

## 1. GRAPHIC USER INTERFACE DESCRIPTION

Monitor status

- : Normal
- : Low pressure alert
- : High pressure alert
- : High temperature alert
- : Tire abnormal vibration
- : Learning mode

Pressure measuring unit

- : PSI
- : BAR
- : KPA
- : Kg/Cm<sup>2</sup>
- : °C
- : °F

Sensor status

- : Monitor reset, but not updated
- : Data received
- : Abnormal tire
- : Data not received

Car battery condition (Car battery cable)

- : Car battery under normal condition
- : Car battery power insufficient

Monitor battery status (AAA battery)

- No icon : Normal
- : Low battery

This TPVMS except tire pressure, temperature detection, also with the tire abnormal vibration detection function, which may reconnaissance vehicle tires other abnormal phenomena, can also become a tool for more warning function.

Display description :

Learn : collecting vehicle vibration parameters

GOOD : A vehicle without abnormal vibration

Alarm : A tire abnormal vibration

This number is by vehicle vibration parameters calibrated for alarm warning

This parameter number represents when the vehicle is moving and repeatedly detect vibrations

: Set Vibration

In the tire vibration setting mode selectable sensitivity settings and tire re-calibration settings, users are free to select the sensitivity.

Sensitivity: sensitivity is divided into 0-7 level, level 0 is off, the greater the level of sensitivity of the more sensitive. The higher the sensitivity adjustment may be vulnerable due to the rugged pavement caused by abnormal vibration alert is triggered.

Reset: four tires reassess the vibration of the vehicle and began collecting four vibration analysis parameters. When the sensor after disassembly, tire change a wheel or other movement strongly recommend you to use this function to re-calibrate.

This feature requires a second source of power supply.

This product contains Lithium Button Batteries.

## 2. OPERATING INSTRUCTIONS

※ Operation when car is stopped ※

When press the upper button for about three seconds, the TFT monitor will show setting mode. There are six main selections can be choose as Alarm setting, Measurement setting, New sensor setting, Set other, Wheel position change, Set vibration. Under this mode, the lower button is the select button , the upper button is the quit button . When press the lower button for three seconds is the confirm button . If in setting mode idle for 15 seconds will change to normal display mode.

Setting mode

- : Quit : Press the upper button once
- : Select : Press the lower button once
- : Confirm : Press the lower button for 3 seconds

: Set Threshold Of Tires

The warning range of pressure and temperature for front and rear wheel can be set separately. In this feature, click upper button is the exit key, click the lower button is to increase the warning range, when holding the upper button and press the lower button is to decrease the warning range. After setting complete press the upper key to exit.

- : Low Pressure Setting. Default value=26PSI.
- : High Pressure Setting. Default value=45PSI.
- : Max Temperature Setting. Default value=70°C.

## 3. STANDBY MODE

After turn on, if more than 30 seconds don't press any button, monitor will automatically enter standby mode. In this mode, screen didn't display any information, but still continue receive information. Therefore, power consumption is very minimal, can improve battery life. To trigger the monitor, press any button. Under this mode, if the tire pressure alarm occurs, monitor will active from energy saving mode and displays the abnormal on the screen. (If use external power supply will maintaining display state, doesn't enter standby mode.)

Under the standby mode there is no tire abnormal vibration detection.

Standby mode

Press any button

**WARNING: KEEP BATTERIES OUT OF REACH OF CHILDREN**  
Swallowing may lead to serious injury in as little as 2 hours or death due to chemical burns and potential perforation of the oesophagus.



If you suspect your child has swallowed or placed a button battery inside any part of the body seek medical advice immediately.  
**Australia Poisons Hotline: 13 11 26**  
**New Zealand Poisons Hotline: 0800 POISON (0800 764 766)**

## 4. ABNORMAL SITUATION

A. When the tire pressure or temperature exceeds a set value, the receiver will show the alarm diagram and repeat the alarm sound 10 times. When pressure or temperature returns to within the standard values, warning display clears the screen and return to the normal pressure display.

Tire pressure under low warning range

Tire pressure over high warning range

Tire temperature over the safety setting range

B. Abnormal tire vibration warning

If the device display abnormal vibration alert, it is recommended to check the particular tire for abnormal issue, such as rim deformation, deformation or fetal skin peeling on the tire, or by the sensitivity setting function will adjust sensitivity low, and then observe whether there is a more serious abnormal condition occurred ; or may be re-calibrated by a calibration function, and then continuously monitors the condition of the wheels of the vehicle again.

