

PRODUCT SPECIFICATION

WIRELESS OUTDOOR TRI-TECH MOTION SENSOR

VS-T2/VS-L2

Please read the specification for this product carefully before use

1. General

VS-T2/VS-L2 is a kind of high-performance detector integrated with the up to date technology in modern security field, which is composed of frequency doubling microwave circuit with super long service life and not vulnerable to ageing, high precision passive infrared detector and fuzzy logic digital core. Its casing is made from engineering nylon with beautiful design.

Outstanding features:

1. All kinds of disturbance insurmountable by ordinary detectors are eliminated thanks to combined detection by both microwave and passive infrared and digital (patent) analysis of fuzzy logic. An alarm is given only in terms of movement of real human body and false and missed alarms are avoided with the performance far exceeding various infrared detectors free of microwave function.
2. The patented full-range precision temperature compensation is adopted to ensure consistency of detection sensitivity without temperature dead zone (the sensitivity of ordinary detectors would drop substantially under 32°C-40°C or give false alarm frequently in other temperature range), no matter how the ambient temperature changes.
3. The full-range precision temperature compensation ensures consistency of detection sensitivity without temperature dead zone, no matter how the ambient temperature changes.
4. Pure wireless structure, power supply fully built-in, signals sent by wireless and ease of installation.
5. Extremely power saving design + high capacity batteries.
6. Built-in expansion slot, compatible with diversified wireless host machines.

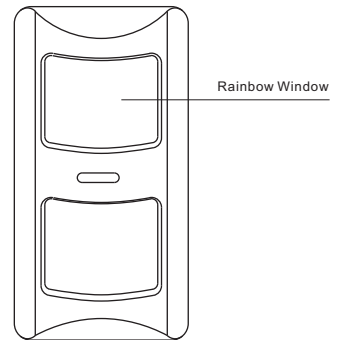


Fig.1 Schematic Diagram for Product Appearance

2. Technical Specifications

01. Power supply: 3V special high power lithium battery of Safestest with continuous service life of 1-2 years.
02. Working current: less than 30 uA in static state and less than 15mA for alarming.
03. Power on self test: after power on, the time for detector -entering working state is 150s.
04. Transmitting frequency: 433MHz
05. Transmitting distance: greater than 100m (open space without -disturbance)
06. Operating mode: service mode (minimum time interval between two times of alarming is about 7min)
Testing mode (minimum time interval between two times of alarming is about 10s)
07. Sensor: specially made low noise double structure
08. Induction indication: when movement of human body is detected by infrared and confirmed by microwave, the alarm light will light up and the wireless alarm signal will be transmitted.
09. Lens window: 72 pc.
10. Pulse counting: 2~3 pc.
11. Detection angle: VS-T2 is 110°
VS-L2 is 6°-9° (as shown in the diagram)
12. Coverage: VS-T2 is 9m × 9m (typical values)
VS-L2 is 9m (as shown in the diagram)
13. Temperature compensation: directional automatic temperature compensation
14. Under-power indication: when the voltage is lower than 2.5V, the detector will transmit the under-power alarm signal once.
15. Product dimensions: 138 × 75 × 46mm

Environmental Conditions

16. Operating temperature: -30°C to 65°C
17. Storage temperature: -40°C to 70°C
18. Anti-electromagnetic interference: >30V/M
19. Anti-white light interference: >1,000,000LUX, anti-Interference of direct sunlight exposure.

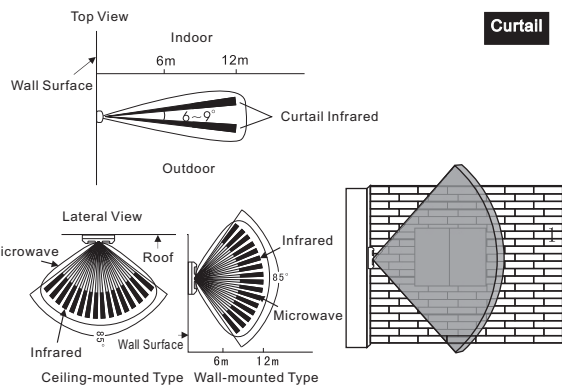
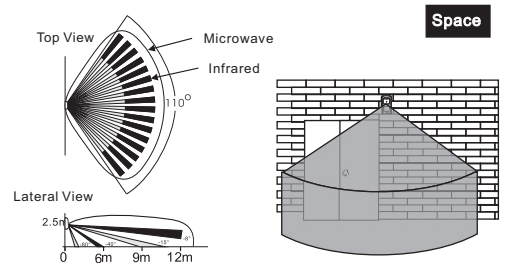


