LEITRONIC AG
Swiss Security Systems

Use instruction
EasyAlarm SENIOR®

Emergency call button

Wired sensors

Motion detector

Siren-/Switch module

Alarm

Table of contents

1. INTRODUCTION

EasyAlarm® is an easy to use and reliable auto-dialler including announcement unit that can be used in many ways. The most important functions are listed below. Please read the instruction manual carefully before you start installation. Especially pay attention to the safety notes.

- ✓ **EasyAlarm® calls automatically**, when the emergency button is pressed. Up to nine calling numbers can be stored. In case of an alarm these numbers will be called one after another until someone acknowledges the alarm.
- ✓ **EasyAlarm® puts in contact.** After the individual recorded message has been announced a *hands-free communication* is established and the alarmed person is in immediate contact with the person seeking assistance and can take appropriate action!
- ✓ **EasyAlarm® provides security**. An authorised person can start a check call (dialling-in using PIN-Code) at any time. Connection can be established in two ways (*listening-in* or *hands-free connection*).
- ✓ **EasyAlarm® is simple**. All you have to do is to program the calling numbers and connect the alarm unit to the telephone line and power supply.
- ✓ **EasyAlarm® verifies presence of a supervised person.** If the optional motion-sensor is attached, an alarm will be triggered if there is no activity (motion) detected with a free programmable period (Default 24 hours).
- ✓ **EasyAlarm® protects your home/apartment.** While you are absent, the optional motion detector can trigger an alarm if someone enters your house or apartment. The optional smoke detector protect against fire.
- ✓ **EasyAlarm® monitors for noise activity**. An alarm can be triggered, if the selected noise level in the monitored room exceeds several times. The alarm is passed on without any indication to the person inside the monitored room => *listening-in connection* (acoustical monitoring of patient/baby/children or home-security application). If necessary a *hands-free communication* can be established.
- ✓ **EasyAlarm® is comfortable.** A handicapped person can answer an incoming call simply by pressing the emergency button. Pressing the emergency button once again terminates the call. The volume of the *hands-free communication* can be adjusted individually.
- ✓ **EasyAlarm® is remote programmable**. An authorised person can re-program the calling numbers and the calling number sequence during *phone connection.*

2. SAFETY INSTRUCTIONS

2.1 Approval

Declaration of Conformity
According to the R&TTE Directive 1999/5/EC of 09.March 1999
Manufacturer's Name: Leitronic AG
Manufacturer's Address: Engeloostrasse 16, CH-5621 Zufikon, Switzerland
declares that the product
Product Name: EasyAlarm
Model Number: EA-8-433
conforms to the following product specifications:
Safety (R&TTE, Article 3.1a): EN60950: 1992+A1+A2+A3+A4
EMC (R&TTE, Article 3.1b):   EN 50081-1, 1992
                                   EN 50082-1, 1997 Class B
Radio spectrum: EN 300 220
                                   ETS 300 683
Telephone: CTR21 as specified in Council Decision 98/482/EC
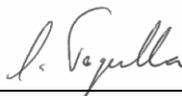**Supplementary Information**
The product herewith complies with the requirements of the following Directives and carries the **CE** marking
accordingly:
        the EMC directive 89/336/EWG
        the Low Voltage Directive 93/68/EEC
Zufikon, 1. April 2008   Silvan Tognella

2.2 Telephone connection

EasyAlarm® is designed to connect to an analogue telephone line. This connection should remain in service
for at least one hour after a mains power. These are:

- analogue PSTN
- analogue port of an ISDN terminal (ISDN-NT has to be reprogrammed for emergency operation at the ab-port)
- analogue port of a private exchange using UPS (Uninterruptible power supply 1h buffering)
- GSM Interface with approval, i.e. EA-GSM-Interface from Leitronic.

Not suitable:

- Voip or cable modem, as in case of power loss it is not functional!

The voltage of the telephone network is defined in EN 41003. It is higher than 40 V and therefore please
beware for electrical hazard and disconnect

2.3 Wireless sensors

Approval Switzerland: BAKOM 99.0135.K.P (WT-201, WT-211)
Approval other countries according to description of wireless-sensors.

2.4 Power supply

A transformer according to the safety regulation EN60950 provides power supply. 9V battery is used as a back
up in case of power failure. It is located on the rear side oft the device.

2.5 Safety notes

- Do not bring the device into contact with a liquid (water).
- Do not open the device (exception: opening of battery compartment).
- Replace the 9V-battery as soon as the announcement "battery error" is announced.
  - *Please note: The telephone cord must be disconnected before opening the battery compartment because otherwise you can get in contact with the telecommunication voltage!*
- Check alarm functions and start a *test-call*, before the system is put in service.
- Check from time to time the range of the emergency button according to section 6.5
- **In case that EasyAlarm® is used to monitor children, the supervising person must be in a suitable distance to take immediate care for the child.**
- **The same applies to handicapped persons, EasyAlarm® is not a substitute of a personal care taker!**
- **Radio transmission between the sensor and EasyAlarm®can be disturbed through another systems**
- **An alarm by telephone is only successful if the alarmed party takes care of the following points:**
  - **Alarm must not be answered by an answering machine or equal equipment**
  - **Mobile phones can be out of range (e.g. underground car park, shielded rooms, remote areas..)**
  - **Take care of the charging condition of the mobile phone**
  - **Loud noise can prevent you from hearing the ringer**
- **All the electrical connections have to be potential free. Observe the regulation according to EN60950.**

3. SET VIEW / FUNCTION ELEMENTS
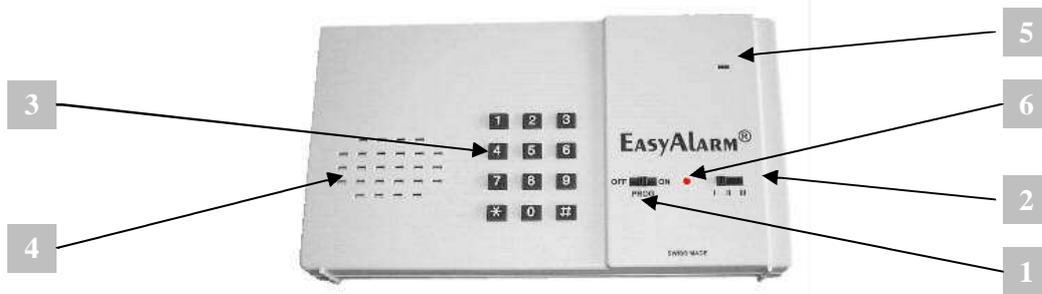
1 Function switch

Position	Information
OFF	Device is switched off
PROG	Entering of calling numbers, calling number sequence, PIN-Code and further parameters
ON	Device is in *supervision mode*

2 Selection switch

EasyAlarm® monitors the emergency buttons on all three positions (I/ II/ III). Additionally an acoustical supervision (noise activity) can be activated according to section 6.6. Doing so, the *selection switch* is also used to select the level of noise sensitivity:

Position	Monitoring functions (*Function switch* on position ON)
I	Low sensitivity => Alarm is triggered when noise level is exceeded frequently during a longer period
II	Medium sensitivity
III	High sensitivity => Alarm is triggered if noise level is exceeded two or three times within a short period

3 Keypad

When *function switch* is on position PROG, you can enter the calling numbers or do further programming. If *function switch* is on position ON pressing any key will start a *test call*.
Keys are marked with **1 2 3 4 5 6 7 8 9 * 0 #** in the following sections.

4 Loudspeaker

The integrated loudspeaker is used for voice guidance during the programming as well as for hands-free communication during *phone connection*.

5 Microphone

Is used during *hands-free connection* and for recording of *individual message*.

6 LED

Status of LED	Operation mode
Green	*Waiting period*
Green brief flashing every 4 seconds, also if acoustical monitoring is active by exceed set noise level	Supervision mode activated
Green is on and off for 4 seconds alternatively	Supervision mode deactivated
Orange	*Phone connection*

7 Battery compartment

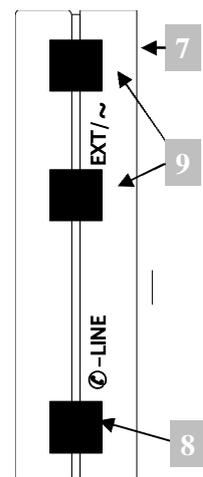The 9V-battery is used as a backup during power failure.

- *Please note: The telephone cord must be disconnected before opening the battery compartment because otherwise you can get in contact with the telecommunication voltage!*

8 Telephone jack (✆-LINE)

The plug must be locked in the jack. To disconnect press pawl.