\*When the tire abnormal alarm is on, press the down button to stop the warning tone.

Strongly suggest that as long as tire warning is on, check tire situation first to ensure safety.

: Set Other

Under the system settings mode selectable language settings and battery settings can be select by users.  
This unit provides multilingual for user to select.  
This unit feature two battery settings - Save Mode, 24H Trace Mode.  
Save Mode: when the vehicle is in parking position for over 20 minutes, the unit will directly into the sleep mode, no longer be monitored in order to extend battery life.  
24H Trace Mode: will continue to monitor the vehicle in parking position, in order to obtain the latest tire information.

Set Language

Battery Consum.

: Change Position Of Tires

The wheel position switching functions is available to the user when the tire position is change, the sensor can be change to the opposite position. When entering the wheel position switching function can be used to select the correct wheel position, or press the OK button after departure. ( A total of 24 kinds of wheel positions can be select from )

- : Red means "Front Left Tire"
- : Green means "Rear Left Tire"
- : Yellow means "Front Right Tire"
- : Blue means "Rear Right Tire"

C. Monitor runs out of power

Battery power in monitor will decrease by daily operation and when power level is lower to some extent, battery low indicator in TFT monitor will appear to remind driver of time to replace battery. Please change monitor battery as early as possible to make sure system function well.

D. Car battery running low

When using the DC power from car to supply receiver power, if the car battery power is less than 10.5V, the receiver will display in red letter.

E. Sensor runs out of battery sensor power shortages

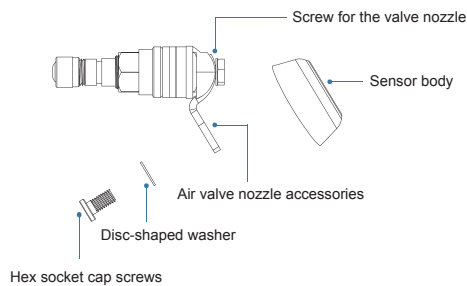
Sensors for the electronic detection devices, requires the use of power-driven functions, and lithium batteries have power to limit the use of its stockpile, because the sensor battery will reduced gradually, if the sensor battery is running low then the low sensor battery will appears in figure shows, please replace the new sensor, in order to collect accurate tire information.

Monitor runs out of power

Car battery running low

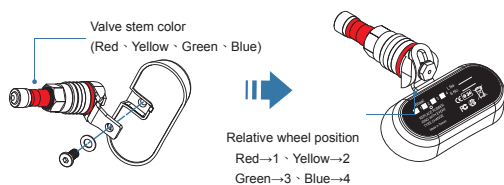
Sensor runs out of battery

## 5. THE INSTALLATION OF INTERNAL SENSORS



Insert disc-shaped washer into the hex socket cap screws, then assemble the valve nozzle with sensor body and tight it with hex key.  
(Recommended torque is around 1.7N · m)

After complete installation, please make sure the Hex socket cap screws is tight.

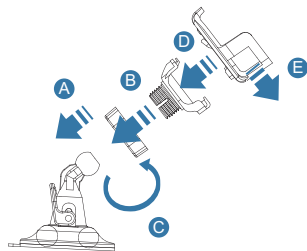


⚠ Please verify the internal type sensor position and the valve stem color to avoid Mistransplant.

## 7. TFT MONITOR BRACKET INSTALLATION

- Place the fixed lock ring under bracket stand.
- Insert the holder arm base on top of the plastic ball base.
- Adjust the proper position and tighten the fixed lock ring.
- Place the mortise of holder arm base into the slot of monitor of holder.
- Press the monitor holder until heard click sound.

Items	Content
Monitor holder	
Suction cup bracket holder	
Holder arm base	
Fixed lock ring	



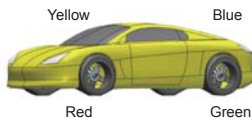
Note:

- \* Before fix bracket, chosen flat and clean surface is necessarily for better hold of bracket.
- \* To keep the screen clean, don't touch the surface. Handle the display unit by its edge.
- \* Be careful not to splash juice or other soft drinks onto the TFT monitor.
- \* Monitor should keep standing-up vertically. Up side down or lay down monitor could lead to dysfunction.

