# Warmup konekt Wireless Boiler 2-Channel Switch

KW-BLR2CH





Installation and operating manual

# Package Contents

Quantity	Description	
1	Warmup konekt Wireless Boiler 2-Channel Switch	
4	Screws 3.0 x 30 mm	
4	Wall Plugs 5 mm	
1	Quick Start Guide	

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### 1 Information about this manual

This manual should be read carefully before commencing operation of your konekt wireless products. Always retain the product manuals for future use.

#### Symbols used:



Hazard indication



Important information

### 2 Hazard information



Do not open the devices except as instructed to by the installation and operation manuals. It does not contain any user serviceable components.



The device is suitable for indoor use only. It must not be exposed to moisture, vibrations, mechanical loads or temperatures outside of its rated values.



For safety and licensing reasons (CE/UKCA), unauthorised change and/or modification of the device(s) is not permitted.



The device and its packaging are not toys; do not allow children to play with them. Small components such as batteries and packaging preset a risk of choking or suffocation.



Using the devices, in any way or for any purpose, other than those described in their installation and operation manuals invalidates any warranty or liability.



This device is part of the building installation and must only be installed by appropriately qualified and competent persons in accordance with local regulations and standards.



To prevent risk of electric shock, the devices must be disconnected from the mains supply and discharged before conducting any works. Safeguard against the supply being switched back on throughout works.



Non-compliance with the installation instructions may result in a fire or an electric shock.



The device may only be used for fixed installations. The devices must be securely attached within a fixed installation.



Ensure all cables connected to the device are correctly sized and rated.



Do not exceed the rated loads of the device or any individual output.



Manuals for 3rd party devices connected to these, such as heat sources, valves and circulators, must be followed and complied with to ensure compatibility.



This device is intended for use in residential, business and commercial properties only.



The device does not require product specific maintenance. To clean, use a soft, clean and lint-free cloth. To remove more stubborn marks, dampen the cloth with warm water. Do not use detergents or chemicals on the devices.

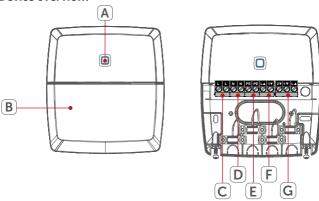
### 3 Function and device overview

The knoekt wireless Boiler Switch provides interlock for:

- UFH demand
- Radiator demand
- · DHW scheduling
- · Heating and Cooling changeover
- · Dehumidification demand

Where more than 2 channels are required multiple switches can be used.

#### **Device overview:**



- (A) System button (Pairing button and LED)
- (B) Cover
- (C & D) Supply Live and Neutral terminals (230 V AC / 50 Hz, 6A)
- (E) PE terminals
- (F) Switching channel OUT1 (N.O contact)
- (G) Switching channel OUT2 (change-over contact)

# 4 General system information

The Boiler Switch is part of the Warmup konekt Wireless System. Devices in the konekt Wireless System system can be easily paired and setup through the konekt Wireless Smart Hub using the konekt App. All functions of the konekt Wireless System are described in detail in the User Guide. The User Guide and Online manuals for all other konekt Wireless devices are available on www.warmup.co.uk

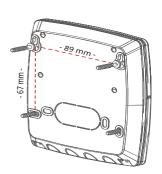
## 5 Mounting

You can flexibly mount the boiler switch for heating systems on walls using the supplied screws and plugs.

 Open the cover (B) by removing the screws, (1) at the bottom and then (2) pulling the cover down and then up.



- Use a pen to mark the four bore holes of the switch onto the wall where you plan to mount it.
- Using a suitable drill, make 4 x 5mm holes as shown.
- Use the supplied screws and plugs to secure the switch to the wall.



## 6 Startup

## 6.1 Pre-installation information



This device is part of the building installation and must only be installed by appropriately qualified and competent persons in accordance with local regulations and standards.



To prevent risk of electric shock, the devices must be disconnected from the mains supply and discharged before conducting any works. Safeguard against the supply being switched back on throughout works.



Non-compliance with the installation instructions may result in a fire or an electric shock.

Max. cross sections for Boiler Switch terminals <b>C to F</b>		
Rigid cable Flexible cable with/without ferrule		
1.0 - 2.5 mm <sup>2</sup>	1.0 - 2.5 mm <sup>2</sup>	
Max. cross sections for Boiler Switch terminals <b>G</b>		
Rigid cable Flexible cable with/without ferrule		
1.0 - 1.5 mm <sup>2</sup>	0.5 - 1.0 mm <sup>2</sup>	



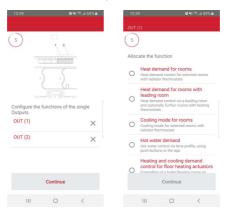
The permitted cable diameter for all cable bushings are 8 to 11 mm.

