



ORO

無線胎壓監測器

Tire Pressure Monitoring System

Model 型號 : WT01

FCC Notices

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation. This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

CAUTION:

Any changes or modifications not expressly approved by the grantee of this device could void the user's authority to operate the equipment.

RF exposure warning:

The equipment complies with FCC RF exposure limits set forth for an uncontrolled environment.

The equipment must not be co-located or operating in conjunction with any other antenna or transmitter.

NCC 警語

取得審驗證明之低功率射頻器材，非經核准，公司、商號或使用者均不得擅自變更頻率、加大功率或變更原設計之特性及功能。低功率射頻器材之使用不得影響飛航安全及干擾合法通信；經發現有干擾現象時，應立即停用，並改善至無干擾時方得繼續使用。前述合法通信，指依電信管理法規定作業之無線電通信。低功率射頻器材須忍受合法通信或工業、科學及醫療用電波輻射性電機設備之干擾。

WT01 wireless tire pressure monitoring system

WT01 wireless tire pressure monitoring system uses a transmitter module installed on the tire valve to detect the tire pressure and temperature in the tire, and transmits information via a radio signal through the transmitter circuit on the transmitter module to be installed on the vehicle. It has an external receiver module and displays the tire pressure and tire temperature information on the display module. When abnormal tire pressure or tire temperature is detected, the display module will automatically issue a warning. In addition to increasing the ability to drive the car, In addition to safety, it can also reduce additional oil sludge caused by insufficient tire pressure.

Specification Sheet

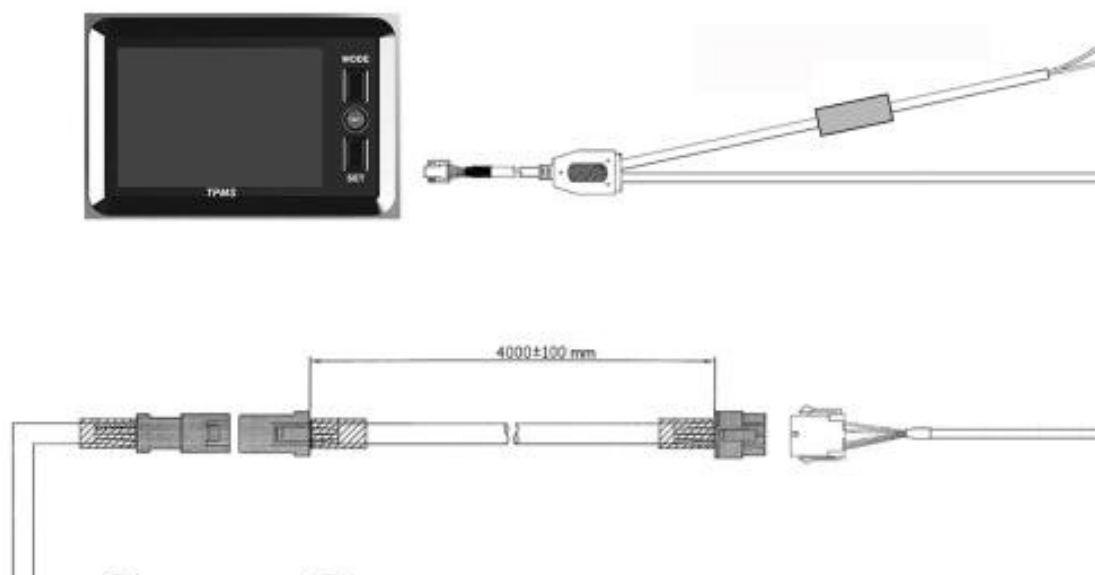
1. . Transmitter Display Module Specifications	
battery voltage	3V
Working humidity	Maximum 95%
Storage temperature range	-40℃ to 125℃
Operating temperature range	-30 ℃ to 115 ℃
RF Strength	79.32 dBuV/m @ 3m
Frequency Range	433.92MHz
Pressure detection range	0 ~ 203 psi (or 0 ~ 14 bar)
Pressure detection error range	±4 psi (±0.27 bar) @ -20℃~85℃±0.3bar
Temperature detection range	-30 ℃ to 115 ℃
Temperature detection error range	±3℃

2. Display module specifications	
Working voltage	DC 18V ~ 36V
Normal working current	≤100mA
Storage temperature range	- 30 ℃ to 80 ℃
Operating temperature range	- 20 ℃ to 70 ℃
Tire pressure display range	0~13 bar
Temperature display range	-40 ℃ to 115 ℃