You can choose to use battery power or connect cigarette power cord to your car.

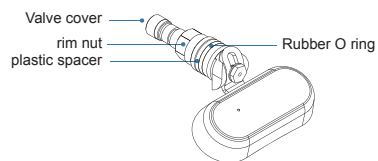
As each sensor has its own position and color, you have to make sure its pre-set position. Every sensors have own positions and sensors map could give guidance for user to install.

Red means " Front Left Tire ".  
Yellow means " Front Right Tire ".  
Green means " Rear Left Tire ".  
Blue means " Rear Right Tire ".

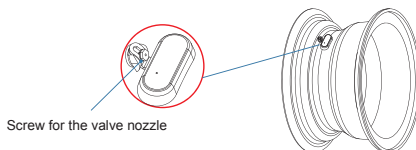


## 6. THE INSTALLATION OF INTERNAL SENSORS

- Disassemble the wheel from the car.
- Deflate the disassembled wheel.
- Use tire changer to take apart the tire and rim.
- Take out the old valve from rim.
- Screw off the Valve cover, rim nut, plastic spacer and Rubber O ring on the sensor.



- Use a open-end 7mm wrench to loose the valve nozzle screws, and then follow the instruction photo below to insert the sensor to a proper location on the rim, and adjusted to the proper angle, and then tighten the valve screw. (Recommended torque is around 1.7N · m)



After complete installation, please make sure the screw for the valve nozzle is tight.

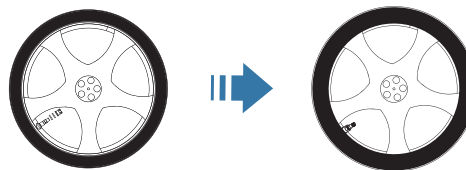
## 8. PRECAUTIONS

- Please choose the installation location carefully so that the TFT monitor will not interfere driver is on the road.
  - When read through tire pressure figures from TFT monitor, please precaution about driving safety.
  - Please double confirm if sensors are fitted tightly. If necessary, please spreading soap water on the valve stem to check any air leakage.
  - If tire pressure is getting down or dropping quickly, please stop car immediately to find out if tire is deflated or another other problem is happening.
  - Please do not operate this device while you're driving.
- G. Tire abnormal detect function
- To operate with this function a straight power supply is a must have for the monitor, in order to maintain the correct instant detection.
  - All vibration parameter data display on the monitor is for reference analysis, and with the different type of vehicles may have different parameter data on the road environment factors .
  - After sensor disassembly, tire change or other movement on the wheel strongly recommend you to use the re-calibration function calibration.
  - This function is designed to monitor and detect tire conditions, there is no guarantee that the installation of this product will be able to prevent all situation ; in addition, due to road conditions and driving habits, there may not be able to detect and respond.
  - This function is for driving safety aids only.

## 9. TROUBLE SHOOTING

- Indications disappear from / do not appear in the display
  - Please make sure if monitor has battery inserted.
  - Be sure to observe the correct polarity when installing the batteries.
  - Please make sure if battery has no power after use for a long time. Battery could run out of power and we suggest to replace with new battery.
  - Confirm whether the device is in standby mode, this mode is to restart automatically from energy saving mode, the energy saving mode is to minimal the power consumption of device, the user can press any button to trigger the device and turn on the device back to normal display.
  - If you use power cord, make sure if it is disconnected.

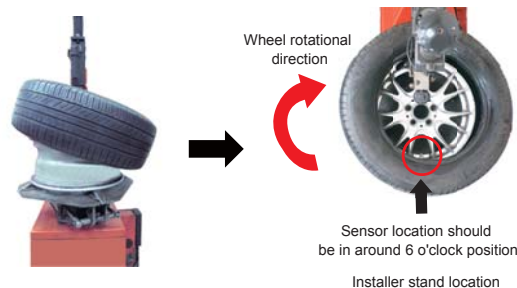
- Fix the sensor on the rim by screwing the rim nut onto the sensor.  
Do not use destructive force to fix the rim nut for protection from damage.  
(Never use excessive force to avoid damage to the sensor recommended torque is around 0.9N · m)



- Install the tire on the rim steps are as following

Precaution: avoid the tire bead touching the sensor.