9 External ports (EXT/≈) for accessories (as motion sensor) and power supply.

4. SETUP

4.1 Safety instructions

- *Function switch* must be shifted to OFF and telephone-cord must be disconnected before any wiring work is done on the AC-adapter or connecting cable.
- **All the electrical connections have to be potential free. Observe the regulation according to EN60950.**
- **All contacts have to be protected against any body contact**

- **Do not plug the phone cable (5) into the EXT/≈-jack, only into ☏-line jack of alarm unit (1)!**
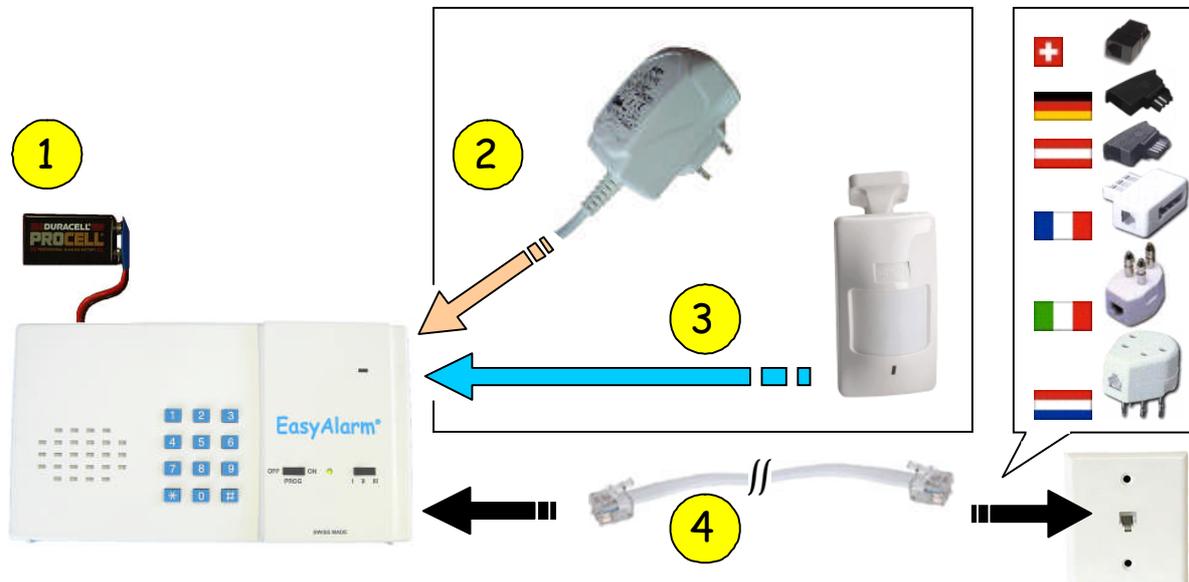
4.2 Installation

1. Slide *function switch* to OFF
2. Insert 9V battery ❶ into compartment on rear side of alarm unit
- *Please note: The telephone cord must be disconnected before opening the battery compartment because otherwise you can get in contact with the telecommunication voltage!*
3. Connect cable of AC-adapter ❷ into one of the EXT-ports of the alarm unit and plug it into main socket

Operation with motion detector BBT-PIR-RJ45 (Option COMBI)

4. Mount the motion detector ❸ and connect the cable to the other EXT-port of the alarm unit
   ☞ **Details according to section 11.1**

Telephone connection

5. Plug enclosed telephone-cord ❹ into ☏-Line-Jack of alarm unit and connect it with the telephone network
   ➥ *If you share line with modem/telephone please proceed according to section 10.6*

Program calling number(s) ☞ Details according to section 6.1

6. Slide *function switch* to PROG
7. Enter `*` `*` `<n>` (selected calling number: Standard **n** = 1..9)
   ➥ *Corresponding calling number will be announced, followed by message "to modify press star"*
8. Press `*` and enter calling number
9. Slide *function switch* to OFF

Select user language / record individual message ☞ Details according to section 6.3

10. Slide *function switch* to PROG
11. Enter `*` `*` `#`
    ➥ *Current individual message will be announced followed by "to modify press * , to stop press # "*
12. Select language for user announcements: (facultative)
    Press key `1` to `4` to select user languages: 1 for German, 2 for French, 3 for English GB, 4 for Italian
13. Press `*` and start speaking
14. Press `#` to finish recording, max. duration is 12 seconds
    ➥ *New individual message will be announced. You can repeat steps 12 to 14 until text is fine!*
15. Slide *function switch* to OFF

Program PIN-code ☞ Details according to section 6.4

16. Slide *function switch* to PROG
17. Press key `#` *=> You can prevent the alarm unit from unintended re-programming by pressing* `*`.
18. Enter PIN-code (4 to 7 digits)
19. Press key `#`
20. Re-enter PIN-code for confirmation
21. Press key `#` *= >New PIN-code will be announced*
22. Slide *function switch* to OFF

Alarm unit is now ready for operation ☞ Details according to section 7

23. Slide selection switch to the requested position (I/II/III)

4.3   Operation with Plug&Protect-motion detector (EasyAlarm® SENIOR COMBI)

WALK-Test: Wait at least two minutes after power-up for the motion detector to be stabilised. After this time, check the entire area by observing the LED. Adjust swivel if necessary.

4.3.1 Activation of the motion detector

EasyAlarm® detects the connected motion detector automatically at power-on (factory setting).

Warning:
▪ **By disconnecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call due to sensor failure"!**
▪ **By connecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call activated, sensor 1 activated"!**

4.3.2 Deactivation of the motion detector

If the motion detector is not connected during power-on, it is automatically deactivated.

5. WIRELESS EMERGENCY BUTTON

5.1 Introduction

✓ The WT-211 is a miniature waterproof wrist-worn transmitter, designed to send coded transmissions to the **EasyAlarm®**.

✓ Pressing the pushbutton at the centre of the unit activates transmission.

✓ All WT-211 units are supplied with a wristband, to be worn like a regular watch.

✓ Operating power is obtained from a coin-type, 3-volt lithium battery that can last up to 10 years.

✓ A LED lights during transmission, indicating that battery voltage exceeds 2.7V.

✓ If the LED lights dimly or does not light at all during transmission, the battery must be replaced immediately.

5.2 Technical Specifications

Frequency: 433,92 MHz
Coding: 8-bit DIP-switch (256 combinations)
Transmission time: approx. 2 seconds
Power supply: 3 V-Lithium-Battery (life time: 3-5 years by 3 usages per day)

Warning:

▪ **The transmission power is directly related to the power of the battery.**

Temperature range: 0°C to 50°C
Dimensions: 35 mm Ø
Weight: 25 g

Figure 2. Opening the Case

Note: The transmitter is conforming to the local regulations. Note the following points:

A)   Receivers may be blocked by radio signals occurring on or near their operating frequencies, regardless of the code selected

B)   A receiver can only respond to one transmitted signal at a time

C)   Wireless equipment should be tested regularly (at least once a week) to determine if there are sources of interference and to protect against faults

5.3 Preparation for use

5.3.1 Installation of the battery

a) Open the WT-211 transmitter with a small Phillips screwdriver by removing the 4 screws. Afterwards open the cover gently.

b) Remove the PCB carefully from the base of the housing.

c) Place the 3V-Lithium battery in such a way, that it is secured by the contact spring Observe the polarity, „+" side has to be on top.

d) Check the power of the battery by pressing the button in the centre of the PCB. The LED must be lit to show a well-powered battery.

e) Place the PCB back into the housing. Observe the position pin to bring the PCB into the correct position.

Figure 3. Transmitter Module - Top Side

5.3.2 Coding

The WT-211 is equipped with an 8-pole DIP-switch (Code switch from 1- 8) This switch is used to select the code of the system. (see picture 4). Use a small screwdriver to select your code. ATTENTION: Do not use the pre set code, as this one is only used to test the system. Do not use settings of placing all the switches on position ON or OFF.

Figure 4. System Code Selector

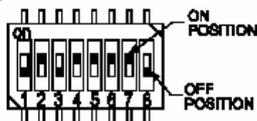*Figure 6. Battery Insertion*

5.3.3 Assembling of the housing

Place the PCB into the main part, battery facing towards you. Observe the correct position given by the positioning pin. Put the seal ring into the correct position and place the cover firmly. Tighten the 4 Phillips screws gently.

5.4 Learn-in the wireless emergency button

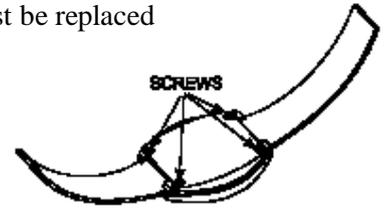The learn-in procedure is described in section 6.5.

6. PROGRAMMING

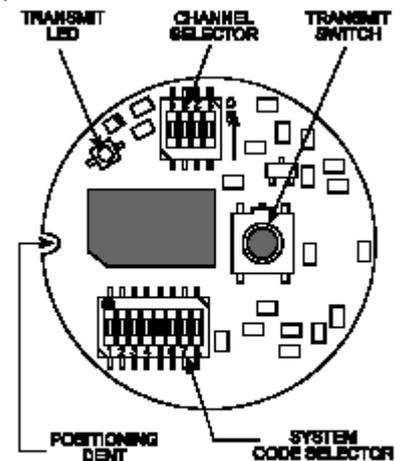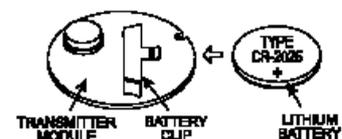**Important note:**
- **All the programmed parameters remain stored even without battery.**
- **You can prevent your system from unintended re-programming according to section 6.4.1. If you use this protection feature message „programming deactivated, PIN" will be announced when the *function switch* is on position PROG.**
- **Three beep: Mains power loss AND battery low at the same time!**

6.1 How to program new calling numbers

EasyAlarm® supports nine calling numbers that can be programmed as follows:

1. Slide *function switch* to PROG
2. Enter `*` `*` `<n>`   (selected calling number: Standard **n** = 1..9)
   ➥ *Select number will be announced followed by "to modify press star"*
3. If you like to change this calling number, press `*`, otherwise proceed with step 5
4. Enter new calling number. To delete an existing number enter `*` and proceed with step 5
5. Slide function switch to OFF

Notes:
- Every keystroke will be acknowledged by a beep
- Key `#` programmes a dialling delay of 5 seconds, provided it is entered between two digits, e.g. a delay is essential in a private exchange (first digit + `#` + calling number).
- If your private exchange needs a flash pulse to start an internal call, following programming is possible: `2` `#` followed by the extension number.
- Key `*` is used as separator for Point-ID protocol ☞ section 6.1.1.
- If a programming error occurs, put *function switch* to OFF and repeat point 1 to 5.