### **6.2 Wiring information**

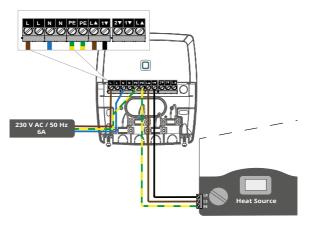


The boiler switch must be configured in the konekt wireless App. The function of switching channel OUT1 **(F)** and if required, switching channel OUT2 **(G)** will need to be assigned using the App.

Once paired to the Smart Hub you will be asked to assign this function. See section 6.3 to pair the device to the Smart Hub.

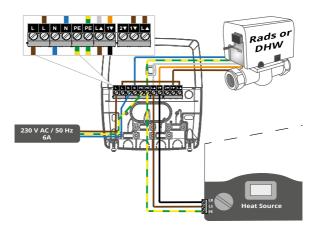


### 6.2.1 Connect Only UFH or Only Rads



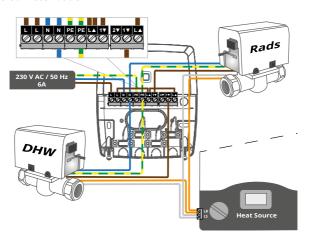
UFH only assignment	Rads only assignment
OUT1	OUT1
Heating and cooling demand for floor heating actuators	Heat demand for rooms

#### 6.2.2 Connect UFH with Rads or DHW



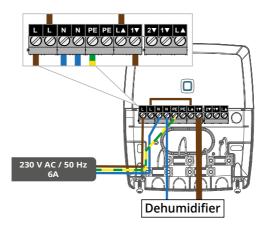
Rads & DHW assignment	UFH with DHW assignment
OUT1	OUT1
Heating and cooling demand for floor heating actuators	Heating and cooling demand for floor heating actuators
OUT2	OUT2
Heat demand for rooms	Hot water demand

#### 6.2.3 Connect Rads & DHW



Rads & DHW assignment	
OUT1	
Heat demand for rooms	
OUT2	
Hot water demand	

#### 6.2.4 Connect air dehumidifier



## Air dehumidifier assignment

#### OUT1

Dehumidification for floor heating actuators

### 6.3 Pairing the device to the Smart Hub

The wiring centre can be paired seamlessly to the konekt Wireless Smart Hub (KW-UKHUB). To pair devices to the Smart Hub please download the konekt app.



The Smart Hub must be set up via the konekt App, before any other devices can be added to your system. For further information, refer to the Smart Hub operating manual.



If you have already connected the wiring centre to other konekt Wireless device(s), you MUST restore its factory settings first before you can connect it to the Smart Hub (see section 8)







- Open the konekt wireless App and select Pair device.
- If required, press the system button (A) once. The LED will flash orange to indicate pairing mode. Pairing mode will remain active for three minutes.
- Your device will automatically appear in the konekt App. To confirm, scan the QR code attached to the device or alternatively enter the last four digits of the device number (SGTIN) in the App.
- If pairing is successful the LED (B) will light up green. If it lights red please try to pair the device again.
- In the App, give the device a name and allocate it to a room.
- In the App select the functions of the boiler switch.
  See section 6.2 for more information on assigning the functions of the boiler switch.

### 7 Troubleshooting

#### 7.1 Command not confirmed

If at least one device does not accept a command, the LED **(B)** will light up red. This may be caused by radio interference (see section 10). Other possible issues may be:

- Device cannot be reached.
- Device is unable to execute the command (load failure, mechanical block, etc.).
- Device is defective.

#### 7.2 Duty cycle

The duty cycle is a legally regulated limit of the transmission time of devices in the 868 MHz range. The aim of this regulation is to safeguard the operation of all devices working in the 868 MHz range. In the 868 MHz frequency range we use, the maximum transmission time of any device is 1% of an hour (i.e. 36 seconds in an hour). Devices must cease transmission when they reach the 1% limit until this time restriction comes to an end.

Warmup devices are designed and produced with 100% conformity to this regulation. During normal operation, the duty cycle is not usually reached.

However, intensively repeated device pairing processes may mean that this limit is reached in isolated instances during commissioning.

**IMPORTANT:** If the duty cycle limit is exceeded, the device may stop working for a brief period. The device will start working normally again after a short period (max. 1 hour).