- Place the sensor on tyre remover machine and to adjust the position of the rotating platform on the 6 o'clock position then install the tire properly in clock wise direction. As the picture shown.



- No connection between sensors and monitor

- Please make sure if sensors are in a configured distance. This system, should be applied in passenger car. If installed in other kind of vehicle, the system doesn't guarantee its functionality.
  - Battery has no power after use for a long time. Battery could run out of power and we suggest to replace with new sensor.
  - Please make sure if your sensor has mixed with other systems'. As each sensor has its unique identified number and monitor can only receive pre-loaded identified number and cannot accept other new identified number.
- When the low battery symbols appear on the monitor if the user continuous to operate may caused the monitor abnormal, the user can simply replacing new battery on the monitor and resume normal again.
  - Monitor in the 'standby mode'  
Temporarily park car or drive car in a stable speed, which could let monitor get into 'standby mode'. It is a special design for power-saving purpose. You can press any button to wake it up.
  - Monitor falling from the windshield
    - Please make sure the surface of glass is clean and flat to give the best fitness to monitor bracket. Otherwise, the monitor could drop off.
    - When user install the suction cup, please selected slippery surface for good contact point.
  - Many environmental factors cause tire pressure rise and down as well. For example, hot weather or warm tire will lead rising tire pressure.
  - The pressure differences between the front and rear  
Due to general vehicle engine location is in the front wheel, so during the driving process, the front wheel temperature is higher than the rear wheel, causing the front wheel pressure may be greater than the rear wheel PSI.
  - Sensor temperature difference  
Running engine, exposure under the sun, constant braking or near high temperature and other factors, can easily make sensor heat conditions inconsistent and cause the difference in temperature measurement.
- If these solutions do not help improve the situation, consult your nearest dealer.

- Refitting the tire bead, please place the sensor approximately 7 o'clock position as the picture shown.



- Use tire changer to fit the tire on the rim, then inflate the tire with standard tire pressure, so monitor will show the real time tire pressure value.
- Spray soap water around the valve stem area to check for air leakage.
- Make balancing testing and correcting for wheel on the balancing machine.

Note:

- It is necessary to ask for the assistance from a professional for the tire installation.
- It needs to adjust the tire position to fit or disassemble the tire, so that the sensor can be kept away from the running location of the tire changer to prevent any damages on the sensor.
- Every sensor has its separately specific marking for different tire position, please make sure to install the sensor to each tire in order.
- When batteries are exhausted soon, then level will be displayed on the TFT monitor.

When the sensor battery is low, the low sensor battery will appear on the screen, please replace new sensor immediately. The remove process are as follows:

- Remove the valve cap and air nozzle.
- The procedures to remove sensor unscrew the valve nut, then take off the plastic spacer and rubber o-ring before take off the sensor.
- After remove the tire and unload the sensor.

## 10. PRODUCT SPECIFICATION

Frequency	<input type="checkbox"/> 315MHz <input type="checkbox"/> 433.92MHz	
	Pressure range	0 ~ 60PSI
Pressure accuracy	±1PSI	
Temperature accuracy	±3℃	
Operating temperature	-40℃ ~ 125℃	
Battery life	5 years (depends on working hours per day)	
Dimensions	Length 60.4mm*Width 27.6mm*Height 11.7mm	
Weight	36.9g (±1)	
Angle adjustable valve stem	18° ~ 43°	
Operating voltage	3Volts DC (Battery) / 12Volts DC (External)	
Operating temperature	-20℃ ~ 80℃	
Battery life	3 months (depends on working hours per day)	
Dimensions	Length 70mm*Width 54.8mm*Height 24mm	
Weight	74g (±1)	

## 11. PRODUCT PACKAGE CONTENT

TFT monitor x1	Sensor body x4
AAA-1.5V battery x2	Air valve nozzle accessories x4
Cigarette power cord x1	Hex socket cap screws x4
User guide x1	Disc-shaped washer x4
	Hex key x1

Monitor holder x1  
Suction cup bracket holder x1  
Holder arm base x1  
Fixed lock ring x1

※Specifications are correct at time of publication. Subject to change without notice.