Important notes:
- **Calling number 1 cannot be deleted due to safety reasons.**

6.1.1 Point-ID (Contact-ID) alarm protocol

If the alarm should be transferred to a alarm organisation using the Point-ID (Contact-ID) protocol, the alarm number has to be followed by key `*` and the customer-ID. EasyAlarm forwards the protocol to this alarm number and connects hereafter to the following calling number in standard *hands-free connection* mode

Alarm number
074567890

Customer-ID
34567

Example for programming the calling number: `0` `7` `4` `5` `6` `7` `8` `9` `0` `*` `3` `4` `5` `6`.

Note:
- The first character `*`, that follows the alarm number will not be transmitted (=> separator). The customer ID is a four digit code. In case of an alarm the following codes are transmitted according to the **<Alarm reason>** and the **<Zone>**.

Code	<Alarm reason>	<Zone>
602	Alarm due to cyclic test	900
602	Alarm due to remote programming "**#"	900
301	Alarm due to power failure	900
384	Alarm due to low battery of a radio sensor	Radio zone 000..009
102	Alarm due to missing activity (presence verification)	Radio zone 000..009
601	Alarm due to key-press (test-call)	900
132	Alarm due to noise monitoring	900
140	Alarm due to hardware sensor 1	901
140	Alarm due to hardware sensor 2	902
140	Alarm due to hardware sensor 3	903
140	Alarm due to radio sensor	Radio zone 000..009
120	Alarm due to panic button	Radio zone 000..009
120	Alarm due to emergency button	Radio zone 000..009
111	Alarm due to fire sensor	Radio zone 000..009

6.2 Designation of the calling number sequence

6.2.1 Standard sequence

Alarm triggered ⟶ **Calling number 1**

Alarm not acknowledged by called party 1

Calling number 2

if called party 3 does not acknowledge the alarm, the calling number sequence is repeated the number of programmed alarm repetitions times (**default value: two alarm repetitions**, programming see section 10.2)

alarm not acknowledged by called party 2

same for calling number 3 to 9

The alarm is acknowledged by pressing `DTMF 0` (☞ section 7.6.5).
The alarm is passed to next party immediately by pressing `DTMF 8` or after *connection time-out*.

6.2.2 How to program calling number sequence

1. Slide *function switch* to PROG
2. Enter `*` `*` `0`
   ➥ *Current calling number sequence will be announced followed by "to modify press* `*`*, to stop press* `#` *"*
3. To maintain the current programming, go to point 5. Otherwise enter `*`
4. Enter the desired sequence (max. 9 digits)
5. Slide *function switch* to OFF

Sample for programming calling number sequence:
a) '123' => calling number 1 will be dialled, followed by calling number 2, followed by calling number 3.
b) '111133322' => first calling number1 will be dialled (4 call attempts are made), followed by calling number 3 (3 call attempts are made), followed by calling number 2 (with 2 call attempts).

Notes:
- The calling number sequence is factory set to '123456789', but a general **reset according to section 10.1 will NOT RESET the calling number sequence!**
- In case of an un-programmed or deleted calling number, the calling number sequence will continue with the next number of the sequence.
- If dialled party is busy and another call attempt is programmed, the *waiting period* before re-dialling is 30s.
- If the calling number changes within the sequence, dialling of a new number starts without delay

6.3 How to select user language / How to record individual message

An individual announcement can be recorded as follows:

1. Shift *function switch* to PROG
2. Enter `*` `*` `#`
   ➥ *Current individual message will be announced followed by "to modify press* `*`*, to stop press* `#` *"*
3. Select language for user announcements: (facultative):
   Press key `1` to `4` to select user languages: 1 for German, 2 for French, 3 for English GB, 4 for Italian
4. Press `*` and start speaking
5. Press `#` to finish recording, max. duration is 12 seconds
   ➥ *New individual message will be announced*
6. Shift *function switch* to OFF

Note:
- Repeat step 3 and 5 until you are satisfied with individual message.

6.3.1 Remote recording of individual message during handsfree connection

1. Enter `DTMF * * # #`
   ➥ *Current individual message will be announced followed by "to modify press* `*`*, to stop press* `#` *"*
2. Select language for user announcements: (facultative)
   Press `DTMF 1` to `DTMF 4` according to desired user language (i.e. 1=DE/2=FR/3=GB/4=IT)
3. Start recording by sending `DTMF *`, start talking (max. 12 s) and finish by sending `DTMF #`.
   ➥ *New individual message will be announced*
4. Wait until the message "Abort" confirms the end of the programming

Note:
- Remote recording can be enabled / disabled according to section 10.8.1.

6.4 How to program PIN-Code

You can change remote access PIN-code as follows:

1. Slide *function switch* to PROG
2. Press `#`
   - ➡ ***You can prevent the alarm unit from unintended programming by pressing*** `*`***.***
3. Enter desired PIN-code (4 to 7 digits!) and press `#`
4. Re-enter PIN-code for confirmation and press `#`
   - ➡ ***If PIN-code is re-entered correctly it will be announced. If you selected program locking the additional message „programming inactive: PIN" will be announced. In case of an incorrect programming the message announced „Error" will not be stored => old PIN-code remains active.***
5. Slide function switch to OFF

6.4.1 Lock program mode

If you initiated programming new PIN-Code with key `*` the program mode is locked unless you unlock by re-entering PIN-code. This feature prevents from unintentional reprogramming during operation.

6.4.2 Unlock program mode

Having the programming blocked as described in section 6.4.1, you can unlock as follows:

1. Slide *function switch* to PROG
   - ➡ ***Message „Programming inactive: PIN" will be announced***
2. Enter PIN-code and press `#`
   - ➡ ***By entering correct PIN-code you will hear a confirmation beep, otherwise message „Error"***
3. Slide function switch to OFF

6.5 How to learn-in wireless emergency button / Range check

If you want to learn-in a new emergency button you can proceed as follows:

1. Slide *function switch* to PROG
2. Enter `*` `*` `*`
3. Press key `0` to `9` according to desired zone (->x)
4. Press key `0` to `9` according to transmitter type
   - ➡ ***Message announce „Zone x, to modify press*** `*`***"***
5. Press `*` and start learn-in process according to the specified radio component.
   - ➡ ***A successful learn-in will be confirmed with a beep tone. By activating the transmitter again, a loud beep tone will be generated as long you are within transmitting range. You can control this way by reception range and to select the best suitable location of the unit.***
6. Slide *function switch* to OFF

\<n\>	Transmitter type/function
1	Smoke detector (=> Alarm with *handsfree-connection)*
7	Panic (=> un-delayed alarm with *handsfree-connection* => for *listening-in connection* see section 6.5.2) ▪ Alarm can NOT be cancelled by pressing the emergency-button once again. ▪ it is NOT possible to answer an incoming call by pressing the emergency-button!
8	Emergency call (=> Alarm with *handsfree-connection*) ▪ Alarm can be cancelled by pressing the emergency-button once again during pre-warning period ▪ it is possible to answer an incoming call by pressing the emergency-button!
*	Wireless sensor for verifying presence of a supervised person (PIR or door contact)
#0	Deactivate zone

Note:
- You can optimise location of alarm unit regarding the following points:
  a) Place unit as far away from possible emitters
  b) Do not place unit near a shielding cover

6.5.1 Check reception

You can check or optimise location of alarm unit as follows:

1. Slide *function switch* to PROG
2. Enter `*` `*` `*` `*` and press wireless button/sensor
   - ➡ ***Each time if you activate a learned-in sensor, the alarm unit announces its zone number. An unknown sensor provokes a beep. Any other signal or noise will be passed directly to the loudspeaker.***
3. Slide *function switch* to OFF

6.5.2 Reaction on panic button

OFF ⬜ ON PROG →	`*` `9` `7` `1` `3` `1` `7` `#` `#`	Value	`*`	Value	`#`	OFF ⬜ ON PROG ←

Value	Explanation
0	Silent alarm => *listening-in connection*
32	Un-delayed senior alarm => *hands-free connection (=factory setting).*

6.6 Alarm criteria's according to the position of the selection switch I/II/III

EasyAlarm® monitors the emergency buttons on all three positions of the selection switch as well as the optional attached motion detector checks for presence. But the acoustical monitoring of the room is deactivated. (factory setting). This setting can be changed as follows:

A) Add up all the individual values according to your needs => Total= **n**.

Value	Explanation	
1	Acoustical monitoring is locked on position III (high sensitivity)	
2	Acoustical monitoring is locked on position II (medium sensitivity)	
4	Acoustical monitoring is locked on position I (low sensitivity)	
8	Presence verification is locked on pos. III	*) If presence verification is locked, the motion sensor can be activated as sensor-1-contact. In case of an activity (motion) an alarm will be triggered (monitoring of the room or house during your absence) => the total **n** must be supplemented with the symbol '*' ☞ see example below
16	Presence verification is locked on pos. II	
32	Presence verification is locked on pos. I	

Example: Monitored activities

Selection switch on I: Emergency button + presence control
Selection switch on II: Emergency button + presence control + acoustical monitoring
Selection switch on III: Emergency button + presence control + acoustical monitoring

=> Acoustical monitoring locked on position I
=> Presence verification locked on position III => instead of presence verification an alarm shall be triggered if motion is detected => **n** = 4 + 8 + * = 12*

B) In case you would like to have an entry-delay for the sensor -1-contact, add following values:

Value v	Explanation
0	Alarm due to sensor-1 without any delay *(=factory setting)*
64	Alarm due to sensor-1 is delayed

Example: Alarm due to sensor-1 shall be delayed => **v** = 64

C) Program the total value (**s** = **v** + **n** = 64 + 12* = 76*) as follows:

1. Slide *function switch* to PROG
2. Enter `*`
3. Enter `2` `6` `8` `4` `<s>` (Example: `2` `6` `8` `4` `7` `6` `*`)
4. Enter `#`
5. Enter `2` `6` `8` `4` `<s>` to confirm (Example: `2` `6` `8` `4` `7` `6` `*`)
6. Enter `#`

   ➡ *Correct => acknowledge beep* ➡ *Incorrect=> announcement „error" => old value remains active.*

7. Slide *function switch* to OFF

Notes:
- In case of incorrect programming, Slide *function switch* to OFF and repeat step 1 to 7.
- Factory setting: **s** = 7, no acoustical monitoring; presence verification is activated.