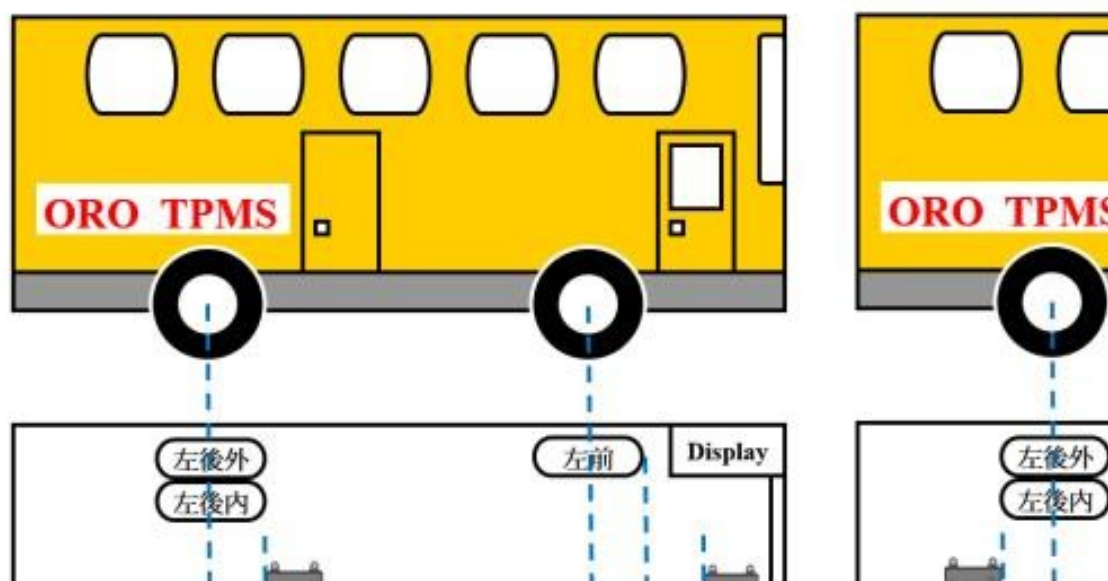
2. Receiver module specifications	
Working voltage	DC 5V
Normal working current	≤60mA
Storage temperature range	- 30 ℃ to 95 ℃
Operating temperature range	- 20 ℃ to 85 ℃

Installation Instructions

Receiver and wire installation:



Receiver and cable connection diagram



step	Operation mode	icon
a	the U2 receiver with a cable tie at a suitable position on the vehicle chassis about 1 meter in front of the center of the front wheel axle (as shown in the diagram of the installation positions of the U1 and U2 receiver boxes).	
b	the U1 receiver with a cable tie at a suitable position on the vehicle chassis 0.5 meters in front or behind the center of the rear wheel axle (as shown in the diagram of the installation positions of the U1 and U2 receiver boxes).	
c	Use one end of the 9M Cable to connect to the U1 receiver, fix the wire with a cable tie along the chassis pipeline and route it to U2 in the front direction of the car , and connect the other end to the U2 receiver (as shown in the schematic diagram of the connection between the receiver and the wire).	
d	Use one end of the 4M Cable to connect to the U2 receiver, fix the wire with a cable tie along the chassis pipeline and route it to the bottom of the driver's seat dashboard, and connect the other end to the 8pin connector of the power cord (as shown in the schematic diagram of the connection between the receiver and the wire).	

3. Display module installation:

step	Operation mode	icon
a	Attach the male and female Velcro tape to the appropriate places on the bracket and the back cover of the receiver respectively.	

b	Glue and fix the bracket at an appropriate sight position near the driver's seat, with the front side of the bracket (velcro felt) facing the driver's eyes.	
c	Connect the red wire of the power cord to the ACC power supply synchronized with the switch power supply , and the black wire to the ground wire.	
d	Attach the receiving display module to the bracket, and insert the white connector of the power cord into the power connector on the back of the receiving display module.	

After the installation is completed, turn on the power of the car and start monitoring the tire pressure and internal temperature of each tire.

WT01 operation and setting methods

1. Display module display interface description



Abnormal tire signal



Inner and outer tire indicator arrows



Tire pressure and temperature display



Pressure unit display



Tire position light



Temperature unit display

2. Display mode switching operation

The WT01 TPMS system has three display modes, namely pressure display mode, temperature display mode and pressure-temperature alternate display mode. The factory default is pressure display mode. In pressure display mode, press the **mode key (MODE)** once. The system will switch to the temperature display mode. Press **the mode key (MODE)** again and the system will switch to the pressure-temperature rotation display mode. If the factory settings are not changed, no matter what display mode it is currently in, after restarting The system will return to pressure display mode.

