EN

# User and safety guide

## Shelly 2PM Gen4 ANZ

2-channel Smart switch with power measurement and cover control

Referred to in this document as “the Device”

### Safety information

**For safe and proper use, read this guide, and any other documents accompanying this product. Keep them for future reference. Failure to follow the installation procedures can lead to malfunction, danger to health and life, violation of law, and/or refusal of legal and commercial guarantees (if any). Shelly Europe Ltd. is not responsible for any loss or damage in case of incorrect installation or improper operation of this device due to failure to follow the user and safety instructions in this guide.**

*⚠This sign indicates safety information.*

*ⓘThis sign indicates an important note.*

***⚠WARNING!** Risk of electric shock. Installation of the Device to the power grid must be performed carefully by a qualified electrician.*

***⚠WARNING!** Before installing the Device, turn the circuit breakers off. Use a suitable test device to make sure there is no voltage on the wires you want to connect. When you are sure that there is no voltage, proceed to the installation.*

***⚠WARNING!** Before making any changes to the connections, ensure there is no voltage present at the Device terminals.*

***⚠CAUTION!** Connect the Device only in the way shown in these instructions. Any other method could cause damage and/or injury.*

***⚠CAUTION!** The Device and the appliances connected to it, must be secured by a cable protection switch in accordance with EN60898-1 (tripping characteristic B or C, max. 16 A rated current, min. 6 kA interrupting rating, energy limiting class 3).*

***⚠CAUTION!** Do not use the Device if it shows any sign of damage or defect.*

***⚠CAUTION!** Do not attempt to repair the Device yourself.*

***⚠CAUTION!** The Device is intended only for indoor use.*

***⚠CAUTION!** Keep the Device away from dirt and moisture.*

***⚠CAUTION!** Do not allow children to play with the buttons/switches connected to the Device. Keep the devices (mobile phones, tablets, PCs) for remote control of Shelly away from children.*

### Product description

Shelly 2PM Gen4 ANZ is a Matter-compatible 2-channel smart switch with power measurement and cover control. Equipped with a multi-protocol wireless MCU, it supports Zigbee and Bluetooth connectivity for a secure connection. The Device can control 2 individual electrical circuits or motorized blinds, Venetian blinds, and roller shutters. Its small form factor allows retrofitting into standard electrical wall boxes, behind power sockets, light switches, or other places with limited space.

The Device has an embedded web interface to monitor, control, and adjust its settings. The web interface is accessible at **http://192.168.33.1** when connected directly to the Device access point or at its IP address when accessed from the same network.

The Device can access and interact with other smart devices or automation systems if they are in the same network infrastructure. Shelly Europe Ltd. provides APIs for the devices, their integration, and cloud control. For more information, visit **https://shelly-api-docs.shelly.cloud**.

*ⓘThe Device comes with factory-installed firmware. To keep it updated and secure, Shelly Europe Ltd. provides the latest firmware updates free of charge. Access the updates through either the embedded web interface or the Shelly Smart Control mobile application. Installation of firmware updates is the user’s responsibility.*

### Wiring diagram

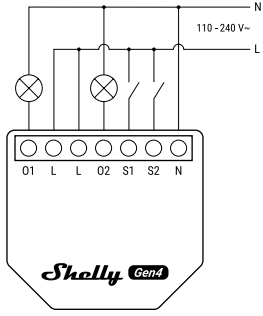
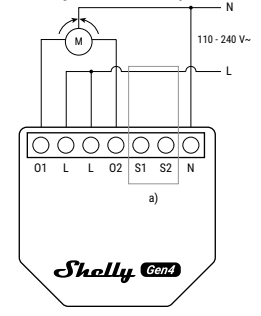



*Fig. 1. 2-channel switch profile*



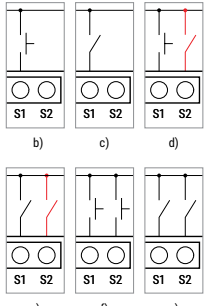




*Fig. 2. Cover control profile*

### Legend

**Device terminals**

- **O1, O2:** Load circuit output terminals
- **L:** Live terminal (110-240 V~)
- **S1, S2:** Switch input terminals
- **N:** Neutral terminal

**Wires**

- **L:** Live wire (110-240 V~)
- **N:** Neutral wire

### Installation instructions

*ⓘTo connect the Device, we recommend using solid single-core wires or stranded wires with ferrules. The wires should have insulation with increased heat resistance, not less than PVC T105°C (221°F).*

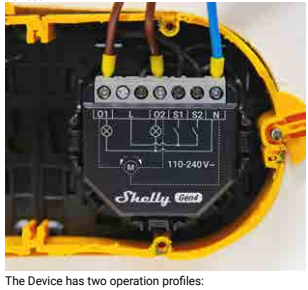
*ⓘDo not use buttons or switches with built-in LED or neon glow lamps.*