6.7 How to program presence verification time-out

Time-out for presence verification is factory set to 24h. If there is no activation within this period, an alarm is triggered after a pre warning period of 10 minutes (this period is indicated with a periodical loud beep tone).

OFF ⬜ ON PROG →	`*` `9` `7` `1` `3` `6` `7` `#` `#`	Value	`*`	Value	`#`	OFF ⬜ ON PROG ←
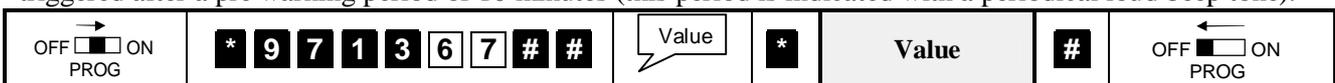
Value	Explanation
0	Presence verification is switched off
6..255	Time-out in steps of 10 min. (min. 60min, max. 42.5h). *Factory setting*=144 (144*10min = 24 h)

7. OPERATION

7.1 Self check at power on

After power on the alarm unit checks battery, mains power and telephone-line conditions. If one of these tests fails an appropriate message will be announced (battery error/power failure/line-check error).

Three beep: Mains power loss AND battery low at the same time!

Quickly handle the announce problem, otherwise the alarm functions are not guarantied.

7.1.1 Detection of wired sensor

EasyAlarm® detects the connected motion sensor automatically during the switching on procedure (factory setting). This sensor is activated for presence verification

Attention:
- **By disconnecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call due to sensor failure"!**
- **By connecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call activated, sensor 1 activated"!**

7.2 Inactive waiting period

7.2.1 After power on or changing position of selection switch (exit delay)

EasyAlarm® remains inactive for 20 seconds (LED is on continuously), to leave time to quit your room/house without triggering an alarm. An emergency call by pressing the emergency button is still possible.

Note:
- The entry/exit period can be adjusted according to section 10.3.
- If there are unacknowledged alarms, their quantity and the reason of the last alarm will be announced.
- If presence verification is activated, following announcement is made: "sensor supervision activated".

Key	Action
5	*Announcement of the monitored functions* (*inactive waiting period* will be restarted)
7	Bypass *waiting period* and change to inactive supervision mode ➡ Attention: by switching from activated to inactivated supervision mode, an announcement of the supervision modes is made and the waiting period starts again.
9	Bypass *waiting period* and change to active supervision mode ➡ Attention: by switching from inactivated to activated supervision mode, an announcement of the supervision mode is made and the waiting period starts again.
others	*Test-call* will be made to the first calling number

7.2.1.1 Announcement of the supervision functions

The supervision functions can be activated or deactivated individually on each position of the selection switch

EasyAlarm® deactivated	=>	**announcement:**	**"Supervision I/II/III deactivated"**
EasyAlarm® activated	=>	**announcement:**	**"Supervision I/II/III"**

followed by the supervision mode of the ***activated*** type of monitoring:

acoustical monitoring	=>	**announcement:**	**"due to noise"**
sensor-1-monitoring	=>	**announcement:**	**"due to sensor 1 activated"**

7.2.2 ..after an successful alarm

EasyAlarm® remains inactive for two minutes (LED is on continuously) to avoid too many alarms due to sensor contacts. An emergency call is still possible during this period. **Any key-press** results in a test call to the first calling number.
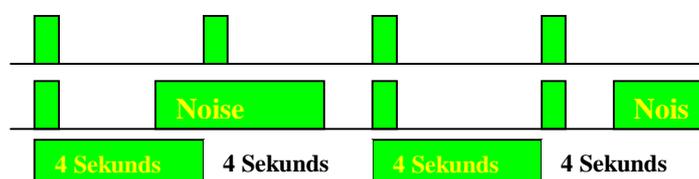
7.3 Supervision mode

7.3.1 active supervision mode

In *active supervision mode*, the LED is flashing every 4 seconds. The LED is also lit, if the acoustical monitoring is activated and the selected noise level is reached.

LED: acoustical monitoring inactive

LED: acoustical monitoring activated

LED: inactive mode

7.4 Alarm release

7.4.1 ..independent from state of arming (armed / disarmed)

Factory set alarm cause [1]	Active by			Entry delay	Alarm connection	Announce the alarm cause
	I	II	III			
Panic	✔	✔	✔	Instantaneously	Listening-in	"Emergency call activated"
Emergency [2]	✔	✔	✔	Delayed	*Hands-free*	"Emergency call activated"
Smoke	✔	✔	✔	Delayed	*Hands free*	"Alarm due to fire zone **n**"
Sensor 3 [3]	✔	✔	✔	Instantaneously	*Listening-in*	"Alarm due to zone **n**"

1. Factory setting cause of alarm (user specific changes not mentioned)
2. An emergency call will be triggered, if the button has been activated for one second. After a pre alarm period of 20 seconds the text "emergency call activated" is announced. A pre warning announcement is used to avoid false alarms (i.e. technical error like power failure, unwanted emergency calls). During the pre warning period the alarm can be cancelled by pressing the emergency button respectively by pressing key `0`
3. Sensor 3 can be enabled as alarm sensor (NO or NC).

7.4.2 ..if system is armed only

Factory set alarm cause [1]	Active by			Entry delay	Alarm connection	Announce the alarm cause
	I	II	III			
Sensor 1 [4]	✘	✘	✘	Instantaneously	*Listening-in*	"Alarm due to sensor 1"
Presence verification [5]	✔	✔	✔	10 minutes/30 seconds	*Hands-free*	„Alarm due to presence verification"
Sensor 2 [6]	✘	✘	✘	Instantaneously	*Listening-in*	"Alarm due to sensor 2"
Noise [7]	✘	✘	✘	Instantaneously	*Listening-in*	"Alarm due to noise"
Power failure [8]	✔	✔	✔	Delay 1 min	*Hands-free*	"Alarm due to power failure"

4. Sensor 1 can also be used as a presence verification sensor (☞ section 6.6)
5. If there is not motion detected within a period of 24 hours EasyAlarm® triggers an alarm, provided programming is set to presence verification (☞ section 6.7). Before starting the alarm there is a pre warning period of ten minutes. If activation is detected (motion detected or emergency button pressed) within this period, the alarm is triggered .
6. Sensor 2 can be enabled as alarm sensor (NO or NC).
7. Noise monitoring according to section 6.6: To avoid false alarm close windows and eliminate other noise sources.
8. **EasyAlarm®** monitors mains voltage and triggers an alarm if power loss is longer than 10 to 20 minutes. The mains power monitoring does not start if after power up the mains power is not detected. In this case the message „power failure" will be announced. After any mains power detection **EasyAlarm®** automatically start power monitoring.

7.5 Alarm delay / Pre warning period / Entry delay

An alarm can be delayed due to following reasons:

✓ An alarm sensor in the area of the entrance must be delayed to have enough time to switch off the supervision mode before **EasyAlarm®** dials the first calling number.

✓ A pre warning announcement is used to avoid false alarms (i.e. technical error like power failure, unwanted emergency calls). During the pre warning period the alarm can be cancelled by pressing the emergency button respectively by pressing key `0`.

➥ *Announcement: „Alarm acknowledged"*

Notes:
▪ The entry/exit period can be adjusted according to section 10.3.
▪ If an alarm has been triggered by pressing the emergency button, cancellation of the alarm is only possible, if the button has been released for min. 3 seconds before pressing it again.

7.5.1 Siren activation during pre warning period

If you use a siren (☞ section 11.2) which is activated as described in section 10.5.2, the pre alarm period is signalled by a periodical siren tone.

7.6 Phone connection

The colour of the indicator LED changes to orange during telephone connection.

7.6.1 Time-out

There is a timer running in the *phone connection* mode. *Phone connection* is kept up for two minutes in case of *alarm call*, and ten minutes in case of *test call*. Ten seconds before disconnection, the called person hears the announcement "abort". He/she can restart timer using ⟨DTMF 3⟩ at any time.

7.6.2 Announcements

At the beginning of each *phone connection* the following information will be announced: *Individual message* followed by the cause of alarm and the instruction to acknowledge alarm by pressing ⟨DMTF 0⟩. In a *Listening-in* connection you get announcement: „to speak press 1". This announcement is repeated every 8 seconds, until a *tone-dialling command* is entered.

Notes:
- At the beginning of any *phone connection* battery state will be checked and announced if low
- The numbers of unacknowledged alarms is announced.

