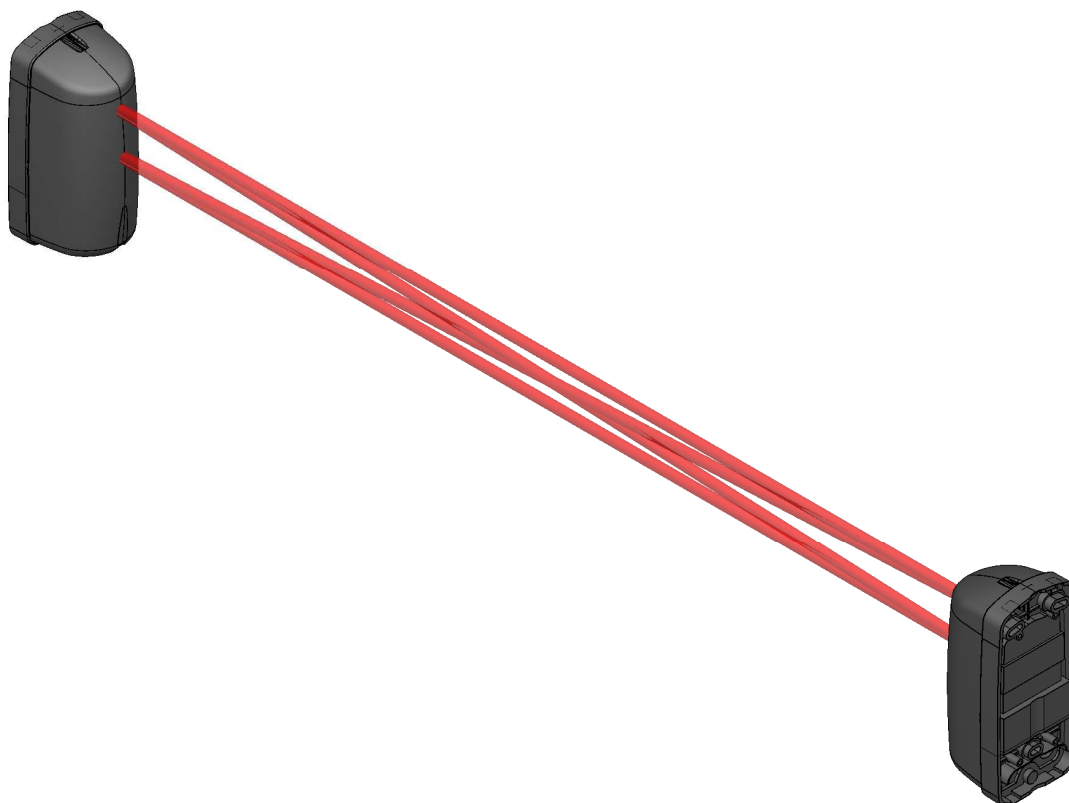




## UNIRIS II 50



FR

### **BARRIERE A INFRAROUGE ACTIF UNIRIS II 50**

**Notice d'installation**

**Pages 1-8**

EN

### **ACTIVE INFRARED BARRIER UNIRIS II 50**

**Installation instructions**

**Pages 9-17**

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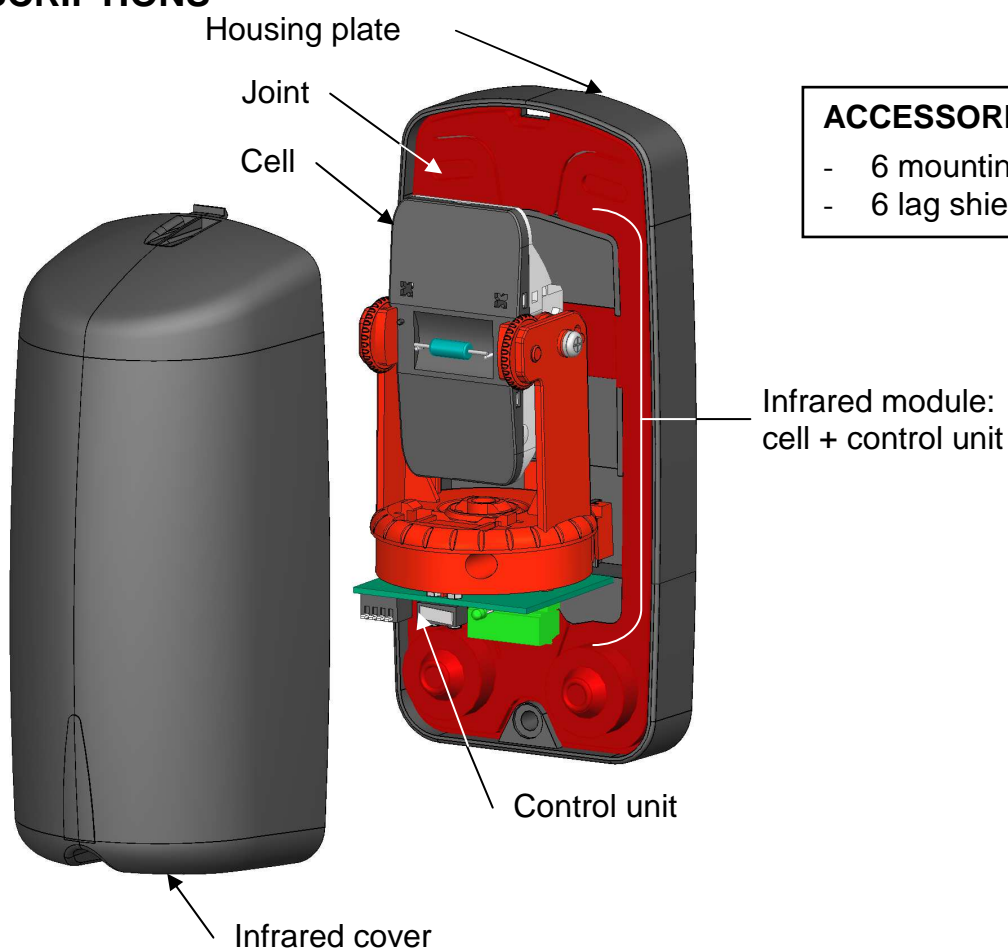
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# 1 DESCRIPTIONS

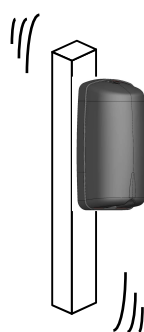