3. Pressure unit switching operation

The WT01 TPMS system has two pressure display units: bar and psi. The factory default unit is bar. When the display module is displaying pressure, press and hold **the mode key (MODE)** for 3 seconds to switch the pressure display unit . **The temperature display unit is only °C .**

4. Factory setting value change operation

Continuously press **the setting button (SET)** of the display module for 3 seconds to enter the setting mode. You can set the standard tire pressure value of single-axle dual tires - cold tires , and the standard tire

pressure value of single-axle four tires - cold tires in sequence. Settings , tire temperature -high temperature warning value setting, spare tire selection setting, power-on display setting and other setting changes, the operation method is as follows:

Note: Before changing the factory value settings, users should use the mode key (MODE) to switch the pressure value display unit suitable for the vehicle model.

Single axle dual tires - cold tire standard tire pressure value setting (including spare tire)

When the tire is in a state where it will not leak, the pressure inside the tire will increase as the temperature rises and decrease as the temperature drops. Generally, when the temperature change difference is 7 °C , the corresponding pressure change difference in the truck tire is about 3 psi. (21 kPa) , this is a normal phenomenon. The cold tire standard tire pressure setting value will be used as the comparison standard for abnormal tire pressure warning . When the tire pressure is higher or lower than 25% of this set value, the system A warning action will be taken .

Note: To set the standard tire pressure value for cold tires, please refer to the tire pressure setting data in the owner's manual of each vehicle type .

- a. entering the single-axle dual tire- cold tire standard tire pressure setting , the tire light representing the single-axle dual tire on the display module will flash, the bar symbol will light up and the digital modules on both sides will flash to display 9.0. This is Factory default value . If you do not want to make any changes, press the SET key (SET) to directly enter the next parameter setting . (**Note:** If the pressure unit used is psi, the digital module will flash and display 130).

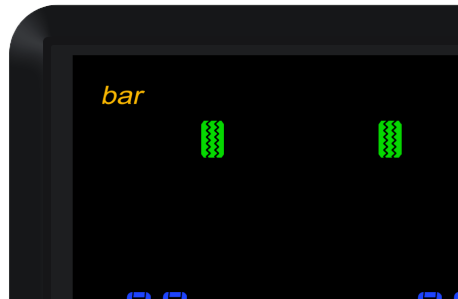


- b. Press the mode button (MODE) of the receiver module to adjust the single-axle dual tire- cold tire standard tire pressure setting. Each time the mode button is pressed , 0.2bar will be added . The adjustable range is from 2.0bar to 13.0 bar , exceeding 13.0 The bar will return to 2.0bar and the setting will be cycled again . (**Note:** If the pressure unit is psi, each press of the mode button will increase 2 psi , and the adjustable range is between 30 psi and 188 psi).
- c. Press the SET key (SET) to complete the single-axle dual tire- cold tire standard tire pressure setting adjustment , and the system will automatically enter the single-axle four-tyre- cold tire standard tire pressure setting.

Single axle four tires - cold tire standard tire pressure setting value

- a. After entering the single-axle four-tire- cold tire standard tire pressure value setting . The tire light representing the four tires on the single axle will flash on the display module, the bar symbol will light

up and the digital modules on both sides will flash to display 9.0. This is the factory default value . If you do not want to make any changes, press the setting button (SET) directly enters the next parameter setting . (Note: If the pressure unit used is psi, the digital module will flash and display 130).



- b. Press the mode button (MODE) of the receiver module to adjust the single-axle four-tire- cold tire standard tire pressure setting. Each time the mode button is pressed, it will increase by 0.2bar . The adjustable range is from 2.0bar to 13.0 bar , exceeding 13.0 The bar will return to 2.0bar and the setting will be cycled again . (Note: If the pressure unit is psi, each press of the mode button will increase 2 psi , and the adjustable range is between 30 psi and 188 psi).
- c. Press the SET key (SET) to complete the single-axle four-tire- cold tire standard tire pressure setting adjustment , and the system will automatically enter the tire temperature-high temperature warning value setting .