7.6.3 Listening-in connection

Possible *tone-dialling commands* during the *listening-in connection*

DTMF	=> Every valid command will be signalled
0	Terminate *phone connection* and acknowledge alarm
1	Switching to hands-free mode and restart *connection time-out*
2	Repeat announcements (*Individual message* / Cause of alarm)
3	Restart *connection time-out* (2 minutes)
4	Deactivate output (i.e. switching **off** alarm siren)
5	Announcement of current supervision mode as well as condition of the output
6	Activate output (i.e. switching **on** the alarm siren)
7	Change to *inactive supervision mode* (I, II, III) => monitoring for noise, sensor-1, mains failure and presence verification inactive. Emergency call still possible.
8	Terminate *phone connection* without acknowledgment
9	Change to *active supervision mode* (I, II, III) => All monitoring functions re-activated
* * 0	Announcement of calling number sequence
* * *n*	Announcement of calling number *n* (n: 1..9)
Following *tone-dialling command* can be used for remote programming, provided the programming is not blocked (☞ section 10.8)	
* * #	Trigger an alarm for test reasons ➡ Cause of alarm announcement "alarm due to programming"
* * *n* * followed by the new calling number	announcement and change of calling number *n*
* * # #	Record individual message => according to section 6.3.1.

7.6.3.1 Use of siren during listening in connection

The activation of a siren (☞ section11.2) can be done either manually during a *listening-in connection* using ⟨DTMF 6 or 4⟩ or automatically in accordance to the reason of the alarm (☞ programming section 10.5.2).

7.6.4 Hands-free connection

The commands during *hands-free connection* are identical to the commands during *listening in connection*, except ⟨DTMF 1⟩.

Important note:
- *Hands-free connection* **must be terminated using** ⟨DTMF 0 or 8⟩. **Otherwise a busy tone signal appears until *phone connection* is terminated due to time-out.**
- **By selecting *hands-free connection* an activated siren (optionally) is automatically deactivated. If requested, the siren can be activated or deactivated by** ⟨DTMF 6 or 4⟩.

7.6.4.1 Adjustment of hands-free volume

During *hands-free connection* you can increase volume by pressing local key ⟨#⟩ or decrease by pressing locale key ⟨*⟩. Level can be adjusted in fifteen steps (1dB each) and remains stored.

7.6.5 Acknowledge alarm / Terminate connection

A called party can choose between acknowledgment by pressing ⟨DTMF 0⟩ or passing on alarm to next party in calling number sequence by pressing ⟨DTMF 8⟩.

Important notes:
- **There is no alarm repetition, if an alarm is triggered by pressing any key of the alarm unit (test call).**
- **An alarm can be confirmed and terminated by pressing key ⟨0⟩ of the alarm unit or by pressing the wireless emergency button for a second time.**
- **If the alarm is programmed to a pager, the called person can confirm alarm during remote-access after dialling-in.**

7.7 Alarm repetition

If an alarm has not been acknowledged by passing all the calling numbers in the sequence, a number of alarm repetitions can be programmed (☞ programming 10.2). Factory setting: two alarm repetitions.

7.8 Test call

If alarm unit is switched to ON it is possible to start a test call as follows:

1. Select calling number by pressing key **\<n>** (*n*=**1** .. **9**)
   ➡ *Announcement: „Calling number **\<n>**" => If selected calling number is not programmed the message "Error" will be announced and the first calling number will be dialled instead*
2. Wait until *hands-free connection* is established and speak
3. Terminate *phone connection* by pressing **0** or slide *function switch* to OFF

Notes:
- After two minutes *phone connection* will automatically terminate if called party does not give any *tone-dialling commands* (i.e. called subscriber can disconnect using DTMF 0 or restart timer using DTMF 3).
- During *inactive waiting period* after power on key **9** and **7** activate or deactivate the monitoring of the supervision. Key **5** starts the announcement of the current supervision mode (☞ section 7.3)
- The volume of *hands-free connection* can be adjusted as described in section 7.6.4.1

7.9 Dialling-in (check call)

If the alarm unit is switched to ON you can dial in from any telephone set as follows:

1. Dial phone number of the **EasyAlarm®**
2. Let it ring for two ringing cycles and disconnect (hang up)
3. Redial after 20 seconds => **EasyAlarm®** answers call after two ringing cycles and waits for the PIN-Code

After entering the correct PIN-Code **EasyAlarm®** establishes a *listening-in connection*
   ➡ *Announcement „to stop press 0,to speak press 1"*
If no *tone-dialling command* is entered, the *phone connection* will be terminated after two minutes *connection time-out*. The supervised person can also terminate the phone connection by pressing the emergency button.

Important: In case that there are unconfirmed alarms, the quantity as well as the last reason of the alarm will be announced! An unacknowledged alarm will be confirmed by entering DTMF 0 !

Notes:
- The two-step dialling in procedure is for security reasons to avoid detecting of the alarm unit coincidently by an unknown caller. Direct dialling in as well as other number of ringing cycles can be selected (☞ section 10.7)
- If the PIN-code is incorrect or not entered within 15 seconds, **EasyAlarm®** disconnects after the announcement „PIN error, abort" => try again and enter correct PIN.
- PIN-code is factory set to 9797. For safety reasons we recommend changing PIN-code and program your individual code according to the manual.
- If a successful dialling-in should be signalled with five gong-signals (to alert/inform the supervised person), **EasyAlarm®** can be programmed according section 10.7.3.

7.10 Answering an incoming call

An incoming call, signalled by a parallel connected phone, can be answered as follows (*Function switch* ON):

7.10.1 ..by pressing the emergency button

a *hands-free connection* is established => Disconnect by pressing the emergency button once again.

7.10.2 ..by pressing any key of the alarm unit

a *hands-free connection* is established => Disconnect by pressing key **0** (☞ section 10.7.4).

8. USEFUL NOTES

8.1 Tone-dialling command

If you want to use **EasyAlarm®** to its full potential a tone-dialling telephone is necessary. Nowadays most of the telephones in use are working on tone dialling, also called DTMF or in-band signalling. Older telephones are using pulse dialling. In case there is no tone-dialling telephone available, the features shown in section 7.6.3 cannot be used

Note:

▪ An acoustic coupler can be purchased in electronic shops.

8.2 User information

8.2.1 Signals (beeps)

A single beep tone is used as a confirmation

Three beep: Mains power loss AND battery low at the same time!

8.2.2 Announcement audible in loudspeaker of EasyAlarm®

Announcement	Message / Cause
„Individual message"	First message in case of an alarm
Abort	Disconnection caused from the change of the position of the *selection switch*
Alarm acknowledged	Disconnection
Alarm due to fire	Alarm triggered by smoke sensor
Alarm due to presence verification	24h without detection of movement
Alarm due to sensor supervision	Triggered emergency call due to loss of presence
Battery error	Battery is low => battery test after power on
Calling number error	First calling number in the calling number sequence is not programmed
Calling number *n*	Calling number *n (=1..9)*
Calling number sequence	Calling number sequence
Emergency call activated	Emergency call, initiated by emergency button
Emergency call deactivated, alarm acknowledged	Emergency call confirmed
Error	Incorrect programming => the old value remains stored
Line check error	Telephone line check after power on was negative => dial tone missing
Output activated	The output is activated after power on.
PIN	Request to enter PIN-Codes by locked programme
Power failure	Mains power missing => Mains power is tested after switching on the unit
Programming deactivated: PIN	Request to enter PIN-Code to unlock programming
Sensor supervision activated	Motion sensor is set to presence verification
Supervision (I/II/III) <due to noise/sensor *n*> activated	Announcement of the monitored alarm functions at current position of the *selection switch* (I/II/III) triggered by pressing key ⑤ during the *inactive waiting period*(☞ section 7.2.1.1)
Supervision (I/II/III) activated	Announcement in active supervision mode at current position of the *selection switch* (I/II/III)
Supervision (I/II/III) deactivated	Announcement in active supervision mode at current position of the *selection switch* (I/II/III)
to modify press * , to stop press #	Recording of *individual message*
Unacknowledged alarms: *n*	Quantity of unacknowledged alarms

8.2.3 Announcements audible in the handset of called subscriber

as well as during *hands-free connection* in loudspeaker of **EasyAlarm®**

Announcement	Message / Cause
„Individual message"	First message in case of an alarm or reaction on DTMF 2 .
Abort	*Phone connection* will be terminated
Alarm due to fire	Alarm triggered by smoke sensor
Alarm due to noise	Alarm triggered by noise activity (Note: according to *selection switch* position I,II,III the alarm can be delayed)
Alarm due to presence verification	24h without detection of movement
Alarm due to programming	A test call was initiated due to remote programming (☞ section 0)
Alarm due to sensor *n*	Reason of alarm: alarm contact *n*.

▪ sensor *n* activated ▪ sensor failure	▪ sensor *n* is in alarm mode ▪ disconnection of sensor during operation
Alarm due to sensor supervision	Triggered emergency call due to loss of presence
Battery error	Battery is low => battery test before *phone connection* is established
Emergency call activated	Emergency call, initiated by emergency button
Output <activated / deactivated>	*c*onfirmation of < DTMF 6 / DTMF 4 >
PIN	Request to enter PIN-Code after dialling in (remote access)
PIN error, abort	Wrong PIN-code => *Phone connection* terminated
Power failure	Mains power loss => Mains power is tested every time before *phone connection* is established
Programming acknowledged	Successful remote programming of a calling number or calling number sequence
Programming, abort	Faulty remote programming of a calling number or calling number sequence
Sensor *n* activated	Announcement if sensor *n* is still in alarm mode
Supervision (I/II/III) < due to noise / sensor *n*> activated	Confirmation of DTMF 5 : announcement of the activated supervision functions, indicating the supervision modes in accordance to the position of the *selection switch* (I/II/III)
Supervision (I/II/III) activated	Confirmation of DTMF 9 : Switch to *active supervision mode* an announce monitoring functions at current position of the *selection switch* (I/II/III)
Supervision (I/II/III) deactivated	Confirmation of DTMF 7 : Switch to *inactive supervision mode* an announce monitoring functions at current position of the *selection switch* (I/II/III)
Unacknowledged alarms: *n*	Quantity of unacknowledged alarms

8.3   Functional checks

8.3.1 Test-call

We strongly advise to make a *test-call* to check functionality of **EasyAlarm®** before starting operation.

