

# OPERATING INSTRUCTIONS

Version 12/06



## Wireless doorbell transmitter „FS20 TK“

Item No. 62 03 38

**CONRAD**  
ELECTRONIC

	Page
1. Introduction .....	3
2. Prescribed use .....	4
3. Scope of delivery .....	4
4. Explanation of icons .....	5
5. Safety instructions .....	5
a) General information .....	5
b) Battery instructions .....	6
6. Description of functions .....	7
7. Installation .....	8
8. Programming and operation .....	9
9. Battery replacement .....	9
10. Information on the range .....	11
11. Handling .....	12
12. Maintenance and cleaning .....	12
13. Disposal .....	13
a) General information .....	13
b) Batteries and rechargeable batteries .....	13
14. Technical specifications and features .....	14
15. Declaration of conformity (DOC) .....	14

# 1. Introduction

---

Dear customer,

Thank you for purchasing this product.

**This product meets the requirements of both current national and European guidelines.**

Please read the user manual completely and observe the safety and operation instructions before using the product!



This user manual belongs to this product. It contains important information specific to its operation and handling. Please bear this in mind when passing on the product to a third party.

Therefore keep this user manual for future reference!

**All company and product names contained herein are trademarks of their respective owners. All rights reserved.**

**For more inquiries, contact or consult our technical service:**

**Germany:**           Tel. no.:   +49 9604 / 40 88 80  
                          Fax. no.:   +49 9604 / 40 88 48  
                          e-mail:    tkb@conrad.de  
                          Mon. to Thur. 8.00am to 4.30pm  
                          Fri. 8.00am to 2.00pm

## 2. Prescribed use

---

The wireless doorbell system is designed to announce visitors in the typical fashion or from a position up to 100m away (free-field range).

The wireless doorbell transmitter may not be altered or modified in any way. Doing so not only invalidates the licence (CE) but also the guarantee/warranty.

The product is intended for installation and operation in a protected outdoor area.

Batteries must be used to power the device.

Any use other than the one described above may damage the product and can also increase the risk of short-circuit, fire, electric shock, etc.



All the safety instructions and installation notes in this manual must be observed without fail.

## 3. Scope of delivery

---

- Wireless doorbell transmitter 'FS20 TK'
- User manual

## 4. Explanation of icons

---



The icon with a lightning flash in a triangle is used to alert you to potential personal injury hazards such as electric shock.



The icon with an exclamation mark in a triangle points to important instructions in this user manual that must be observed.



The 'hand' symbol indicates special tips and information on operation.

## 5. Safety instructions

---



**The product's guarantee becomes invalid if the product is damaged as a result of failure to observe these operating instructions. We do not assume any liability for any resulting damages!**

**Nor do we assume liability for damage to property or personal injury caused by improper use or failure to observe the safety instructions. In such cases the product's guarantee becomes invalid!**

### a) General information

- Do not use this product in hospitals or medical institutions. Although the product emits only relatively weak radio signals, these may cause life-support systems to malfunction. This may also be the case in other areas.
- For safety and licensing (CE) reasons any unauthorised alterations to and/or modification of the product are not permitted.

- The product is designed to be installed and operated in a protected outdoor area (for instance, under a projecting roof awning).
- This product is not a toy and should be kept out of the reach of children. The product contains small parts and batteries.
- Do not leave packaging material lying around. This may become a dangerous plaything in the hands of children.
- Handle the product with care; knocks, blows or even a fall from a low height can damage it.
- If, during mounting, connection or installation you are not sure or have doubts about how to proceed, contact a skilled technician.

## **b) Battery instructions**

- Keep batteries out of the reach of children.
- Make sure that the polarity is correct when inserting the batteries.
- Do not leave batteries lying around as they could be swallowed by children or pets. In such case seek immediate medical care.
- Leaking or damaged batteries/rechargeable batteries may cause acid burns, if they come into contact with skin. Therefore, please make sure you use suitable protective gloves.
- Make sure that batteries are not short-circuited or thrown into a fire. They might explode!
- Never take the batteries apart!
- Conventional batteries must not be recharged. They might explode!
- If the device is not used for a longer period of time (for example when stored), remove the inserted batteries to prevent the batteries from leaking and causing damage.

- The power is supplied by two type LR44 button cells (for example, Conrad order no. 652044).



**For the environmentally friendly disposal of batteries and rechargeable batteries, please read the section 13 'Disposal'.**

## **6. Description of functions**

---

The wireless doorbell transmitter 'FS20 TK' is a component of the FS20 wireless switching system. The device can be used to transmit to any FS20 receiver device.

The device may be linked to any compatible actuator using the 'FHZ 1000/1300 PC' home server system.

The 'FS20 SIG' is suitable for use as a doorbell signalling device.

Unlike standard FS20 transmitters, this device does not allow a house code or address to be set. It comes with the factory-set house code and address '1111'.

The high range, of up to 100m (free-field) allows the device to be used to transmit over long distances.



For more information, please read section 10 'Indications relevant to radio range'.

## 7. Installation

---

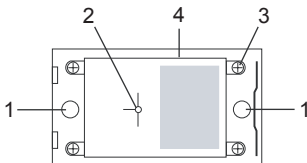
The doorbell transmitter comes equipped with batteries, therefore it is ready for immediate mounting on the wall.

- Working from the side, lever the facing from the catch using a small screwdriver. Place the device on a flat surface before carefully lifting the facing off.



Make sure the pressure spring does not fall out.

