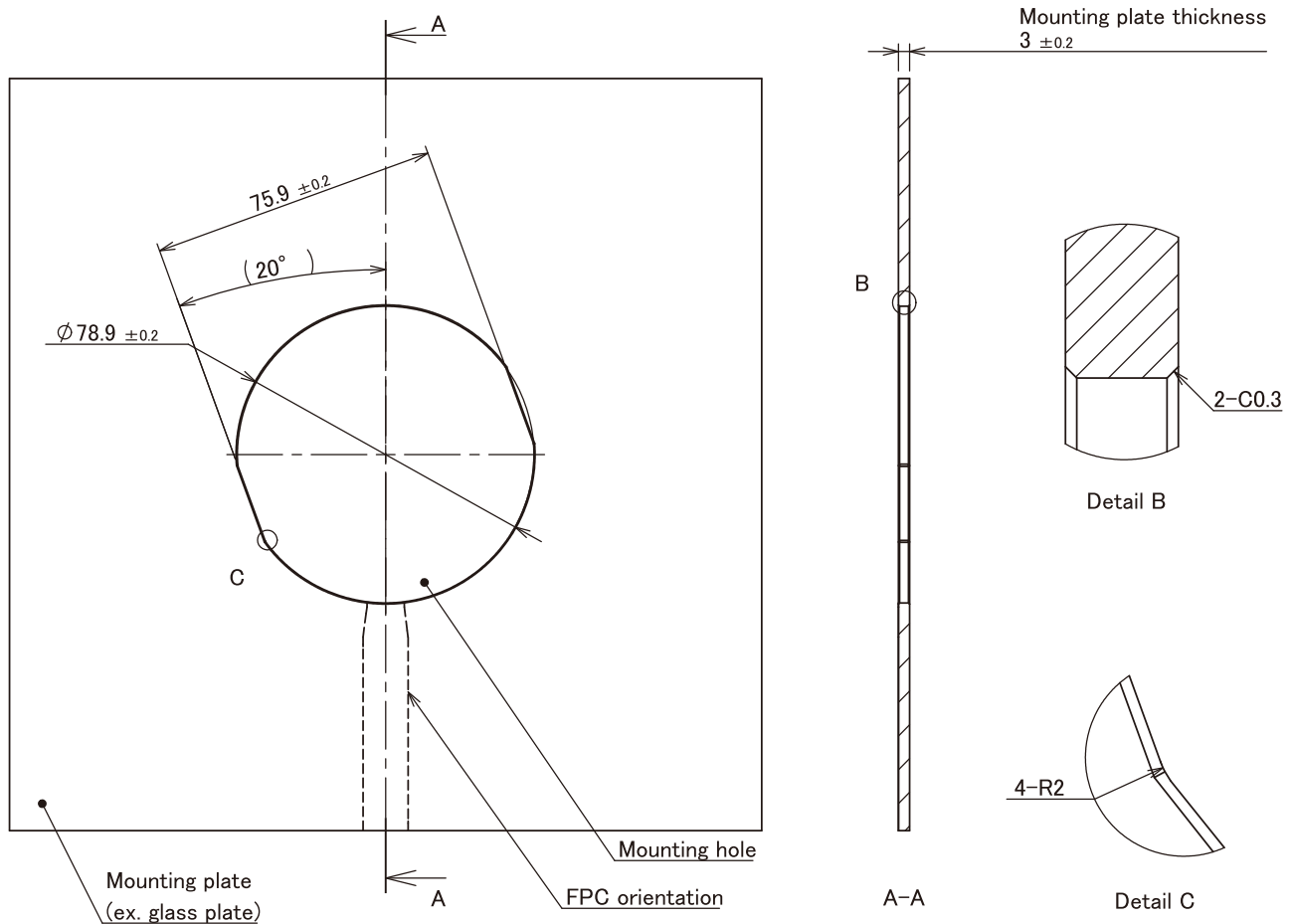


Receptable housing type:
FH62-35S-0.25SHW(10)
HIROSE ELECTRIC CO., LTD.