## ACCESSORIES PROVIDED:

- 6 mounting screws 4.8x60
- 6 lag shields

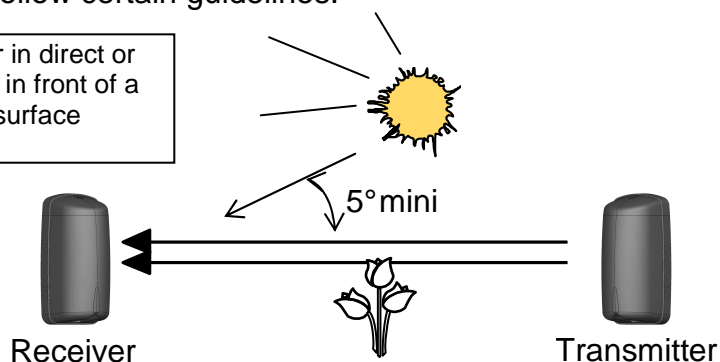
## Precautions regarding installation

To install the barriers correctly, it is important to follow certain guidelines.

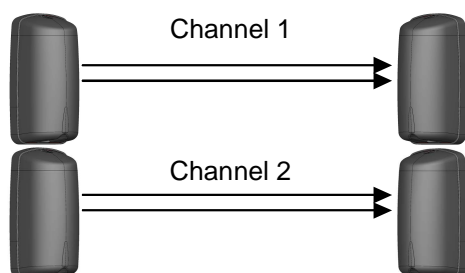


Do not install receiver in direct or reflected sunlight, nor in front of a highly reflective surface

Do not mount the barrier on an unstable support (ex: wire mesh, poorly sealed posts, etc.)