*ⓘFor security reasons, after you successfully connect the Device to the local Wi-Fi network, we recommend that you disable or password-protect the Device AP (Access Point).*

*ⓘTo enable the access point and the Bluetooth connection of the Device, press and hold the Reset/control button for 5 seconds.*

*ⓘTo perform a factory reset of the Device, press and hold the Reset/control button for 10 seconds.*

*ⓘDo not use L terminal(s) of the device to power other devices.*




The Device has two operation profiles:

- Switch control profile
- Cover control profile

**Switch profile**

If you want to use the Device as a switch to control 2 load circuits, connect the device as shown in Fig. 1 and described below:

1. Connect the two L terminals to the Live wire and the N terminal to the Neutral wire.
2. Connect the first load circuit to the O1 terminal and the Neutral wire.
3. Connect the second load circuit to the O2 terminal and the Neutral wire.
4. Connect the first switch to the S1 terminal and the Live wire.
5. Connect the second switch to the S2 terminal and the Live wire.

**Cover control profile**

As a cover controller, the Device has the following Control button modes:

- Single
- Dual
- Detached

**Single input mode**

To use the Device in Single input mode, connect it as shown in Fig. 2 b) for a Button input or Fig. 2 c) for a Switch input:

1. Connect the two L terminals to the Live wire and the N terminal to the Neutral wire.
2. Connect the button or the switch to the S1 or the S2 terminal and the Live wire.

When the input is configured as a Button in the Device settings, each button press cycles through open, stop, close, stop, etc.

When the input is configured as a Switch, each switch toggle cycles through open, stop, close, stop, etc.

In Single input mode, Shelly 2PM Gen4 has Safety switch functionality. To use it, connect the Device as shown in Fig. 2 d) for a button input or Fig. 2 e) for a switch input:

1. Connect the two L terminals to the Live wire and the N terminal to the Neutral wire.
2. Connect the common motor terminal/wire to the Neutral wire.
3. Connect motor direction terminals/wires to the O1 and O2 terminals*.
4. Connect the Safety switch to the S2 terminal and the Live wire.

The safety switch can be configured to:
- Stop the movement until the safety switch is disengaged or until a command is sent to reverse the direction. If configured in the Device settings, the movement can resume in the opposite direction until the end position is reached.
- Stop and immediately reverse the movement until the end position is reached. This option requires reverse movement to be configured in the Device settings.

**Dual input mode**

To use the Device in Dual input mode, connect it as shown in Fig. 2 f) for a button input or Fig. 2 g) for a switch input:
1. Connect the two L terminals to the Live wire and the N terminal to the Neutral wire.
2. Connect the common motor terminal/wire to the Neutral wire.
3. Connect motor direction terminals/wires to the O1 and O2 terminals*.
4. Connect the first button/switch to the S1 terminal and the Live wire.
5. Connect the second button/switch to the S2 terminal and the Live wire.

When the inputs are configured as buttons:
- Pressing a button when the cover is static: Moves the cover in the corresponding direction until the endpoint is reached.
- Pressing the button for the same direction while the cover is moving: Stops the cover.
- Pressing the button for the opposite direction while the cover is moving: Reverses the cover movement until the endpoint is reached.

When the inputs are configured as switches:
- Moves the cover in the corresponding direction until the endpoint is reached.
- Turning the switch off: Stops the cover movement.
- Both switches turned on: The Device respects the last engaged switch. Turning off the last engaged switch stops the cover movement, even if the other switch is still on. To reverse the cover movement, turn the other switch off and on again.

In Dual input mode, the Device supports Slat control that allows for precise adjustment of slats in Venetian blinds. This function has the following settings:
- Open time - the duration in seconds for the slats to transition from fully open to fully closed position.
- Close time - the duration in seconds for the slats to transition from fully closed to fully opened position:
  - Default: 1.5 seconds
  - Accepted range: 0.5-10 seconds
- Step - controls the incremental movement of the slats in percent between the two endpoints:
  - Fully closed position (0%)
  - Fully opened position (100%)

When the inputs are configured as buttons:
- Pressing a button when the cover is static: Moves the slats in the corresponding direction by the predefined step.
- Pressing the button for the same direction while the cover is moving: Stops the cover.
- Pressing the button for the opposite direction while the cover is moving: Reverses the cover movement until the endpoint is reached.
- Pressing and holding the button moves the slats and the cover in the corresponding direction until the endpoint is reached.

When the inputs are configured as switches:
- Moves the slats and the cover in the corresponding direction until the endpoint is reached.
- Turning the switch off: Stops the cover movement.
- Both switches turned on: The Device respects the last engaged switch. Turning off the last engaged switch stops the cover movement, even if the other switch is still on. To reverse the cover movement, turn the other switch off and on again.