Fig.2 Schematic Diagram for Detection Range

3. Installation

3.1 General guidance

- A. The detection sensitivity will be the highest when the moving track of intruder is perpendicular to detection circle. The covering scope of border is determined according to this method.
- B. Avoid the installation together with strong current cable, strong current cabinet etc.
- C. When the detector is installed under the environment with high temperature, making it aligned with the part with lowest temperature in the protected area is suggested in order to achieve the best efficiency.
- D. The number of pulse counting should be increased, while the detection sensitivity should be decreased when using in the environment with relatively stronger interference.
- E. The installation elevation of this detector should be between 2 and 3m. (The detection distance is too large when it is 2m.)
- F. The wall installed with detector should be firm, stable, and free from swing.

3.2 Installation and setup

Installation of detector: make the end of housing with pressure balance hole downwards and bottom cover stuck to the wall horizontally. Use the double-faced adhesive tape to paste or screw to fix it (The sliding bottom plate is reserved with fixed hole used for installation). The left and right angle can be adjustable and downward declination is not allowed. The detector is 2 to 3m from the ground.

Special installation and setup of detector: the upper cover installed with tag of "UP" should be upright. The upper cover can be installed after rotating for 180° if there is no sensitivity in short distance when the installation elevation is too high (such as about 3m).

3.3 Electricity work

Set the jumper of power switch to the battery position and the circuit will be connected with battery. The detector will operate normally after 150s.

3.4 Setup of operating state

The wireless alarm signal will be sent out when the battery is connected, which is used to cooperate with the host to record the code. Generally, the wireless alarm signal can only be sent out when the detector is alarming.

Jumper setup in operating mode: connect into USE. The detector will stop operating for 7 min after each successful alarm from it, which aims to prepare for next detection. Connect into USE. Delay 10s after each successful alarm (or action) from detector. In addition, trigger and test the secondary alarm (or action) of detector by walking, which is convenience for testing when having installation and adjustment.

Jumper for induction sensitivity: adjustment of induction sensitivity

- At the position with 3~6M: the furthest induction distance is 3~6m;
- At the position with 5~9M: the furthest induction distance is 5~9m;
- At the position with 6~12M: the furthest induction distance is 6~12m;
- At the position with 9~18M: the furthest induction distance is 9~18m.

Jumper LED: cut off the jumper LED and spectral source will be closed. Connect the jumper LED and spectral source will be open.

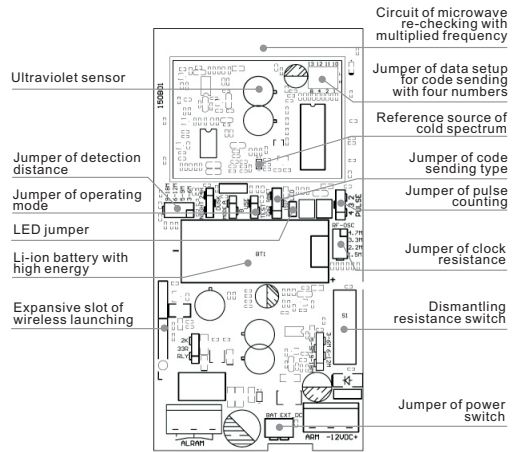


Fig.3 Structure Diagram of Circuit Board

3.5. Compatible method with other wireless hosts

The use of this detector required for wireless hosts manufactured by different manufactures can be realized after setting the "jumper of data setup for code sending with four numbers", "jumper of code sending type" and "jumper of clock resistance" on this detector.

3.6 Walking test

- A. Set all the states as ex-factory state.
- B. The rainbow window will be on when each active detection is found after simulating the intruder's activity within the scope covered with ultraviolet.
- C. Measure whether the maximum effective scope is the required covering area, or adjust the installation and setup position, left And right angle or jumper changing of detector.

4. Considerations

- A. Do not drop or hit the detector when installation to prevent the inner sensor from damaging.
- B. Do not touch the ultraviolet sensor to avoid contaminating the mirror of sensor.
- C. Recover the setup state required for normal operation after completion of testing.
- D. Conduct the walking test for detector periodically.
- E. Indoor installation is also allowed.

Maintenance and service tips: please do not conduct the self-dismantling and maintenance when having any problem during use. Contact with dealer or this company immediately.

Shenzhen Meidasi Technology Development Co., Ltd

Address: 3rd floor. No.182 building, Ailian Block B, Longang District, Shenzhen City

Code: 518172

Site: www.hkvstar.com

Executive standard: GB10408.6-1991

Rev. No.: 20111109A