Verify that no vegetation is blocking the beams in any season



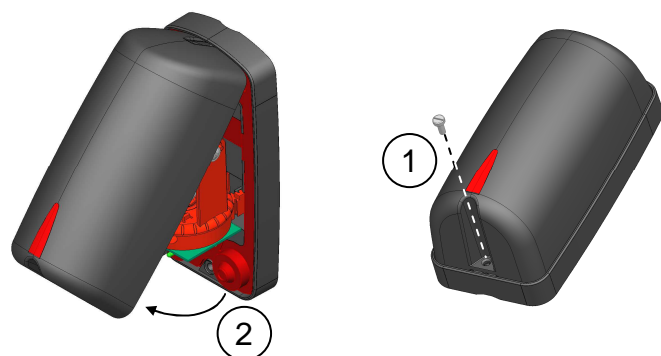
When the barriers are stacked, make sure they are configured with different channels.

## 2 INSTALLATION AND WIRING

### Removal/Reinstallation of the infrared cover

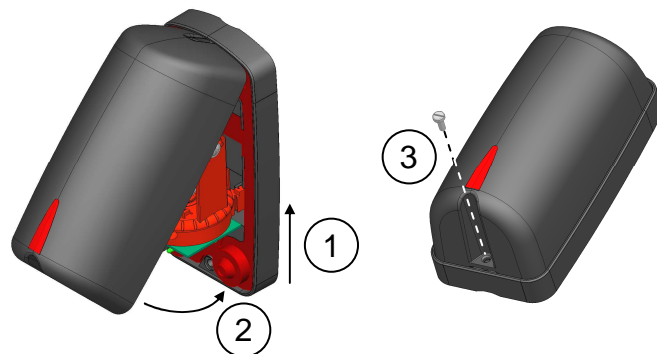
#### Removal:

1. Loosen the screw fastening the cover
2. Remove infrared cover.



#### Reinstallation:

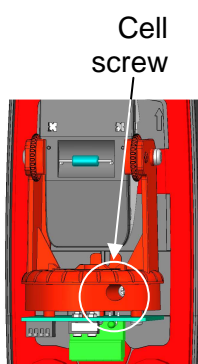
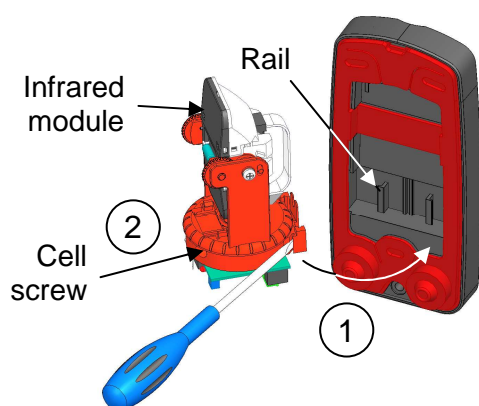
1. Insert hook of infrared cover into the plate, place infrared cover so that the hook is correctly positioned.
2. Close infrared cover on the plate.
3. Tighten fastening screw of infrared cover.



### Removal/Reinstallation of the infrared module

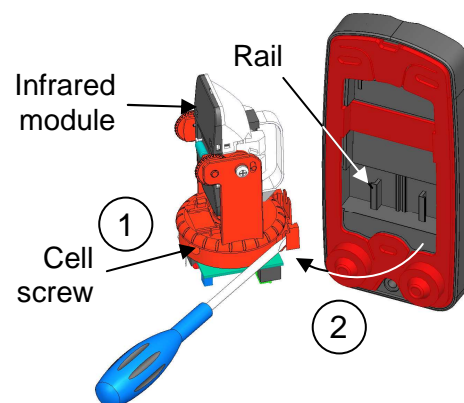
#### Removal:

1. Loosen cell screw.
2. Unfasten the module from the rail by levering it up with the help of a flat screw driver.



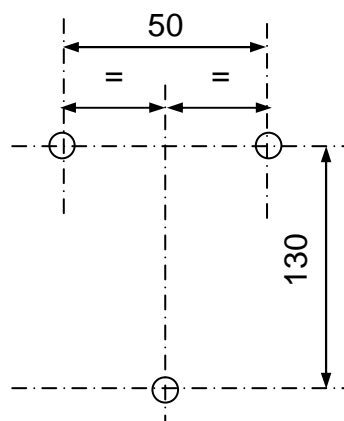
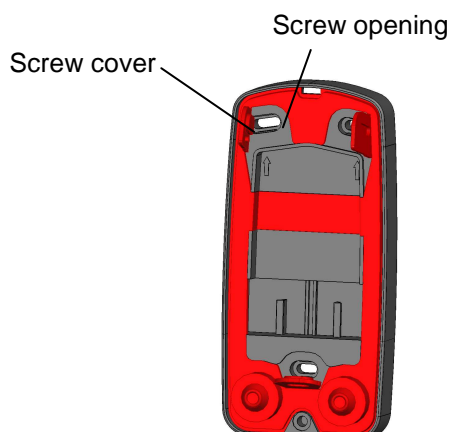
#### Reinstallation:

1. Insert the infrared module on the left part of the rail, then use a flat screwdriver to help fasten it onto the rail.
2. Tighten cell screw.

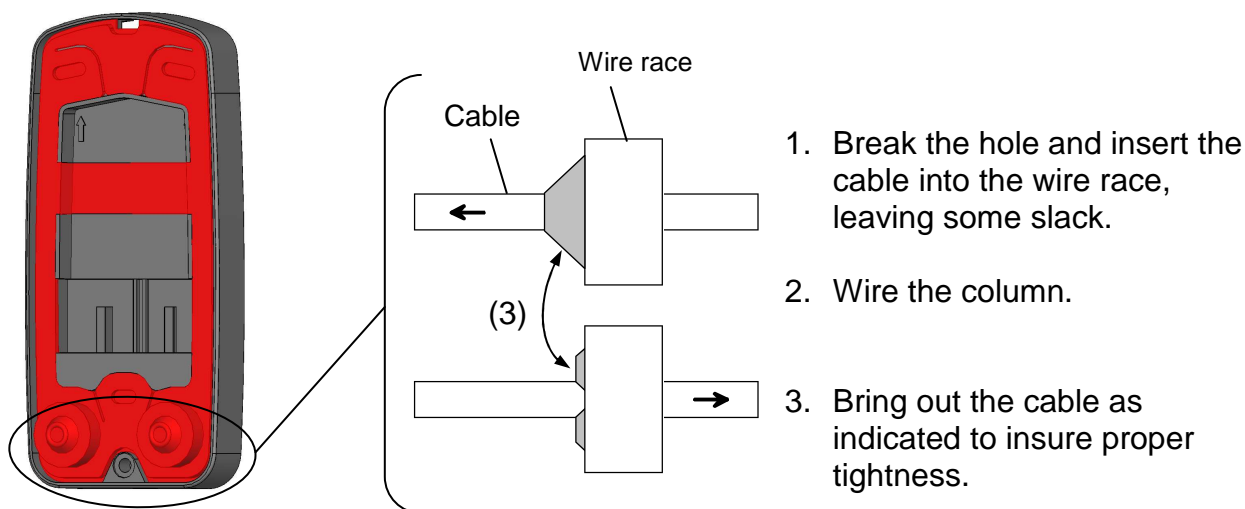


### Wall mounting

For wall mounted installations, use the provided screws and lag shields. Drill 3 holes and install the 3 lag shields using the template below.