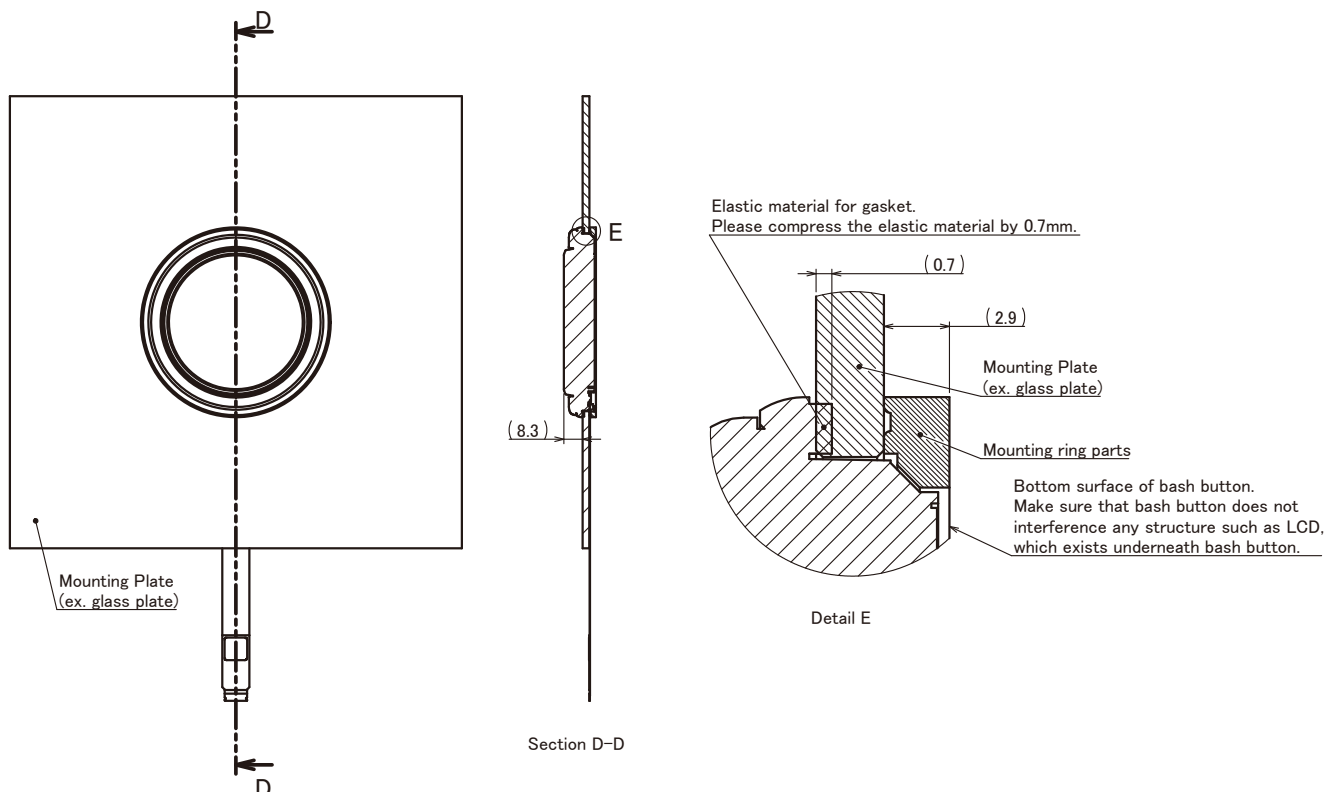


Tolerance without indication is $\pm 1.0\text{mm}$

(2) Recommended mounting hole dimensions

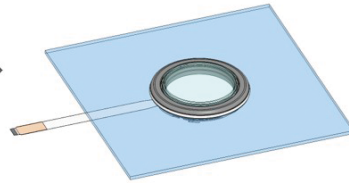
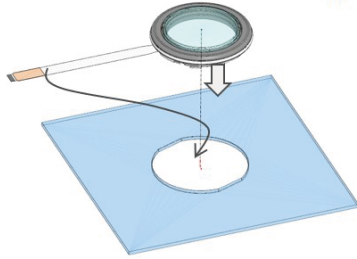