8.3.2 Test alarm functions

Even though the alarm unit is maintenance free (except the battery) a periodical function test should be carried out, especially:

▪ Emergency button
▪ Wired sensors
▪ Acoustical monitoring

8.4   Battery check / replacement

If the announcement „Battery error" is initiated after switching on **EasyAlarm®**, the battery should be replaced immediately as follows:

1. Slide *function switch* to OFF
2. Disconnect **EasyAlarm®** from the **telephone network, by removing the telephone cord**
3. Open battery compartment and remove old battery
4. Insert new battery and close battery compartment
5. Reconnect telephone cord to **EasyAlarm®**

Notes:
▪ Always use fresh 9V-batteries
▪ Dispose the old battery properly

8.5   Maintenance

Slide *function switch* to OFF and remove telephone cord. Clean **EasyAlarm®** if necessary using a moistened cloth and dry it afterwards.

Note:
▪ Do not use cleaning agents or solvent

9. TROUBLE SHOOTING / ERROR HANDLING

Most problems can be checked and solved with help of the following chart. If the problem remains after consulting this chart in details, please get in touch with your local dealer or contact the info line of your country, see section 12.2

9.1 Telephone connection / Telephone communication

Symptoms	Cause and /or remedy
LED is not lit after switching ON	Replace battery
Announcement „programming deactivated: PIN" by an attempt of reprogramming	Programming function is locked => to be unlocked according to section 6.4.1
Announcement „Beep Beep Beep"	Mains loss and low battery at the same time!
Announcement „battery error"	Battery is low => replace battery
Announcement „power failure"	Power failure, transformer not connected
Announcement „line check error " No dial tones are audible during *test call* => no tones are audible during the dialling procedure	No dial tone has been detected: ▪ Unit is not connected with the telephone network ▪ Telephone network failure ▪ Another telephone working on the same phone line is occupying the line already ⇨ Plug in telephone cord ⇨ Check the telephone cord ⇨ Start *test-call* with different telephone
Test call does not call first calling number in the calling number sequence: Announcement „calling number error"	▪ Calling number (**n=2..9**) is not programmed => Calling number 1 was dialled instead
Test call does not establish *phone connection:* Announcement „calling number **n**" => dial tone audible	▪ Calling number is wrong ▪ Called party is not answering the phone
Remote access using dialling-in not possible => **EasyAlarm®** is not responding to the call	▪ The dialling function is programmed for the two step modus (☞ section 10.7.2)
Remote access using dialling-in not possible => disconnection after entering of PIN-code	Wrong PIN-code entered => call again
EasyAlarm® does not react on *tone-dialling commands*	Current telephone does not support *tone-dialling commands* or has not been configured => for example pulse dialling

9.2 Wireless emergency button

Symptom	Cause and /or remedy
Activation of the emergency button does not: ▪ trigger alarm ▪ terminate *phone connection*	▪ Emergency button is not correctly configured or outside of range (☞ section 6.5) ▪ External interference in the 433.92MHz-Band prevents a reception ▪ Battery of the emergency button is low => test battery or change it according to separate instruction manual ▪ Check location of transmitter/receiver according to section 6.5.1

9.3 Acoustical monitoring

Symptom	Cause and /or remedy
noise is not triggering an alarm	▪ Factory setting supports monitoring of acoustics only on pos. III of selection switch. (☞ programming can be altered, see section 6.6) ▪ The unit has been deactivated by DTMF 7 => LED alternatively 4s on / 4s off ▪ By switching on the unit or after triggering an alarm, the acoustical monitoring is not active during the *waiting time* of 20 seconds (☞ section 7.2) => LED is lit constantly during the *waiting time*! ▪ Depending on the position of the selection switch, an alarm is triggered with a different delay. Every time the noise exceeds the pre set level, the LED is on. (☞ section 7.3.1)

9.4   Motion detector activated for presence verification

Symptom	Cause and / or remedy
LED is on during WALK TEST, but no alarm is triggered	▪ In case of **presence verification** an alarm is only triggered, if **no motion** has been detected over the programmed period (☞ time-out can be selected according to section 6.7)
WALK TEST has been set, but LED is not on	▪ Power supply of the motion detector is missing (=> check cable, connector and power supply) ▪ Power supply not on since two minutes (stabilize time of PIR-motion detector)
Alarming with announcement „emergency call activated, sensor 1 activated "	▪ Motion detector has been connected after the unit has been switch on!
Alarming with announcement „emergency call activated, sensor failure "	▪ Motion detector has been disconnected after the unit has been switch on!

9.5   Motion detector used as an alarm-sensor (sensor-1)

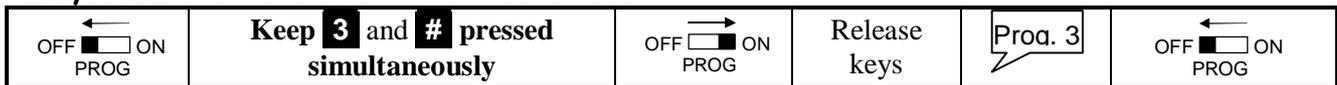| Symptom	Cause and / or remedy
LED is on during WALK TEST, but no alarm is triggered	▪ *Inactive waiting period* by switching on the unit or between two alarms is not expired ▪ Supervision has been temporarily deactivated (deactivation) ▪ Supervision is deactivated at current position of the *selection switch* (I/II/III) (☞ section 6.6) ▪ Motion detection is programmed to **verify presence** (☞ section 6.7), an alarm is only triggered if **no motion** is detected over a programmed time.
WALK TEST has been set, but LED is not on	▪ Power supply of the motion detector is missing (=> check cable, connector and power supply) ▪ Power supply not on since two minutes (stabilize time of PIR-motion detector)
There is no motion and the WALK TEST LED is not on, but alarming with periodical announcement „alarm sensor *n*" is spoken	▪ Power supply of the motion detector is missing (check cable, connector and power supply) => further announcement „power failure " ▪ The motion detector has been connected (additional announcement „sensor 1 activated" or disconnected (additional announcement "sensor failure") after power on => factory setting automatically recognizes a connected Plug&Protect-motion detector
„Alarm due to sensor *n*" is announced, but the motion detector has been temporarily deactivated	▪ The power supply of the unit has been cut off for a short period ▪ The *function switch* has been switched to PROG or OFF after temporarily deactivation.

10. SPECIAL PROGRAMMING

Important notes:

- **All parameters remain stored even if EasyAlarm® is switched off or without battery. Therefore reprogramming is only essential if parameters have to be changed.**
- **Programming mode can be locked to secure against unintended programming during operation (section 6.4.1). If lock is activated, the announcement „programming inactive: PIN" will be announced if *function switch* is shifted to PROG.**
- **Attention: Changing these parameters below does influence the operating mode. Therefore only necessary parameters should be changed. Please test behaviour before putting the unit back into operation!**
- **A programming error can be corrected by repeating the programming steps accordingly.**

10.1 Factory settings (Default-Values)

EasyAlarm® can be reset to default values as follows:

OFF ▬ ON PROG →	**Keep 3 and # pressed simultaneously**	OFF ▬ ON PROG →	Release keys	Prog. 3	OFF ▬ ON PROG ←

10.2 Alarm repetition

An alarm is triggered, as soon as the alarm criterion is fulfilled and the *waiting period* has expired. In some cases it might be useful to repeat an alarm as long until an acknowledgement is received.

OFF ▬ ON PROG	* 9 7 1 3 5 3 # #	Value	*	**Value**	#	OFF ▬ ON PROG ←
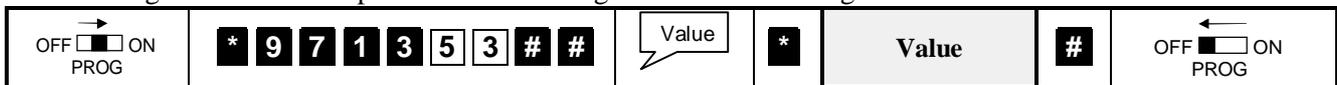
Value	Comment
0	EasyAlarm® calls the alarm numbers within the calling number sequence just once
1..9	EasyAlarm® starts calling the calling numbers within the calling number sequence until the alarm is confirmed by DTMF 0 or until the programmed value is reached! *(factory setting=2)*

10.3 Entry / Exit period

The appropriated register can be read-out or modified as follows:

OFF ▬ ON PROG	* 9 7 1 3 4 8 # #	Value	*	**Value**	#	OFF ▬ ON PROG ←

Value	Comment
0..255	Time in seconds *(factory setting=20)*

10.4 Mains power loss timeout

The appropriated register can be read-out or modified as follows:

OFF ▬ ON PROG →	* 9 7 1 3 6 3 # #	Value	*	**Value**	#	OFF ▬ ON PROG ←
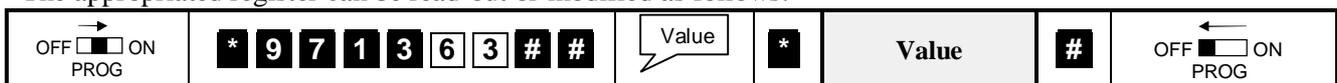
Value	Comment
1..255	Period for mains power loss, before an alarm is activated : in 10 minute steps ! (deviation:-10/+0min) *(factory setting=2,* i.e.. alarm is triggered if the mains voltage precipitates during 10..20min).