- Using the two mounting holes provided (see illustration below) attach the lower part with 3mm screws, for instance, to the wall.
- A nameplate may be inserted into the facing. To do this, carefully remove the transparent cover in the facing with a small, flat screwdriver.
- Replace the upper casing (and snap back into place, paying attention to the catch protrusions: two narrow protrusions on one side, one broader one on the other).



- 1 Mounting holes
- 2 Small steel spring
- 3 Four screws for removing the lid in order to change the batteries
- 4 Lid



## 8. Programming and operation

---

- Set the assigned FS20 receiver into operating mode, following the operating instructions for this device.
- Now press the doorbell button.
- If the receiver has registered the signal, it will react as described in the device's operating instructions.
- Now test the transmission range, whilst continuing to press the doorbell button.
- Each time you press the doorbell button, the assigned receiver should react in accordance with its function.



Configuration notes:

The transmitter always sends a power-on command.

The transmitter's factory set house code is found on the back of the device 'FS20 TK'.

## 9. Battery replacement

---

The two LR44 (AG-13) button cells will last for up to 10 years, depending on the amount of use.

If the signal fails to respond despite pressing the doorbell button repeatedly, the transmitter's battery set should be changed:

- Working from the side, lever the facing from the catch using a small screwdriver. Place the device on a flat surface before carefully lifting the facing off.



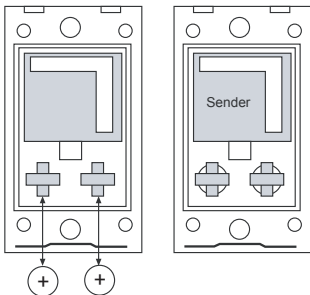
Make sure the pressure spring does not fall out.

- Unscrew the four fastening screws on the lid (covering the internal electronics).

- Lift off the lid and remove the two button cells from their holders (see illustration below).
- Insert two new button cells into the holders with the plus poles facing up (see illustration).



Always replace both batteries at the same time.



- Put the lid back on and screw it down using the four fastening screws.



Take especial care that the seal does not fall out or get pushed out.

- Replace the upper casing (and snap back into place, paying attention to the catch protrusions: two narrow protrusions on one side, one broader one on the other).

## 10. Information on the range

---

The transmitter has a range of up to 100m. This is the so-called free-field range, meaning the range when there is direct visual contact between the transmitter and the receiver.

In practical operation, however, there are a number of ambient conditions which can reduce the range:

- Walls, reinforced concrete ceilings
- Coated/metallised insulation glazing
- Vehicles
- Trees, bushes, earth, rocks
- Proximity to metal objects (for instance, a metal door)
- Proximity to a human body
- Broadband interference, for instance, in residential areas (DECT telephones, mobile phones, wireless headphones and loudspeakers, baby phones, etc.)
- Proximity to electric motors, transformers, power-supplies, computers
- Proximity to badly shielded or openly operated computers or other electric devices



Since local conditions are different at every installation location, a definite range cannot be guaranteed.

In general, the device will function without disruption anywhere on the grounds of a 'normal' one-family house.

Before mounting the system, test that you have uninterrupted reception at various times of day.

## **11. Handling**

---

The product may be installed in a protected outdoor area. Direct rain, or similar exposure, should be avoided.

This product is not a toy and should be kept out of the reach of children. Even a fall from a low height can damage the product.

## **12. Maintenance and cleaning**

---

The product requires no servicing except for battery replacement. Repairs or maintenance work may only be carried out by a skilled technician or a professional workshop.

The product may be cleaned using a clean, soft cloth, moistened with lukewarm water.

Do not use abrasive cleaning products, as these can cause discolorations.

## 13. Disposal

---

### a) General information



Do not dispose of electric and electronic products via the household rubbish.

Once the product becomes unusable, dispose of it in accordance with the relevant statutory regulations.

### b) Batteries and rechargeable batteries

As the consumer, you are legally obliged (regulation on the disposal of batteries) to return all your used batteries and rechargeable batteries. Do not dispose of your used batteries via the household rubbish!



Batteries/rechargeable batteries containing harmful substances are marked with the following icons, which alert you to the fact that disposal via the household rubbish is prohibited.

The identifiers for the respective heavy metals are: Cd=cadmium, Hg=mercury, Pb=lead (the designation is written on the battery/rechargeable battery, for instance, under the rubbish bin icons depicted at the left).



You can return your used batteries/rechargeable batteries free of charge to any authorised disposal station in your area, in our stores or in any other store where batteries/rechargeable batteries are sold.

By doing so you comply with your legal obligations and also make a contribution to environmental protection.

## 14. Technical specifications and features

---

Frequency: .....	868.35MHz
Modulation: .....	AM
Wireless range: .....	100m (free-field, see section 10)
Batteries: .....	2 x LR44 (AG-13)
Battery life: .....	approx. 10 years
Dimensions (W x H x D): .....	115 x 43 x 28mm

## 15. Declaration of conformity (DOC)

---

We, Conrad Electronic, Klaus-Conrad-Straße 1, 92240 Hirschau (Germany), hereby declare that this product complies with the fundamental requirements and other relevant regulations of directive 1999/5/EG.



You can find the declaration of conformity for this product at [www.conrad.com](http://www.conrad.com).





100%  
recycling  
paper.

Bleached  
without  
chlorine.

## Imprint

These operating instructions are published by Conrad Electronic SE, Klaus-Conrad-Str. 1, D-92240 Hirschau/Germany.

No reproduction (including translation) is permitted in whole or part e.g. photocopy, microfilming or storage in electronic data processing equipment, without the express written consent of the publisher.

The operating instructions reflect the current technical specifications at time of print.

We reserve the right to change the technical or physical specifications.

© Copyright 2006 by Conrad Electronic SE. Printed in Germany.