(3) Dimensions after assembling the product to glass plate

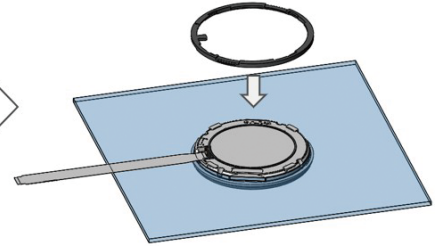


Mounting Procedure

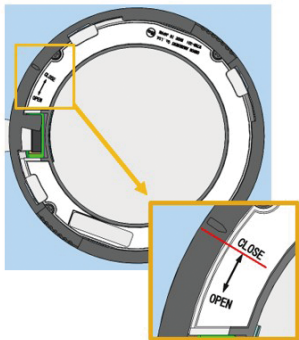
Insert the FPC into the hole first.
Then set bash button into mounting plate.



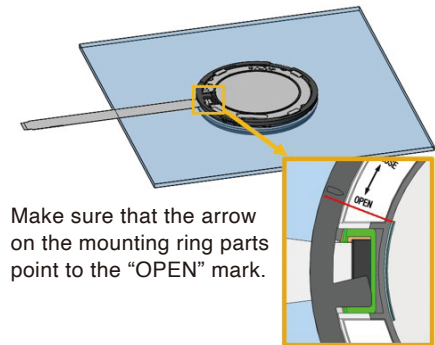
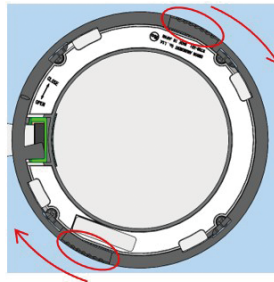
Set mounting ring parts into the
bottom of bash button.



Rotate mounting ring parts until the
arrow indicates "CLOSE" mark.
(as shown in orange box below)



Hold two points (as shown in red
circles below) and rotate
mounting ring parts in clockwise.



Make sure that the arrow
on the mounting ring parts
point to the "OPEN" mark.

Precautions

Make sure to read these precautions for a safe use of the product.

- The contents included are to ensure proper use of the product and prevent harm and/or property damage to the user or other people.
- Warnings and cautions are defined as follows.

● Definition of Warning and Caution

 Warning	Denotes a potentially hazardous situation which, if not avoided, may result in minor, moderate or serious injury, or death. It may also result in serious property damage.
 Caution	Denotes a potentially hazardous situation which, if not avoided, may result in minor or moderate injury, or property damage.

“Property damage” indicates damage to a building, production line, household goods, other products, livestock, pets, etc.

● Examples of Indications

	Indicates forbidden actions.
	Indicates required actions.

Warning

Regarding the use or handling of the product

Do not use the product for life safety or crime prevention purposes.

Do not use the product on automobiles or other vehicles, including bikes as it may result in accidents.



Regarding the prevention of fire, electric shock, etc.

The following will result in fire, electric shock, injury or damage if ignored.

Do not touch the product or any connected cable during a lightning storm.

Do not use the product if it is cracked or damaged.



Do not insert foreign objects in the connector or in the holes on the various parts of the product.

Do not use the product in bathrooms or any other place where it may get in contact with water.

Do not touch the product or any connected cable with wet hands.

Do not touch the electrode at the side opening of the product during power-on.

Do not disassemble, repair, or modify the product.

Do not remove the wiring from the product.

Turn the power off and stop using the product if you notice any anomaly, including foul odor, heating, distortion or discoloration to the product during use. Install the cables for connecting the product in a way that would not put strong force on them, including making sure they are not crushed in a door.



Regarding the prevention of accident or injury

The following will result in accident or injury if ignored.

Do not touch sharp parts or the exposed interior of the product that was damaged.



Caution

Regarding the use or handling of the product

Make sure to follow the warnings and cautions indicated in this document when using the product.



Regarding installation

The following will result in accident, injury or damage if ignored.

Do not install the product in an unstable location. Install the cables in a safe way, out of the way of hands or feet.



Regarding heating

The following will result in burns if ignored.

The product may produce heat.

Do not touch it during power-on or shortly after powering it off.



Cautions

(1) Mounting

- Before mounting, dismounting, wiring, or inspecting this product, be sure to turn OFF the power supply to this product, otherwise an electric shock may be received or this product may burn.