10.5 Signalling

10.5.1 .. through alarm unit

It is possible to signal the inactive waiting period with one beep every two seconds. Proceed as follows:

OFF ▬ ON PROG	* 9 7 1 3 0 5 # #	Value	*	**Value**	#	OFF ▬ ON PROG ←
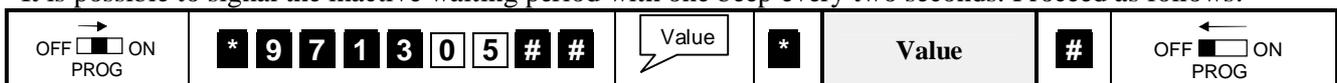
Value	Signalling..			
	Mains loss at power-on	**Selected mode** after power-on	**Exit** Beep every 2 sec.	**Entry**: 2 Beep
0	✗	✗	✗	✗
1	✔	✗	✗	✗
2	✔	✔	✗	✗
3	✔	✔	✔	✗
4	✔	✔	✔	✔

10.5.2 .. through external siren

Operating mode of the siren can be programmed as follows:

OFF ☐■☐ ON PROG	* 9 7 1 3 0 7 # #	Value	*	**Value**	#	OFF ☐■☐ ON PROG

Value	Comment
0	No signalisation by the siren *(=factory setting)*
1	periodical signalisation of the delay for exit / entry
2	periodical signalisation of the delay for exit / entry permanent siren tone in case of an alarm during *listening-in connection* (exception: silent panic call)

10.5.3 .. during phone connection (announcements)

The cause of alarm will be repeated every 8 seconds during connection until a DTMF command is received.

OFF ☐■☐ ON PROG	* 9 7 1 3 2 0 # #	Value	*	**Value**	#	OFF ☐■☐ ON PROG

Value	Comment
0	no repetitions => one announcement a the beginning of the connection
1..254	Cycle of repetition in steps of seconds *(factory setting=8)* i.e: **Value** = 30 => announcement every 30 seconds
255	Special case: *Individual message* announced just once (**WITHOUT** cause of alarm)

10.6 Shared line with telephone/modem

If you want to use **EasyAlarm** in combination with a downstream telephone/modem you must set dialling delay as follows:

OFF ☐■☐ ON PROG	* 9 7 1 3 2 4 # #	Value	*	**Value**	#	OFF ☐■☐ ON PROG

Value	Comments
0	No dialling delay *(=factory setting)*
1	Dialling delayed *(=Option PLUS)*

10.6.1 Wiring with cord with end-sleeves

☎-LINE	End-sleeves of telephone cord
PIN 2: OUT	Black => to downstream modem/phone b'
PIN 3: IN	Red <= from PSTN (Terminal a)
PIN 4: IN	Green <= from PSTN (Terminal b)
PIN 5:OUT	Gelb => to downstream modem/phone a'
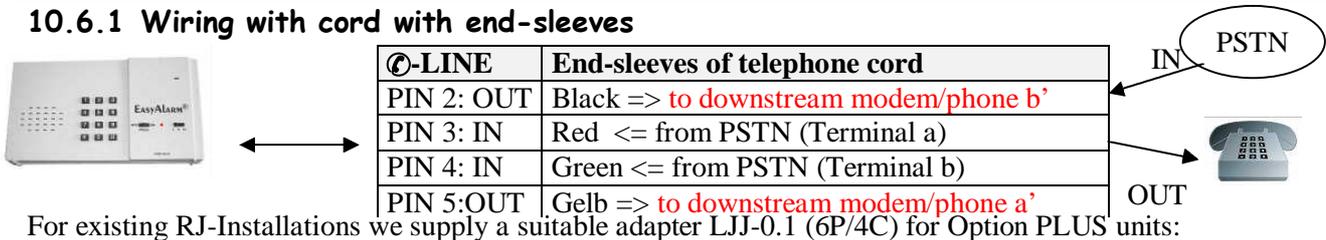
For existing RJ-Installations we supply a suitable adapter LJJ-0.1 (6P/4C) for Option PLUS units:

EasyAlarm

Room phone

RJ-Wall socket

10.6.2 Wiring Switzerland with T+T- SW06

post connected phone

1. Plug adapter SW06 into wall plate
2. Connect FCC-cord (5) between alarm unit and adapter SW06
3. Plug „post connected" phone into T+T-Jack of adapter SW06

10.6.3 Wiring Germany with TAE-N-Plug

TAE-N-Plug   TAE-F-Plug

post connected phone

1. Plug adapter TAE-N into first N-Jack of wall plate
2. Connect FCC-cord (5) between alarm unit and adapter TAE-N
3. Plug „post connected" phone into TAE-F-Type-Jack of wall plate

10.7 Dialling-in (Remote-access)

10.7.1 Program ringing cycles

The number of ringing cycles until **EasyAlarm®** answers the call can be read out or modified as follows:

OFF ▭ ON PROG →	`*` `9` `7` `1` `3` `4` `7` `#` `#`	Value ⌐	`*`	**Value**	`#`	OFF ▭ ON PROG ←

Value	Comment
0	**EasyAlarm®** does not answer any call
2..9	**EasyAlarm®** answers call after *Value* ringing cycles *(factory setting=2)*

10.7.2 Dialling in sequence

Behaviour on dialling-in mode can be read out or modified as follows:

OFF ▭ ON PROG →	`*` `9` `7` `1` `3` `7` `0` `#` `#`	Value ⌐	`*`	**Value**	`#`	OFF ▭ ON PROG ←

Value	Comment
0	**EasyAlarm®** answers call directly after the programmed ringing cycles *(=factory setting)*
1	**EasyAlarm®** answers call after a two-step dialling -in sequence

10.7.3 Connection mode after dialling-in

Phone connection mode after dialling-in can be read out or modified as follows:

OFF ▭ ON PROG →	`*` `9` `7` `1` `3` `7` `1` `#` `#`	Value ⌐	`*`	**Value**	`#`	OFF ▭ ON PROG ←

Value	Comment
0	**EasyAlarm®** does not signal a successful dialling in and switches in *listening-in connection* (=*factory setting*)
1	**EasyAlarm®** establishes hands-free connection announced by three gong signals.

10.7.4 Handling of incoming calls

Answering incoming call by pressing the emergency button or any key can be selected as follows:

OFF ▭ ON PROG →	`*` `9` `7` `1` `3` `7` `2` `#` `#`	Value ⌐	`*`	**Value**	`#`	OFF ▭ ON PROG ←

Value	Comment
0	**EasyAlarm®** is not responding by activation of the emergency button or any key of the alarm unit
1	The call can be received by pressing the emergency button or any key of the alarm unit *(=factory setting)*

10.8 Remote programming

The calling numbers as well as the sequence of the calling numbers are programmable during *phone connection*. This function is disabled (factory setting), but can be enabled as follows:

10.8.1 Enabling of remote programming

Remote programming can be read out or modified as follows:

OFF ▭ ON PROG →	`*` `9` `7` `1` `3` `7` `6` `#` `#`	Value ⌐	`*`	**Value**	`#`	OFF ▭ ON PROG ←

Value	Comment
0	**EasyAlarm®** cannot be remote programmed *(=factory setting)*
1	**EasyAlarm®** is ready for remote programming

10.8.2 Remote programming of calling number and calling number sequence

If remote programming is enabled calling numbers/sequence can be re-programmed during *phone connection:*

1. Enter $\boxed{\text{DTMF} * * \boxed{n}}$ (***n*** => see chart below)
   ➥ *Current calling number/ calling number sequence will be announced. If you want to change, continue at point two. otherwise enter* $\boxed{DTMF \#}$.
2. Enter $\boxed{\text{DTMF} *}$
3. Enter new number/sequence
   ➥ *After entering of the last digits, wait ten seconds. New number/ sequence will be announced, followed by the request to enter* $\boxed{DTMF \ n}$ *to confirm change. If you do not confirm within 10 seconds or if another key is pressed the message „programming: abort" will be announced. In this case the old value remains active.*

<n>	Comment	Programming according to
0	Calling number sequence (max. 9 digits)	Section 6.2.1
1	Calling number 1 (max. 24 digits)	Section 6.1
2	Calling number 2 (max. 24 digits)	
..	Calling number .. (max. 24 digits)	
9	Calling number 9 (max. 24 digits)	
#	SPECIAL - CASE: Phone connection is terminated and a test call is initialised with the current calling number sequence and calling numbers => announcement: "Alarm due to programming"	

11. ACCESSORIES

Further accessories can be found on our homepage on www.easyalarm.ch.

11.1 Motion / Presence detector-PIR-RJ45 (Plug&Protect)

11.1.1 Preliminary considerations

Choose the mounting location after careful consideration of the area to be protected. The motion detector should be located so that an intruder will cross the infrared beam pattern. Figure shows the different infrared beam patterns at a typical mounting height of 2.5m. If used to verify presence, a regular used room should be detected.
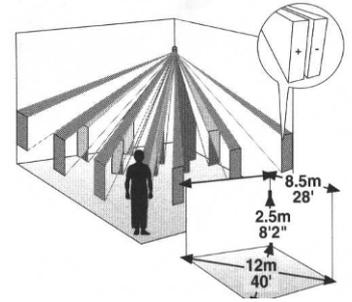
Notes:
- Do not mount detector towards direct sunlight or near to heat sources.
- Do not mount detector behind items like glass or curtains because the infrared-beam cannot penetrate them.
- Keep away pets like cats or dogs from the protected area.
- Do not protect the same area by more then one detector, because they can interfere.