**Detached mode**

In Detached mode, the Device can only be controlled through its web interface and its app. Buttons or switches connected to the Device will not control the cover movement.

To use the Device in Detached mode, connect it as shown in Fig. 2 a):
- Connect the two L terminals to the Live wire and the N terminal to the Neutral wire.
- Connect the common motor terminal/wire to the Neutral wire.
- Connect motor direction terminals/wires to the O1 and O2 terminals*.

**Obstacle detection**

Shelly 2PM Gen4 can detect obstacles. If an obstacle is present, the cover movement stops. If configured in the Device settings, the movement changes its direction until the endpoint is reached. Obstacle detection can be enabled or disabled for one or both directions.

*The Device outputs can be reconfigured to match the required direction.

## Shelly Smart Control

The Device can be monitored, controlled, and set up via Shelly Smart Control. You can access the service through the Shelly Smart Control app or a web browser at **https://control.shelly.cloud**.

ⓘ*The Shelly Smart Control is optional. This Device can be used standalone or with other home automation platforms.* For instructions on how to add the Device to the Shelly Smart Control and control it from the mobile app, refer to: **https://shelly.link/app-guide**

## Setting up with Matter

Before you start, make sure you have:
- 2.4 GHz Wi-Fi network.
- A Matter controller connected to the same network.

1. Scan the Matter QR code provided with the Device.
2. Follow the instructions on your mobile device.

## Setting up with Zigbee

Before you start, make sure you have a Zigbee coordinator connected to the Internet.
1. Switch from Wi-Fi (Matter) to Zigbee connectivity by pressing quickly 5 times the Reset button. The Device enters Zigbee inclusion mode for 2 minutes.
2. Add the Device following the instructions of your Zigbee home automation system.

ⓘ*If Zigbee inclusion mode expires, press the Reset button 3 times.*

ⓘ*While in Zigbee mode, if you need to use the Device with Wi-Fi again, hold the Reset button for 5 seconds to activate its access point.*

ⓘ*Receiving an update disables switching connectivity with the buttons. You can find how to switch connectivity in the Device's web interface settings.*

## Specifications

**Physical**
- Size (HxWxD): 37x42x16 mm / 1.46x1.65x0.63 in
- Weight: 30 g / 1.06 oz
- Screw terminals max torque: 0.4 Nm / 3.5 lbin
- Conductor cross section: 0.2 to 2.5 mm² / 24 to 14 AWG (solid, stranded, and bootlace ferrules)
- Conductor stripped length: 6 to 7 mm / 0.24 to 0.28 in
- Shell color: Black

**Environmental**
- Ambient working temperature: -20°C to 40°C / -5°F to 105°F
- Humidity: 30% to 70% RH
- Max. altitude: 2000 m / 6562 ft

**Electrical**
- Power supply: 110-240V~ 50/60 Hz
- Power consumption: < 1.4 W

**Output circuits ratings**
- Max. switching voltage: 240 V~
- Max. switching current:
  - 10 A (per channel)
  - 16 A (total)
- Max. switching current for motors:
  - 3 A @ 250 V~ (750 VA)
  - 4.5 A @ 120 V~ (540 VA)

**Wi-Fi**
- Protocol: 802.11 b/g/n/ax
- RF band: 2401–2483 MHz
- Max. RF power: < 20 dBm

**Bluetooth**
- Protocol: 5
- RF band: 2402 - 2480 MHz
- Max. RF power: <4 dBm

**Zigbee**
- Protocol: 802.15.4
- RF bands: 2405 to 2480 MHz
- Max. RF power: < 20 dBm

## Troubleshooting

In case you encounter problems with the installation or operation of the Device, check its knowledge base page: **https://shelly.link/2pm_gen4_anz**

## Disposal and recycling

Do not dispose of the product in household waste. Recycle the product to avoid environmental and health damage and promote resource conservation. Dispose of the product at a suitable waste collection point at your own risk.

Resellers from whom the equipment was purchased are obliged to accept waste electrical and electronic equipment (WEEE) free of charge for proper disposal.

Some electronic products may store personal information. The user is responsible for erasing this data before disposing of the device. To erase, reset the device to its factory settings.

## Declaration of Conformity

Hereby, Shelly Europe Ltd. declares that the radio equipment type for Shelly 2PM Gen4 ANZ is in compliance with Directive 2014/53/EU, 2014/35/EU, 2014/30/EU, 2011/65/EU. The full text of the EU declaration of conformity is available at the following internet address: **https://shelly.link/2pm_gen4_ANZ_DoC**

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Changes in contact information are published by the Manufacturer on the official website.



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