## Cable routing in the barrier



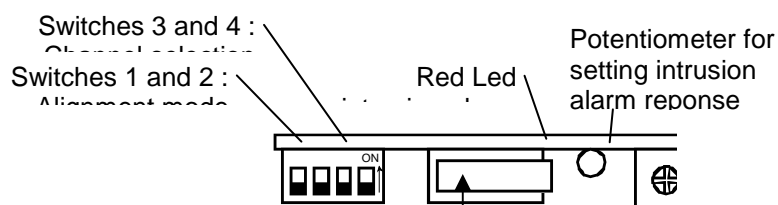
## Wiring the UNIRIS II 50



**Wire the barrier after removal of the infrared module.**

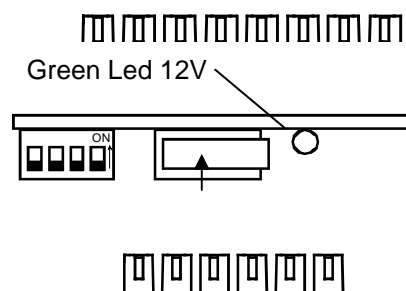
### Receiver circuit board connector (RX)

Terminal 1	+ Heating *
Terminal 2	- Heating *
Terminal 3	+ Power supply
Terminal 4	- Power supply
Terminal 5	Tamper
Terminal 6	Tamper
Terminal 7	Intrusion relay NO
Terminal 8	Intrusion relay COM



### Transmitter (TX) Circuit Board Connector

Terminal 1	+ Heating *
Terminal 2	- Heating *
Terminal 3	+ Power supply
Terminal 4	- Power supply
Terminal 5	Tamper
Terminal 6	Tamper



\* not wired for NH models

### Maximum cable length

Ø wire (mm)	Wire section (mm²)	12V Electronics			12V Heating		
		T	R	T+R	T	R	T+R
0,6	0,3	750	600	300	120	120	60
0,9	0,6	1600	1300	800	280	280	140
1,4	1,5	-	-	1600	600	600	300
1,8	2.5	-	-	-	1000	1000	500

**Nota :** When using the same cable to supply power to several components, the indicated distances are divided by the number of connected components.  
When using several wires with the same section in parallel by polarity, the indicated distances are multiplied by the number of connected wires.

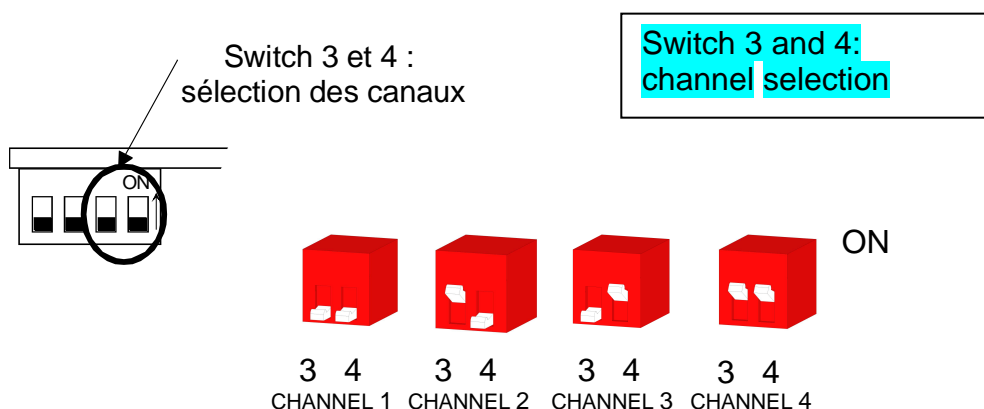
### 3 CHANNEL SELECTION

To prevent interference by one barrier with another on the same site, barriers are equipped with four selectable frequencies (channels).