(2) Wiring

- Do not perform wiring when power is being supplied to this product. Also, do not touch any of the charged terminals when power is being supplied. Otherwise, electric shock may be received.

(3) Foreign Substances

- Do not operate a drill near this product. Otherwise, foreign substances, like metal dusts, may get into this product and cause damage. When work must be done, cover this product with a sheet to prevent foreign substances. Before using this product, the sheet must be removed.

(4) Shock on individual product

- Do not drop or disassemble this product. Not only will characteristics be jeopardized, but it may also result in damage, electric shock, or burning.

Precautions for Correct Use

Follow the instructions listed below, to prevent breakdown, mal-function, and adverse effect on the performance and function of the product.

(1) Operating Environment

- Be sure to use this product at a temperature and humidity within the specified range.
- Do not use this product near equipment which generates intense high frequency noise.
- Do not use this product in a place with dust, oil spray or broken metal pieces.
- Do not use this product where shock or vibration is continuously applied to this product.
- Do not use this product in areas of high temperature and humidity.
- Do not use this product near corrosive gas, such as sulfuric gas (H₂S or SO₂), ammonium gas (NH₃), nitric gas (HNO₃), or chlorine gas (Cl₂).
- Do not use this product outdoors and at a place in the sun.

(2) Mounting

- Use caution when using sharp objects, such as a screwdriver, etc. Using it may damage the surface of this product and/or operational parts.
- Implement measures against static electricity in the case where the protective sheet needs to be removed.

(3) Wiring

- Be sure to use the correct wire for supply voltage and current.
- Be sure to secure enough safety distance for insulation. Be sure a ground is certainly secured.
- Be sure to wire the FPC not to add stress to the connector due to pull the FPC. Using excess wire is recommended to accommodate for panel maintenance as wires may be pulled when a panel is open/closed.

(4) Operation Method

- Since this product is not drip-proof, do not operate using wet hands. If liquids, such as water, oil, etc., enter this product, it may cause a short circuit, a fire, and/or poor operations of this product.
- Do not operate this product using a hard or sharp object or with excessive force. Applying excessive pressure or additional force after the plunger has fixed may deform the parts and result in malfunction.
- The operation side consists of resin parts. Do not operate it with a sharp screwdriver, tweezers, etc. It may cause deformations and/or damage to this product, resulting in operational defects.
- Be sure to use a soft and dry cloth to clean the surface of this product. If a wet cloth is used for cleaning, be sure water does not drain into this product.
- This product is not medicine-proof. Be sure not to use a solvent or a detergent to clean up the surface of this product. This may damage this product.

(5) Storage Environment

- Please store this product within the specified temperature and humidity ranges.
- Please store this product in an area protected from rain as rain can cause it to fail.
- Do not store this product near corrosive gas such as sulfuric gas (H₂S or SO₂), ammonium gas (NH₃), nitric gas (HNO₃) or chlorine gas (Cl₂).
- Do not store this product in places under direct sunlight as this may result in discoloration of the resin used on the operation side of this product.
- It is needed that this product will be inspected before used if it is stored for 3-6 months or more after production, depending on the location.

Caution on Usage

Since the product is intended for assembly into other devices, single units of the product are not certified by various standards in each country.

Terms and Conditions Agreement

Read and understand this data sheet.

Please read and understand this data sheet before purchasing the products. Please consult your OMRON representative if you have any questions or comments.

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.omron.com/global/> or contact your Omron representative for published information.

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.

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.

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 PRODUCT(S) IS PROPERLY RATED AND INSTALLED FOR THE INTENDED USE WITHIN THE OVERALL EQUIPMENT OR SYSTEM.

Programmable Products.

Omron Companies shall not be responsible for the user's programming of a programmable Product, or any consequence thereof.

Performance Data.

Data presented in Omron Company websites, data sheets 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.

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.

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.

Please check each region's Terms & Conditions by region website.

OMRON AMUSEMENT Co., Ltd

Regional Contact

Americas

<https://components.omron.com/us-en/>

Asia-Pacific

<https://components.omron.com/sg-en/>

Korea

<https://components.omron.com/kr-en/>

Europe

<https://components.omron.com/eu-en/>

China

<https://components.omron.com.cn/>

Japan

<https://components.omron.com/jp-ja/>