11.1.2 Installation

Connect the cable of the motion detector on the EXT port of the alarm unit. The AC adapter of the alarm unit provides the power supply of the detector

11.1.3 Activation

Provided the motion detector is plugged in, **EasyAlarm®** detects the sensor during the power up.

Important notes:
- *By disconnecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call due to sensor failure"!*
- *By connecting the motion detector during operation, an alarm is triggered with the announcement: „Emergency call activated, sensor 1 activated"!*

11.1.4 Deactivation

If the motion detector is not plugged in, **EasyAlarm®** automatically deactivates the supervision of the motion detector.

11.1.5 Specification

Supply voltage	9..16 VDC (through AC-adapter)
Dimension	107 x 58 x 39mm (L x W x D) without swivel
Weight	75 g
Cable	8 m RJ45
Detection type	passive infrared (PIR)
Alarm contact	normally closed

11.1.6 Adjustment

Safety note:
- *Before you open cover please check, that the telephone cord is SONNECTED. Otherwise you can get in contact with the telecommunication voltage!*

Remove the front cover by twisting a flat screwdriver in the slot between the cover and the base at the bottom of the motion detector

11.1.6.1 Pulse count

You can set PULSE jumper at position 1,2 or 3 corresponding to the desired pulse count before an alarm will be triggered. Default = 2.

11.1.6.2 WALK-test

To disable LED indication, remove the LED jumper and place it on one pin only. To activate LED indication, place LED jumper over both pins.

11.1.6.2.1 Mounting height

If motion detector is not mounted at 2.5 m you can adjust like this:
1. Loosen the PC-Board holding screw. Slide the PC-Board so that the plastic pointer on the right side is positioned at the appropriate scale position.
   - For higher than 2.5 m => Slide PC-Board up
   - For lower than 2.5 m => Slide PC-Board down
2. Tighten the PC-Board holding screw
3. Mount front cover
4. Walk through the entire protected area and observe the LED to ensure full coverage
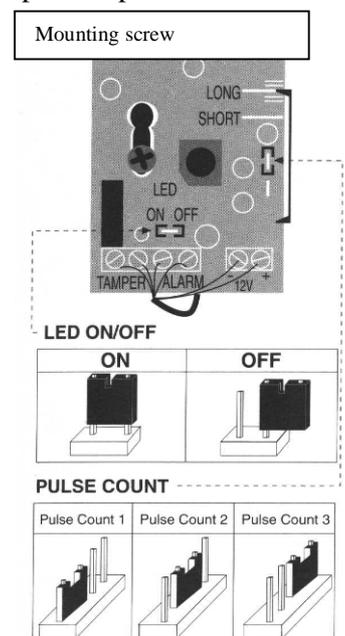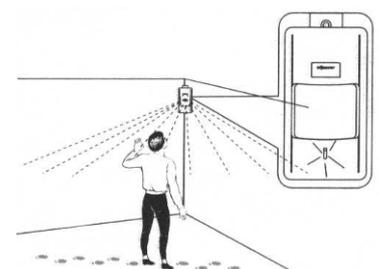
11.2 Siren EA-SIR-RJ45

Primary voltage	230 VAC / 50 Hz (European plug!!)
Secondary voltage:	12 VDC / 1.8 VA
Dimension:	120 x 65 x 77 mm (L x W x H)
Weight:	200 g
Cable:	3 m RJ45
Installation:	connect in place of the BBT-DC12S-RJ45 AC-adapter

Functions:

A)   periodical ton of the siren (during *inactive waiting period*)
B)   in case of an alarm in *listening-in connection*, the siren can be activated permanently
C)   the siren can be switched on/off during *phone connection* by entering DTMF 6 / DTMF 4 .

11.3 230V-Switch EA-SWI-RJ45

Same as EA-SIR-RJ45, but instead of the siren a 230VAC load (f.e. a light) can be switched on/off during connection. Output cable with Euro-jack-connector with maximum load of 2.5A.

Activation of output:

A)   Output is activated automatically, as soon as an alarm criteria is fulfilled (siren, floodlight)
B)   Output is activated automatically, if an alarm remains unacknowledged   (siren, floodlight)
C)   Output is activated during *phone connection* by request (siren, floodlight)

Output: activate: DTMF 6   de-activate: DTMF 4

11.4 DIN-Interface-Box EA-ACDC-SWI-RJ45

Primary voltage:	230 V +- 10% / 50 Hz
Secondary voltage:	12 VDC 3 VA
Optocoupler-Input:	10..230 V (AC or DC)
Relay output:	max. 2.5 A/230 VAC (NO)
Dimension:	87.5 x 93 x 66.5 mm (L x W x H)
Weight:	320 g
Cable:	3 m RJ45
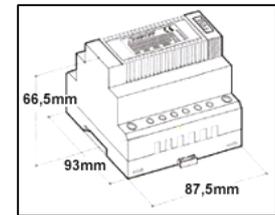
Installation:	Insert instead of BBT-DC12S-RJ45 => Example
Output:	same as EA-SWI-RJ45

Relay output: **Signal 10..230V (AC or DC)**:
2A/230VAC (Normally open)   Sensor 1 - input

→ To EXT-jack of EasyAlarm
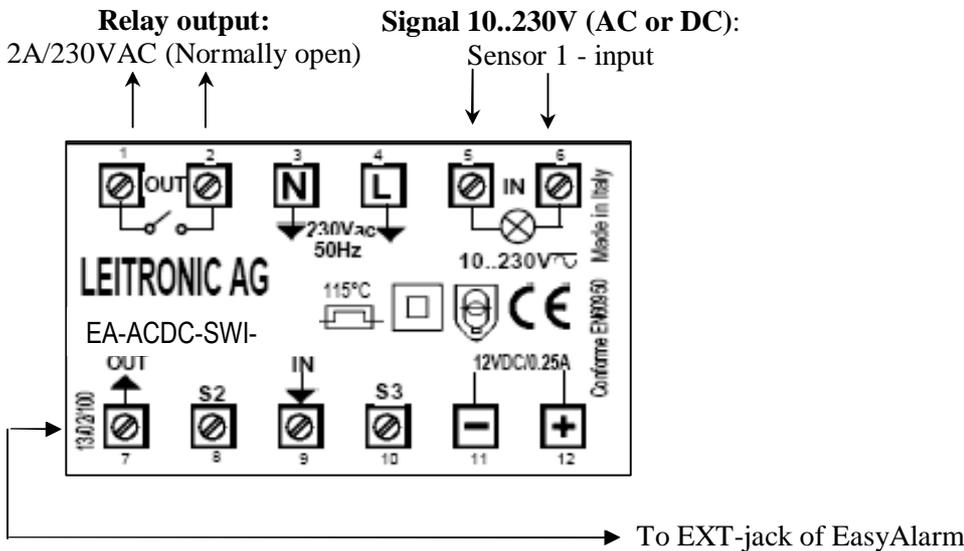
EXT-connection cord RJ45 (8/6), length 3 m

11.5 Extension unit EA-LMKxx

Material:	ABS
Dimension:	112 x 56 x 21 mm (L x W x H)
	Width incl. plug: 74 mm
Weight:	100 g (without cable)
Cable:	3 m RJ45

Plug X7: Primary connections on free potential
Plug X2: Connection on PSTN potential!
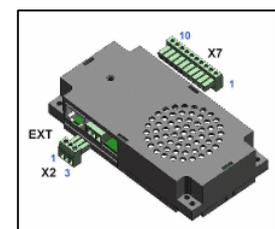
12. SPECIFICATIONS / WARRANTY

Changes to product and performance can be made at any time without announcement.

12.1 Specifications

12.1.1 Alarm unit EasyAlarm® EA-8-433

Supply voltage:	9..16 VDC (by AC adapter at EXT/≈ connector)
	Backup: 9V-battery (typical duration of operation about 50 hours)
Current input:	Supervision mode: 10 mA (typical) / during announcement: 55 mA (max.)
Announcement:	Voice chip with four integrated languages: German, French, English, Italian
	Other languages combinations on request
Material of housing:	ABS
Dimensions:	200 x 110 x 31mm (L x W x H)
Weight:	320 g without the battery
Telephone cord:	8 m RJ11 + country specific telephone plug
Calling method:	DTMF (Tone dialling)

12.1.2 AC-adapter BBT-DC12S-RJ45

Primary voltage:	100 – 240 V / 50 – 60 Hz
Secondary voltage:	12 VDC / 6 VA
Safety label:	EN60950, 1992
Dimension:	70 x 30 x 60 mm (L x W x H)
Weight:	102 g
Cord length:	3 m RJ45

12.2 Warranty

Dear customer

Each **EasyAlarm®** is manufactured and tested according to stringent quality rules. If the unlikely case should occur, that due to a manufacturing error the product is malfunctioning, Leitronic AG will guarantee in addition to your sales distributor warranty of repairs without any labour or material costs for 2 years after date of purchase.

Warranty is only granted, if the unit has been used as described in the instruction manual.

Warranty will not be given under following circumstances:
- If there is no invoice or receipt with date of purchase, vendor's name and serial number.
- These documents have been changed or modified.
- If serial number on type label has been changed, cleared, removed or modified in any way.
- If any repair, modification or other adaptation has been carried out by an unauthorized person or company.
- Damage due to tampering with device.
- Damage due to external influence (lightning, water, fire and so on).

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