TeleAlarm®
swiss design

Wireless Smoke Detector RM-LES900

leesys

- **Battery powered**
- **Self-test button**
- **Easy to program to the TeleAlarm Carephone**
- **Inbuilt optical and acoustic alarm**
- **Battery monitor**

In the event of smoke caused by a fire, the Wireless Smoke Detector issues a local, high-volume alarm tone and the LED blinks every 0.5 seconds. At the same time, the radio module transmits a signal to the Carephone which then triggers a call to the Alarm Receiving Centre.

System Overview

The Wireless Smoke Detector is compatible with the following TeleAlarm Carephones: HTS10, HTS12, HTS52+, HTS62, TA72 and TA74.

It consists of three components:
1. Smoke detector alarm head
2. Upper radio base component
3. Lower radio base component

The Wireless Smoke Detector is particularly suitable for early fire detection when smoke develops. It detects visible, light-coloured smoke, which frequently occurs before the development of flames and heat. When smoke is detected, the Wireless Smoke Detector emits a loud alarm sound which will continue until the source of the smoke is removed or extinguished and as long as the detector remains functional. At the same time, the radio module transmits a signal to the Carephone

This means that the fire brigade can be notified at the earliest opportunity. Smoke detectors are subject to certain technical limitations and do not always react to all situations. For example, they do not react to the presence of gases, flames, heat or thick, black smoke.

Functions

The radio transmitter module is accommodated in the radio base of the Wireless Smoke Detector. The radio transmitter module in the upper component of the radio base and the alarm head are each powered by their own battery. The smoke detector alarm head has a minimum operational life of 8 years. The end-of-life date is printed on the back. The battery of the alarm head is designed to last for the entire operational life of the device. After the expiry date, the alarm head must be replaced. The radio transmitter module is also designed

for an operational life of a minimum of 8 years. The battery is replaceable.

The optical Wireless Smoke Detector is based on the scattered light principle. A light source and a photodiode are arranged in the measurement chamber so that no light hits the photodiode normally. Light only scatters if smoke particles penetrate the measurement chamber. In this case the light beam is reflected by the smoke particles and this is detected by the photodiode. The evaluation unit generates an alarm if the detected value exceeds a specific threshold. Pressing the alarm head in assembled condition can manually trigger an alarm. The correct mode of operation on site and the alarm transmission can be tested using the Carephone. The test function is also used to register the Wireless Smoke Detector with a Carephone.

The detector uses radio technology, so that no cable needs to be laid. For installation, only the lower component of the base needs to be mounted using two screws.

Certificates and Permits

Region	Certification
Europa	CE

RED 2014/53/EU
LVD 2014/35/EU
EN 14604:2005 + AC:2008
IEC 62368-1 2014 +Corr.1 2015
EN 300 220-2 V3.1.1
EN 301 489-1 V2.2.0
EN 301 489-3 V2.1.1
EN 50130-4

Smoke Detector

Fitting Instructions

Recommended installation
Installation on the ceiling is possible up to a height of a maximum 6m.
The minimum distance between walls/furniture and the detector should be 50cm.
Avoid contamination, e.g. from dust, soot, steam and condensate water.

Installation
The Wireless Smoke Detector is intended only for use in residential spaces. It must be installed within the receiver range of the TeleAlarm Carephone. The Wireless Smoke Detector should ideally be mounted on the ceiling.

Programming
The Wireless Smoke Detector has an individual coding, which must be registered with the Carephone.

Scope of Delivery

Number	Compoments
1	Funk-Rauchmelder-Alarmknopf
2	Montagegehäuse
3	Senkschrauben
2	Dübel
1	Bedienungsanleitung

Order Information

Order number	Part
T.240.001.281	Wireless smoke detector RM-LES900

Technical Data

Wireless Smoke Detector RM-LES900		
Battery type		
- Alarm head:		CR17345-Duracell or CR123A Huiderui internal, non-replaceable
- Radio module:		CR 1/2AA –Varta 3.6V Lithium
Battery life		min. 8 Jahre
Operating temperature		4 °C bis +38 °C
Storage temperature		-20 °C bis +60 °C
Relative humidity		max. 90 %
Acoustic signals		Siren, normally 85 dB (at 1m distance)
Optical signals		LED
Monitored area		40 m²
Dimensions (H x Ø)		50 x 87 mm
Weight		c. 97 g
Material and colour		White plastic
Wireless Smoke Detector		
Detection principle		Scattered light principle
Duration of alarm		Inbuilt alarm: continues until the alarm criterion (smoke) dissipates. One radio signal per fire event.
Function test		Trigger alarm at alarm head
Optical signal		Red LED blinks (indicates with no acoustic signal that the device is ready to operate)
Acoustic signal		Loud, pulsating acoustic signal, c. 85dB(A)
Radio Module		
Transmission frequency		869,2125 MHz
Bandwidth		25 kHz
Modulation type		FSK (Frequenzumtastung)
Frequency deviation		±3 kHz
Output power		0.5mW
Free field range		c. 200 m
Code signalling to the Carephone		TA protocol

TeleAlarm SA
Rue du Pont 23
2300 La Chaux-de-Fonds
Switzerland
info@telealarm.com
www.telealarm.com

TeleAlarm SA
Hinterbüelstrasse 3
8307 Effretikon
Switzerland
info-ch@telealarm.com
www.telealarm.com

TeleAlarm Europe GmbH
Hertzstraße 2
04329 Leipzig
Germany
info-de@telealarm.com
www.telealarm.com