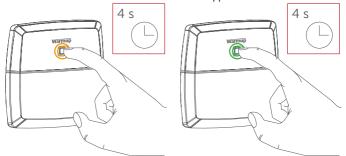
### 7.3 Error codes and flashing sequences

Flashing sequences of the system LED (A)		
Flashing code	Meaning	Solution
Short orange flashing	Radio transmission/ attempting to transmit/ configuration data is transmitted	Wait until the transmission is completed.
1x long green light	Transmission confirmed	You can continue operation.
1x long red light	Transmission failed or duty cycle reached	Please try again (See section 7.1 and 7.2)
Short orange flashing (every 10 s)	Pairing mode active	Enter the last four numbers of the device serial number to confirm
6x long red flashing	Device defective	Have a look at your app for error message or contact your installer.
1x orange and 1 x green lighting	Test display	Once the test display has stopped, you can continue.

## 8 Restore factory settings



The factory settings of the device can be restored. The device will automatically reconnect to the system and redownload its settings unless it is deleted within the konekt App first.



- Press and hold the system button (A) for 4 seconds until it begins to quickly flash orange.
- · Release the system button
- Press and hold the system button again until the system button LED lights green
- Release the system button to finish the factory reset.

## 9 Maintenance and Cleaning



The device does not require any specific maintenance other than replacing the battery when necessary. To clean, use a soft, clean and lint-free cloth. To remove more stubborn marks, dampen the cloth with warm water. Do not use detergents or chemicals on the devices.

## 10 General information about radio operation

Radio transmission is performed on a non-exclusive RF channel, which means that there is a possibility of interference occurring. Interference can also be caused by switching operations, electrical motors or defective electrical devices.



The range of transmission within buildings can differ greatly from that available in the open air. Besides the transmitting power and the reception characteristics of the receiver, environmental factors such as humidity in the vicinity have an important role to play, as do on-site structural/screening conditions.

### **Declaration of Conformity**



Warmup hereby declares that the Warmup konekt Wireless radio equipment is compliant with RED Directive 2014/53/EU and Radio Equipment Regulations 2017. Please scan the QR Code for the Declaration of Conformity.

#### Instructions for Disposal



Do not dispose of the device(s) with regular domestic waste! Electronic equipment must be disposed of at local collection points for waste electronic equipment in compliance with the Waste Electrical and Electronic Equipment Directive.

# 11 Technical specifications

# Warmup konekt Wireless Boiler 2-Channel Switch



Product Code	KW-BLR2CH
Operating Voltage	230 V AC / 50 Hz
Current Consumption	16 A max.
Standby Power Consumption	< 0.2 W
IP Rating	IP20
Protection Class	I
Ambient Temperature	0 to 50 °C
Load Type	Ohmic load
Max. Switching Capacity Switching Channel 1 Switching Channel 2	16 A (3680 W) 5 A (1150 W)
Method of Operation	1.B
Cycle Rating	10,000
Relay	Changeover contact: SPDT, μ contact Normally open contact: SPST, μ contact
Withstand Voltage	2500 V
Radio frequency band	868.0-868.6 MHz, 869.4-869.65 MHz
Maximum radiated power	10 dBm
Receiver category	SRD category 2
Typ. open area RF range	250 m
Duty cycle	< 1% per h/, < 10% per h
Construction	Independently mounted electronic regulation and control device
Degree of Pollution 2	

### 12 Warranty

Warmup plc warrants theses product(s), to be free from defects in the workmanship or materials, under normal use and service, for a period of three (3) years from the date of purchase by the consumer. If at any time during the warranty period the product is determined to be defective, Warmup shall repair or replace it, at Warmup's option.

If the product is defective, please either;

Return it, with a bill of sale or other dated proof of purchase, to the place from which you purchased it, or

Contact Warmup. Warmup will determine whether the product should be returned or replaced.

This warranty does not cover removal or re-installation costs and shall not apply if it is shown by Warmup that the defect or malfunction was caused by failure to follow the instruction manuals, incorrect installation or damage which occurred while the product was in the possession of a consumer. Warmup's sole responsibility shall be to repair or replace the product within the terms stated above.

WARMUP SHALL NOT BE LIABLE FOR ANY LOSS OR DAMAGE OF ANY KIND, INCLUDING ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES RESULTING, DIRECTLY OR INDIRECTLY, FROM ANY BREACH OF ANY WARRANTY, EXPRESS OR IMPLIED, OR ANY OTHER FAILURE OF THIS PRODUCT. THIS WARRANTY IS THE ONLY EXPRESS WARRANTY WARMUP MAKES ON THIS PRODUCT. THE DURATION OF ANY IMPLIED WARRANTIES, INCLUDING THE WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, IS HEREBY LIMITED TO THE THREE-YEAR DURATION OF THIS WARRANTY.

This Warranty does not affect your statutory rights.





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