RADION receiver ST

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- ▶ Dual internal antennas provide spatial and polar diversity for highly reliable RF signal reception
- ► Cover and wall tamper detection
- ► Multiple device and control panel supportive options as well as RF diagnostics ensure efficient and effective installation
- ► Supports RADION repeater to increase wireless system coverage and reliability
- ► External status LED

RADION wireless from Bosch provides the range, scalability and exceptional battery life required to ensure reliable performance and superior quality. Advanced diagnostics and multiple device and control panel supportive options make installation and maintenance simple and cost effective. With a complete line of peripherals, RADION provides the flexibility for virtually any application requirement.

System overview

The RADION receiver ST is a wireless receiver that connects RADION and DSRF wireless peripherals such as motion and specialty detectors, keyfobs, panic buttons, door/window contacts, repeaters and more to supported Bosch and other compatible control panels. Wiring connections are established through the terminal block connection.

The receiver supports RF communication information at 433.42 MHz carrier frequency and is equipped with tamper detection, and detects and reports radio frequency interferences.

The receiver can be easily accessed and configured for a compatible control panel using the address switch on the back of the receiver housing. The receiver address switch provides a single-digit setting for the receiver's mode selection, allowing for ease of installation.

Functions

The receiver uses the RADION wireless protocol and supports:

- · Streamline bus communication
- · Tamper input processing
- · RF interference (jamming) detection and reporting
- · Signal strength and margin reporting
- · Compatible control panels and device management

Address switch addressing

Use the address switch to easily assign a proper mode to the receiver during installation.

Easy installation

The sliding self-locking enclosure has an integrated bubble level and a custom gap-free, lift gate style terminal block to make installation easier, faster, and more reliable.

LED display

The LED provides status and troubleshooting information about the receiver and its connection.

RF interference (jamming) detection and reporting

The receiver detects and reports interference jamming when the ambient noise level is above jamming thresholds for a period of 30 out of 60 seconds. The Jamming threshold is set at 70 percent of the full scaled received RF signal strength.

Communications

RF packet information is received through the use of two spatial and polar diverse antennas. The receiver then transfers status change information to the control panel.

Wall and cover tamper switch

The receiver transmits a tamper signal when someone removes the device from it's base, or pulls it away from the wall.

Certifications and approvals

Compatibility

RADION devices	RFRP repeater RFBT bill trap RFDL-11 motion detector TriTech RRDW-RM recessed door/window contact RFDW-SM standard door/window contact RFGB glass break RFKF-FB keyfob RFKF-TB keyfob RFPB-SB panic RFPB-TB panic RFPR-12 motion detector PIR RFPR-C12 motion detector (curtain) PIR RFSM smoke detector RFUN universal transmitter RFKF-FBS/RFKF-TBS keyfob RFKF-FBS-A/RFKF-TBS-A keyfob
DSRF devices	RF835E RF940E RF3401E RF3405E RF280E RF110E RF3406E RF3332E RF3334E RF3503E
Control panels	Solution 6000/144 (CC600) Solution 64 (CC110) Solution 16Plus (CC100) Solution 16i (CC500) Solution Ultima 880 (CC488) Solution 880 (CC408)

Certifications

Region	Certificate
Europe	EN50130-5 Environmental Class

Region	Certificate
	EN60950-1
	EN61000-3-2
	EN61000-3-3
	EN50130-4

Region	Certifica	tion
Australia	RCM	36 068 450 171 [RFRC-OPT, RFRC- STR]
Germany	VdS	H116003 AMAX RADION
Europe	CE	2014/30/EU EMC Directive (EMC); 2014/35/EU Low-Voltage Directive (LVD); 2011/65/EU Restriction of the use of certain hazardous substances in electrical and electronic equip- ment(RoHS) [OPT and STR]
	EN5013 1	EN-ST-000157 EN 50131-3: 2009; EN50131-5-3: 2005 + A1:2008, Grade 2; EN 50130-5 Environmental Class II; RADION receivers OP, OPT, and STR

Installation/configuration notes

Mounting considerations

You can mount the wireless receiver in residential, commercial or industrial locations in which a compatible control panel is already installed. The installation of the wireless receiver should be at a distance no greater than 300 m (1000 ft) from the control panel.

Wiring considerations

The wireless receiver connects to a control panel using the terminal block connections (R, B, Y). Use 22 AWG (0.6 mm) wires from the receiver to the control panel when connecting the wiring to the terminal block of the receiver.

Parts included

Quantity	Component
1	Wireless receiver
1	Hardware pack
1	Installation guide
1	Reference guide

Technical specifications

Mechanical

Dimensions:	139.7 mm x 209.6 mm x 31.8 mm 5.5 in x 8.25 in x 1.25 in
Wire length:	300 m (1000 ft)
Wire gauge:	0.65 mm (22 AWG) to 1.3 mm (16 AWG)

Power

Voltage (operating):	12 VDC
Maximum Current Draw:	100 mA
Frequency:	433.42 MHz

Environmental Considerations

Temperature (operating):	-10°C to +55°C (+14°F to +131°F)
Relative humidity:	Up to 93% non-condensing
Use:	Intended for indoor use.

Ordering information

RADION receiver ST

For use with compatible Streamline Bus control panels (streamline bus 433.42 MHz) Order number RFRC-STR

Represented by:

Europe, Middle East, Africa: Bosch Security Systems B.V.
P.O. Box 80002
5600 JB Eindhoven, The Netherlands
Phone: + 31 40 2577 284
emea.securitysystems@bosch.com
emea.boschsecurity.com **Germany:** Bosch Sicherheitssysteme GmbH Robert-Bosch-Ring 5 85630 Grasbrunn Germany www.boschsecurity.com

North America: Bosch Security Systems, Inc. 130 Perinton Parkway Fairport, New York, 14450, USA Phone: +1 800 289 0096 Fax: +1 585 223 9180 onlinehelp@us.bosch.com www.boschsecurity.us

Asia-Pacific:

Asia-Pacific:
Robert Bosch (SEA) Pte Ltd, Security Systems
11 Bishan Street 21
Singapore 573943
Phone: +65 6571 2808
Fax: +65 6571 2699
apr.securitysystems@bosch.com
www.boschsecurity.asia