Tire temperature -high temperature warning value setting

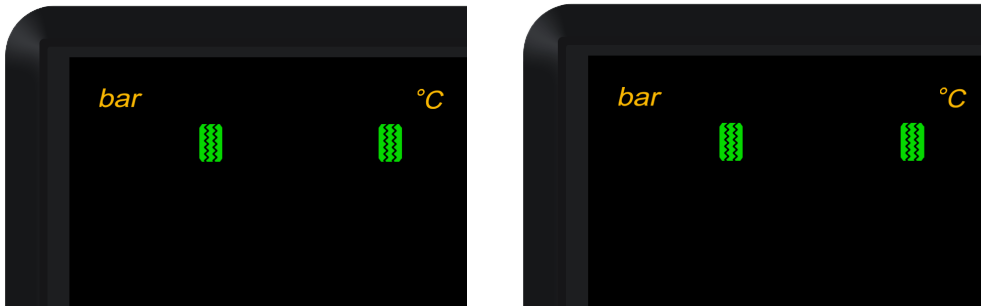
- a. entering the tire temperature -high temperature warning value setting , all tire lights on the display module will flash, the °C symbol will light up and the digital module will flash to display 90. This is the factory default value . If you do not want to make any changes , press the setting key (SET) to directly enter the next parameter setting .



- b. Press the mode button (MODE) of the receiver module to adjust the tire temperature - high temperature warning set value. Each time the mode button is pressed, it will increase 2 °C . The adjustable range is from 70 °C to 110 °C . If it exceeds 110 °C , it will return to 70 °C . , cycle through the settings again .
- c. Press the SET key (SET) to complete the tire temperature-high temperature warning value setting adjustment , and the system will automatically enter the spare tire selection setting .

Spare tire selection settings

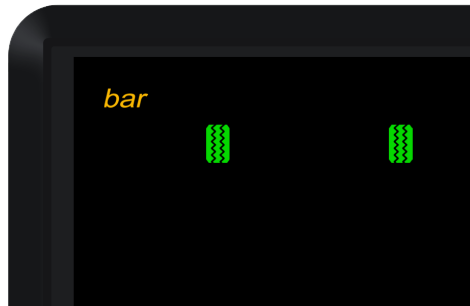
- a. After entering the spare tire selection setting , the display module will display all the tire lights currently monitored. If you do not want to make any changes, press the **SET button (SET)** to directly enter the next parameter setting .



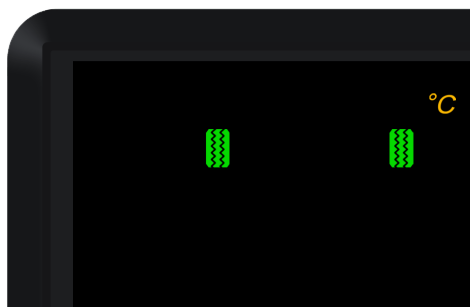
- b. Press the **mode button (MODE)** of the receiver module to select and cancel the setting of the spare tire. Press the mode button to cycle through selections .
- c. Press the **SET button** to complete the spare tire selection setting , and the system will automatically enter the startup display setting .

Boot display settings

- a. entering the power-on display setting mode , all tire lights and the pressure unit symbol bar on the display module will flash at the same time. This is the pressure display mode . The system will only display the tire pressure value of each tire. This is the factory default mode . If If you do not want to make any changes, press the **SET key (SET)** and the system will automatically return to normal working mode . (**Note: The pressure unit symbol may be psi or bar, depending on the pressure unit used by the system at the time).**

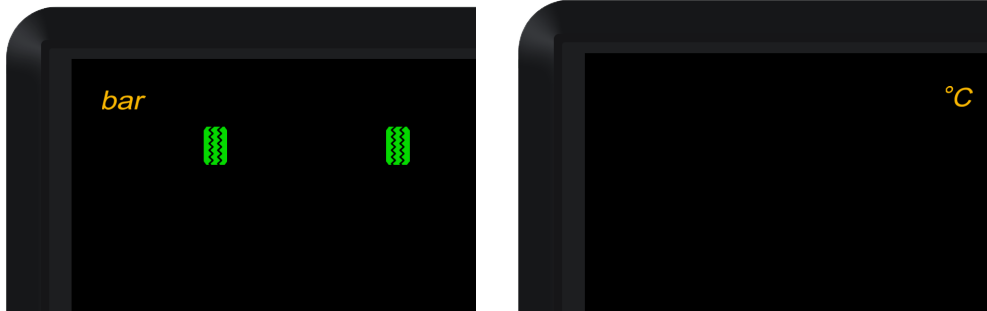


- b. Press the **mode button (MODE)** of the receiver module to switch to the temperature display mode . All tire lights and the temperature unit symbol °C on the display module will flash at the same time . In this mode, the system will only display the tire temperature value of each tire.