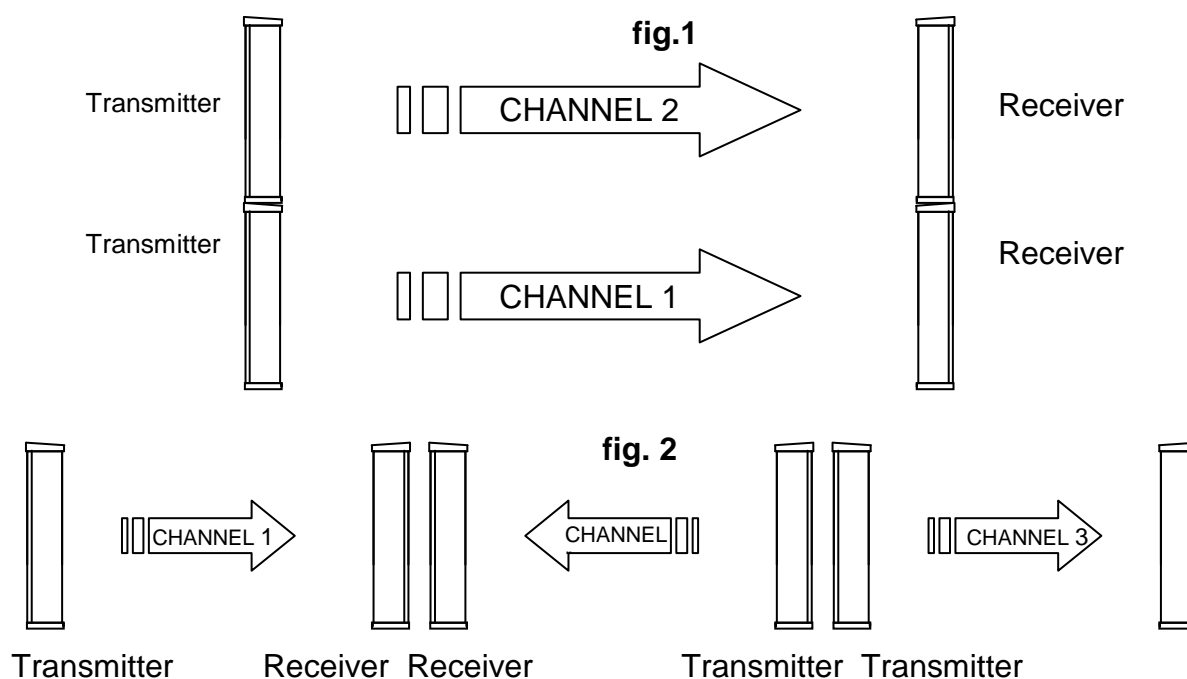
The receiver and its associated transmitter must be configured with the same channel number. This configuration is performed by using switches 3 & 4 on the control unit.



**The channel is confirmed by the receiver and the transmitter when the barrier's power is turned on. (Once the barrier's power is turned on, the channel selection switches have no effect when operated.)**



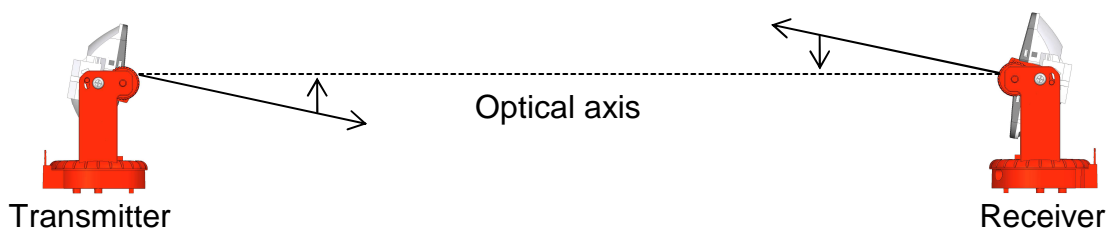
When barriers are stacked (fig.1) or installed along the same line (fig. 2), select a different channel for each barrier.



## 4 ALIGNMENT AND ADJUSTMENT

The alignment is comprised of two phases: the first is comprised of an optical alignment; the second is comprised of an optimizing phase for the receiver for the models BIRIS II 50 and 100 and for the receiver and transmitter for the BIRIS II 200.

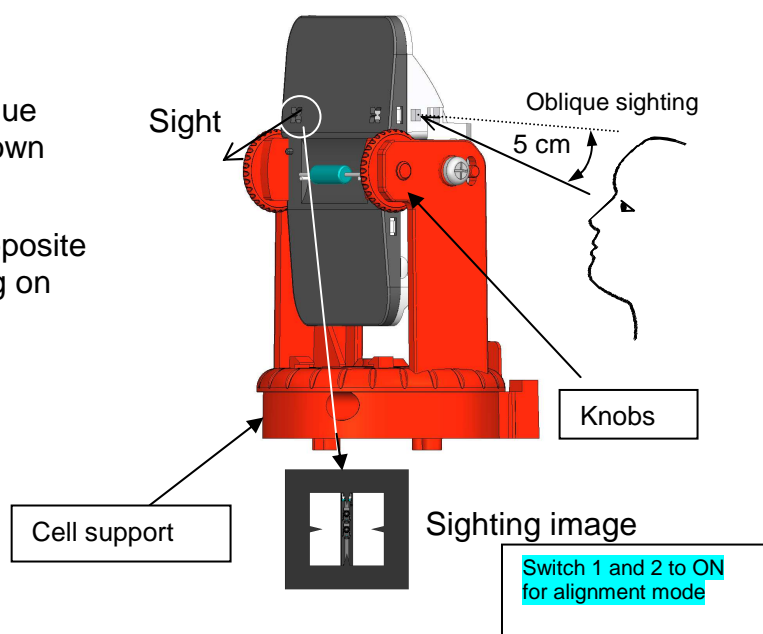
### Optical alignment:



This alignment consists of lining up the axis of the transmitter and receiver modules. This basic alignment adjustment is performed for each module by using the integrated sighting system and begins with the transmitter modules.

### Description of the cell viewfinder:

1. Place the eye in front of the cell along an oblique line of sight at a distance of about 5 cm as shown in the accompanying figure.
2. Aiming consists in viewing the image of the opposite module in the internal mirror using the opening on the side of the cell.
3. Aiming is performed by rotating the sight horizontally by directly manipulating the cell fork + or - 90°, and by vertically rotating the sight by manipulating the knobs + or - 10°.

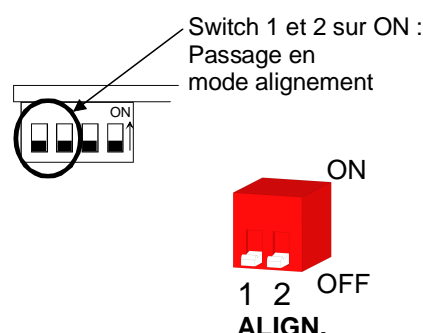
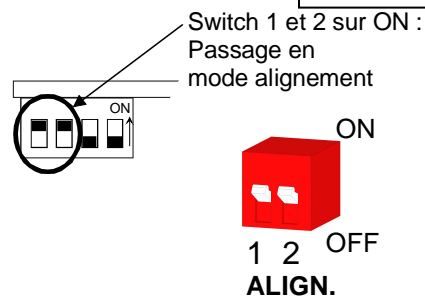


### Optimization of alignment:

- Switch 1 and 2 to ON on TX and RX columns in order to enter alignment mode. Work on the cell to find sound frequency and quickest LED blinking.

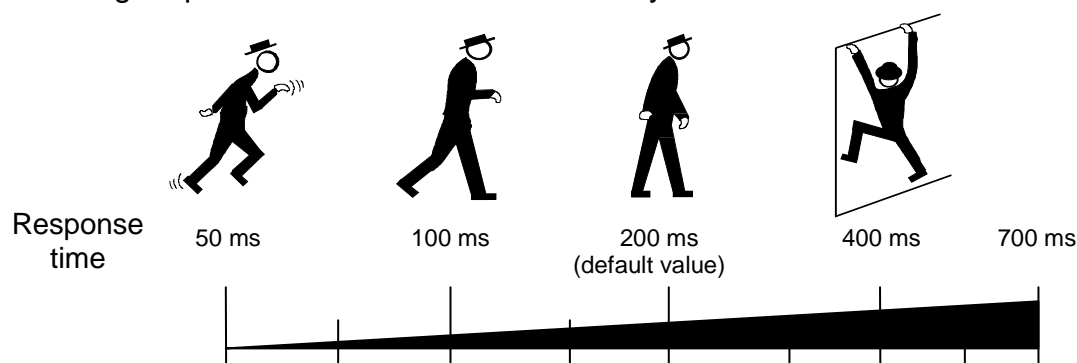
Sound signal	Alignment status
Continuous signal	Excellent
Rapidly beeping	Good
Slowly repeating beeps (1 / sec)	Bad
Slow regular beeps	No signal

- Switch 1 and 2 to OFF on the TX and RX barrier in order to leave alignment mode



## Adjusting the response time:

Adjustment of the response time allows adaptation of the detection sensitivity of the barrier environment. A long response time reduces the sensitivity



## 5 FINAL TESTS

After installation, verify correct operation with a complete test:

- Transmitter active: green Led on
- Alarm triggered by passage between beams: red Led on.

## 6 TROUBLESHOOTING

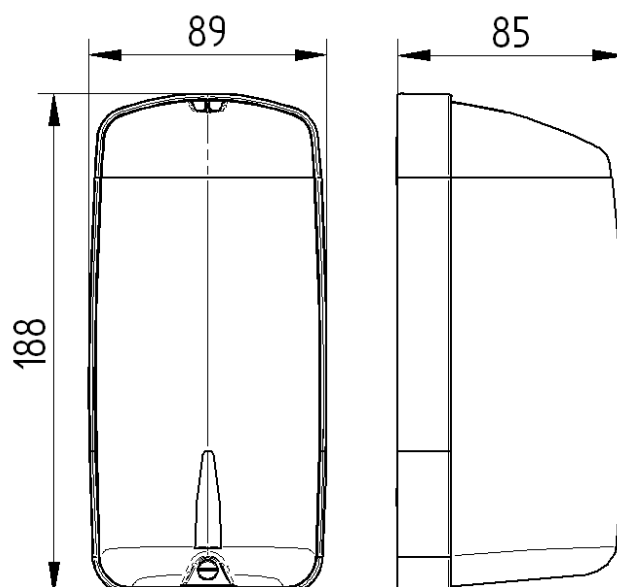
Malfunction	Probable cause	Solution
Green Led on transmitter out	– Improper power supply	– Check power supply (operating range between 10V and 14V).
Red Led on the receiver column out continually		
Red Led on the receiver column lit continually	– Transmitter column without power – Poor alignment – Transmitter on different channel – Channel not validated – Object obstructing the beams	– Check transmitter power supply – Reperform alignment procedure – Change transmitter channel – Switch column power off and on – Disengage the beam axes
Beams interrupted, but red light of reception column not on	– The beams are not interrupted simultaneously	– Interrupt all beams simultaneously



## 7 TECHNICAL SPECIFICATIONS

UNIRIS II 50 NH	30 6004 00	
UNIRIS II 50	30 6004 01	
Maximum indoor detection distance	125 m	
Maximum outdoor detection distance	50 m	
Detection mode	Pulsed infrared cell with four selectable frequencies (channels)	
Number of beams	2	
Detection mode	Simultaneous interruption of all beams	
Response time of intrusion alarm	Adjustable from 50 ms to 700 ms	
Intrusion alarm typical duration	Interruption time of beams with a 4 second minimum	
Power supply electronics only	10V to 14V DC	
Power supply heating (optional)	10V to 14V AC / DC	
Power consumption with 12V:	Electronics	Heating
• Transmitter only	20 mA	120 mA
• Receiver only	25 mA	120 mA
• Entire barrier	45 mA	240 mA
Tamper output	NC - alarm off 30V DC 50 mA	
Intrusion output	NC - alarm off 30V DC 500 mA	
Operating temperature with thermostat-controlled heating	-25°C / +55°C	
Protection index	IP 65	
Weight	630 g	
Electromagnetic compatibility	Compliance with European standards (CE label)	
Cell orientation	Horizontal : +/- 90° - Vertical : +10°-15°	
Integrated alignment tools	Optical sighting system, audio tone of incoming signal	

### Exterior dimensions (en mm)



In compliance with European environmental directives, this product must not be thrown away but recycled through an appropriate subsidiary.