- c. Press the **mode key (MODE)** of the receiver module again to switch to the pressure-temperature

rotation display mode . The tire light on the display module will flash, and the pressure unit and temperature unit symbols will light up in turn . In this mode, the system will take turns. Display the tire pressure and tire temperature value of each tire.



- d. Press the **SET key (SET)** to complete the startup display setting adjustment , and the system will automatically return to normal working mode .

WT01 warning mode description

Note: When the warning mode occurs, pressing the **MODE** button for more than 3 seconds can eliminate the buzzer warning sound.

1. Tire pressure high and low pressure warning mode: When the tire pressure is higher than cold tires - standard tire pressure setting value * 1.25 or the tire pressure is lower than cold tires - standard tire pressure setting value * 0.75. (Cold tires - the tire pressure setting value is factory set to 9.0 bar. When the tire pressure is higher than 11.3bar or the tire pressure is lower than 6.7bar, the system will generate a warning).

Warning method: The tire light flashes, the abnormal tire light lights up, and a " beep " or " beep " warning sound is emitted.



2. Tire temperature high temperature warning mode: When the tire temperature is higher than the high temperature warning value setting. (The high temperature warning value is factory set to 90°C)

Warning method: The tire light flashes, the abnormal tire light lights up , and a " beep " or " beep " warning sound is emitted.



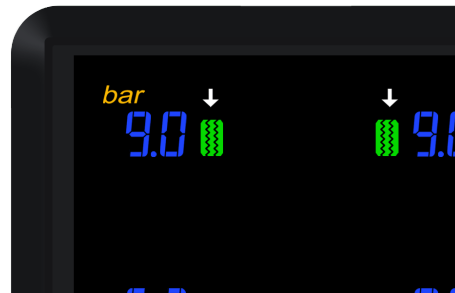
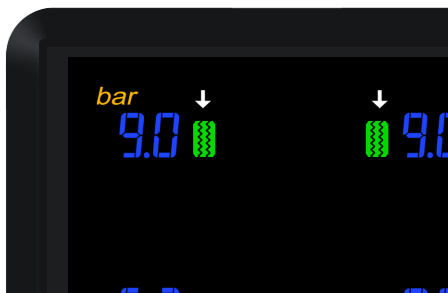
3. Rapid tire pressure leakage warning mode : When the tire is rapidly deflated .

Warning method: The tire light signal flashes together with the tire abnormality light signal, and a " beep " or " beep " warning sound is emitted.



4. Bad reception warning mode: The display module does not receive the signal from any transmitter module for more than 9 minutes.

Warning method: The tire light flashes and the digital display module displays E2.



5. Display module abnormality warning mode: When an abnormality occurs in the internal IC setting of the display module.

Warning method: The digital display module displays E1.



WT01 Transmitter ID pairing and replacement settings

Press the " SET " key at the same time After pressing the " MODE " key for more than 3 seconds, the system will enter the transmitter ID pairing setting. At this time, pressing the MODE key again will enter the transmitter replacement setting. If the MODE key is pressed again (MODE) The system will exit the wheel changing mode and return to the normal working mode.

Note: When performing transmitter ID pairing , please first remove the transmitter to be paired from the valve to facilitate subsequent pairing operations.

Transmitter ID pairing settings

a. After entering the setting , the number "1" will be displayed on the right side of the receiver screen , and the right front tire symbol will flash . According to the position where the tire symbol flashes on the display, lock the transmitter module of the wheel on the tire valve of the wheel. When you hear After a "beep", the transmitter module learning for this round is completed. After the learning is completed, the tire symbol will always light up and automatically jump to the next round of position learning. According to the instructions of the tire flashing symbol, the transmitter at the corresponding position will be sequenced. The module is locked on the corresponding tire valve to complete the pairing setting. If the transmitter of this wheel does not need to be re-paired, short press the setting button (SET) and the system will skip the pairing of this wheel and jump to the next round. After completing the settings, the system will exit the setting mode and return to the normal working mode. The display process is as follows:





Transmitter replacement settings

entering the setting , the number "2" will be displayed on the right side of the receiver screen , and the right front tire symbol will flash . Short press the **SET button (SET)** to choose to change the tire position of the new transmitter. After selecting the tire position, the wheel's transmitter will be The transmitter module is locked on the tire valve of the wheel . After hearing a " beep " , the transmitter module replacement setting of the wheel is completed. The system will exit the setting mode and return to the normal working mode, using the left front wheel to transmit. Taking device replacement as an example, the monitor display process is as follows:

