Xtruck

CAN Sensor Detector Operation Instruction

Type： Y006

We gain experience from CAN-busas well as nitrogen and oxygen sensor failure that often encountered by vehicle maintainer during the work, and finally developed this product.

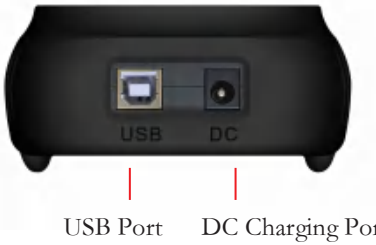
Theproductcanhelp maintainers quicklylocate the problems, whether CAN circuit defects ormoduledamaging(nitrogen and oxygen module).The test result is for reference only, not as the only standard for maintenance. We do not bear legal liability to any person for the test result.

Content

Product Appearance

1、Introduction of the Front of the Device

2、Introduction of the Bottom of the Device



3、Upper Port of the Device

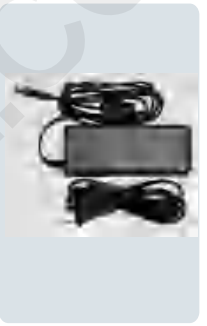
DB15 Port

4、Back of the Device

Serial number

Product configuration

1、Device*1



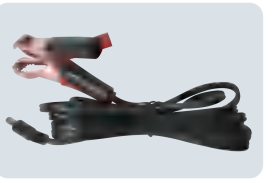
2、Power Adapter *1

3、Four in one Nitrogen and Oxygen Test line *1

4、Node jumper of nitrogen and oxygen tester*1

5、DB15 Main Test line*1

6、Device updateline*1



7、Battery clamp to DC extension cable*1

8、Exhaust Temperature Sensor Diagnosis Cable x1

9、PM Sensor Diagnosis Testing Cable x1

10、Urea Liquid Level, Testing Cable x1

Operating Instruction

1、Connection method between main test line and device.as shown on the right

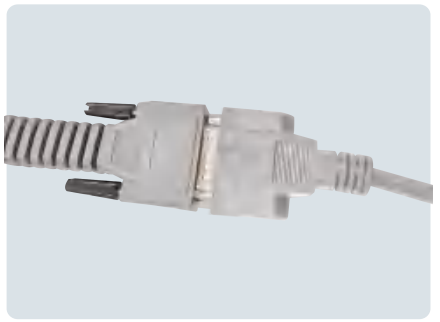
2、Press the power for 3 seconds to enter the menu, as shown on the right.

1、CAN-bus Node search

This function can help find thelost node through the OBD interface which can find device on the CAN bus.

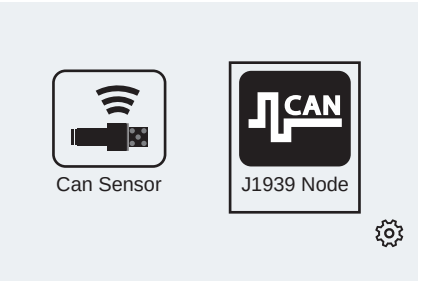
Step 1:

One end of the main test lineis connected to the device, and the other endis connected to the vehicle detection port OBD.

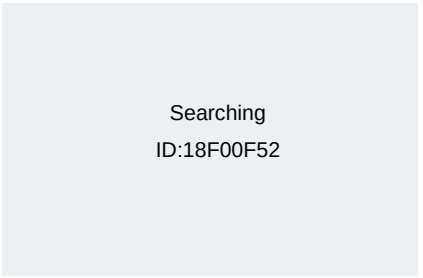


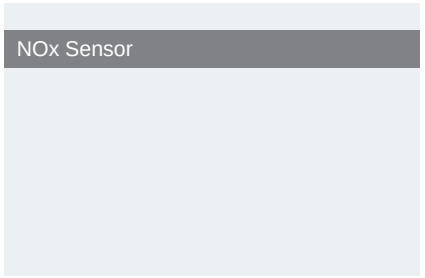
Step 2:

If the wiring harness is connected correctly, click the device CAN node to search automatically



● Wait for a few seconds, and the device will automatically search for the vehicle's fault-free CAN module.





2、Nitrogen and Oxygen Sensor Tester

Step 1:

One end of the main test line is connected to the device, and the other end is connected to the nitrogen and oxygen sensor.

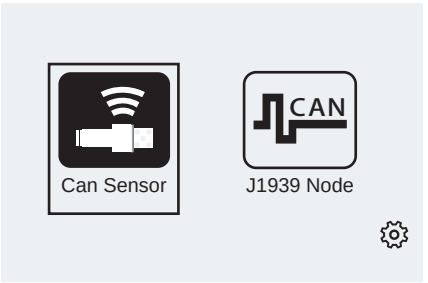
Step 2:

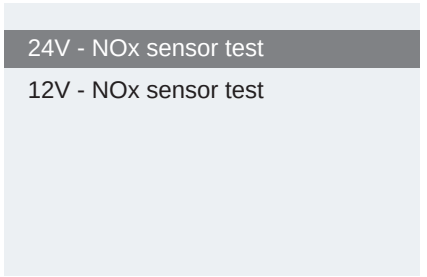
● Nitrogen and oxygen sensor heating

Note: The nitrogen and oxygen sensor itself needs to be heated to accurately measure the concentration of nitrogen and oxygen and oxygen concentration. It needs an external 24V power supply, or use the power of the 24V battery. If do not follow the standard steps, it may cause damage to the device and vehicles, and the company does not bear any legal liability.

Step 3:

Connect the nitrogen and oxygen sensor, and click the NOx sensor test, choose 24V or 12V NOx sensor test.





Note:

Please confirm that the power supply of the nitrogen and oxygen sensor is 24V/12V, the wrong selection will damage the nitrogen and oxygen sensor.

Tip

Please confirm again whether the sensor to be measured is 24v!

Step 4: Select the corresponding model

Method 1: Select "automatic identification test", the machine will automatically identify the model according to the nitrogen and oxygen sensor.(This data only provides reference for maintenance personnel, not as the sole criterion for maintenance.

Automatic identification test

Manual identification test

Automatic identification.....

Method 2: Select "Manualidentification test", and manually select the corresponding test program according to the different types of nitrogen and oxygen sensors

Front 24V-NOx sensor

Rear 24V-NOx sensor

VOLVO 24V-NOx sensor

BENZ front 24V-NOx sensor

BENZ rear 24V-NOx sensor

SCANIA 24V-NOx sensor

If the CAN line is not properly connected, or there is a problem with the nitrogen andoxygen sensor, the CAN signal can not be found.

Tip

No CAN signal, Please confirm whether the NOx Sensor is connected

Step 5:

When the connection is complete, click the Go button, and then enter the test of the nitrogen andoxygen sensor. After 300 seconds, the nitrogen and oxygen concentration and oxygen concentration will be displayed. If the nitrogen and oxygen sensor is damaged, the machine will report the corresponding fault code.

Vout	24.0V	Iout	752mA
O_2	/%	State	invalid
NO_2	/ppm	State	invalid
Please wait... 6s/300s		Heat State: heating	

Vout	24.0V	Iout	527mA
O_2	19.9%	State	valid
NO_2	11.6ppm	State	valid
Test report NOx sensor is working properly			

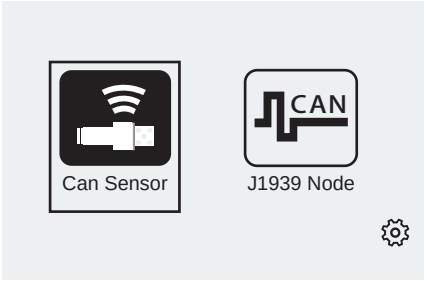
3、Temperature Module Diagnosis

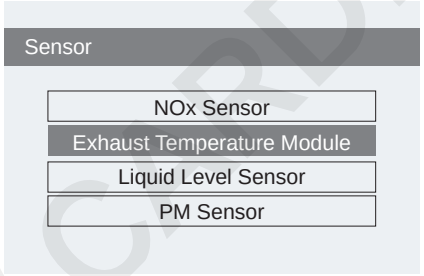
Firstly:

Connect the main testing cable with the main unit, another end connects to the temperature module testing cable (the harness has dedicated labels such as 2-wire, 3-wire exhaust temperature sensor, 4-wire exhaust temperature sensor, etc.)

Secondly:

Click Sensor Testing and select "Temperature Module Diagnosis".

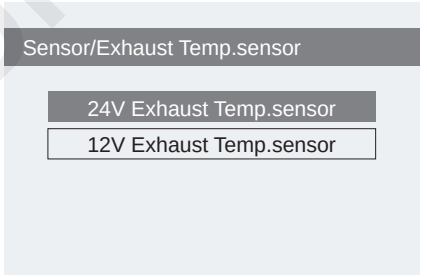




Thirdly

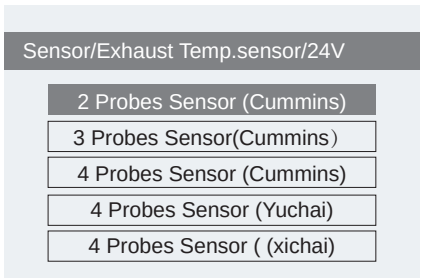
Connect the Exhaust Temperature Sensor Diagnosis, select the 24V or 12V Temperature module.

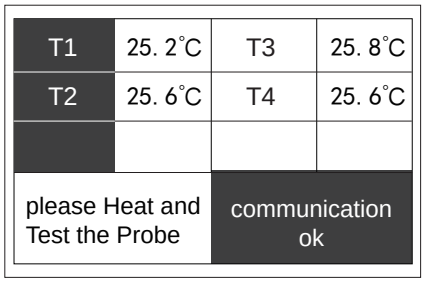
Notes: Please confirm that the exhaust temperature sensor is supplied with 24V/12V power. Choosing the wrong voltage could potentially damage the exhaust temperature sensor



Fourthly:

Click and enter Click to enter the exhaust temperature sensor test. Choose the corresponding exhaust temperature sensor (taking the 2-wire and 3-wire exhaust temperature sensor as an example). Choosing the wrong sensor will prompt a message 'No CAN signal received or temperature module damaged'. With the harness properly connected, the temperatures of each exhaust temperature sensor will be displayed after 10 seconds.





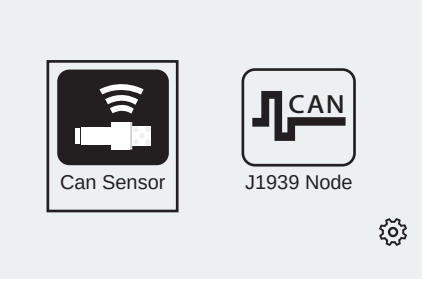
4、Liquid Level Sensor Diagnosis

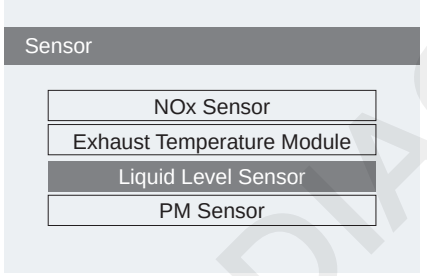
Diagnosis

The main diagnosis cable connects to the main unit, and the other end connects to the liquid level sensor testing cable.

Secondly:

Click on Sensor Detection, then select “Liquid Level Sensor Diagnosis”.





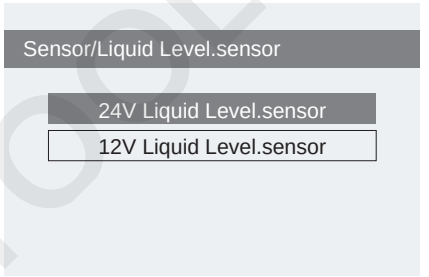
Thirdly:

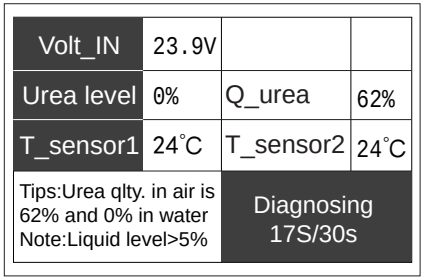
Select the dedicated harness for liquid level, connect the liquid level sensor. The harness has dedicated labels, such as Flat 4 Urea Liquid Level (FAW) and Flat 4 Urea Liquid Level (Cummins) .

Fourthly:

Select 24V or 12V Liquid Level Sensor.

Notes: Please confirm that the liquid level sensor is supplied with 24V/12V power. Choosing the wrong voltage could potentially damage the liquid level sensor.Click to enter the liquid level sensor test. If connected incorrectly, the machine will display a message “No CAN signal received or liquid level sensor damaged”. With the harness properly connected, the liquid level, quantity, and temperature of the liquid level sensor will be displayed after 10 seconds.





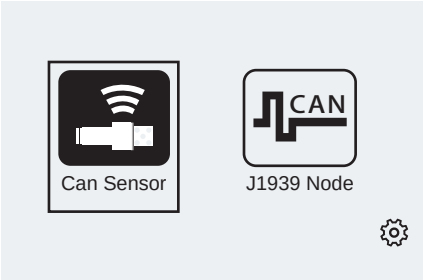
5、PM Sensor Diagnosis

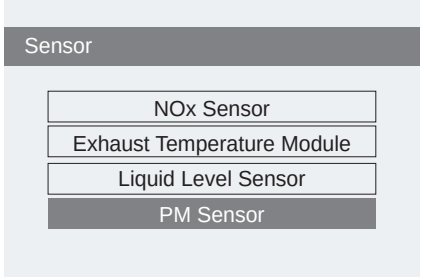
Firstly:

The main testing cable connects to the main unit, and the other end connects to the PM sensor diagnosis cable

Secondly:

Click on Sensor Detection, then select "PM Sensor Diagnosis".





Thirdly:

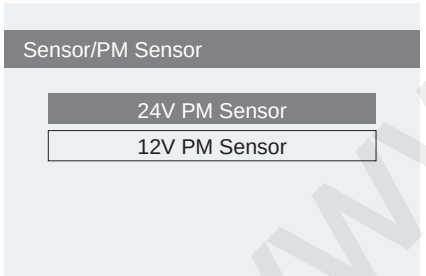
Select the PM harness (the harness has a dedicated PM sensor label) , and connect the PM sensor.

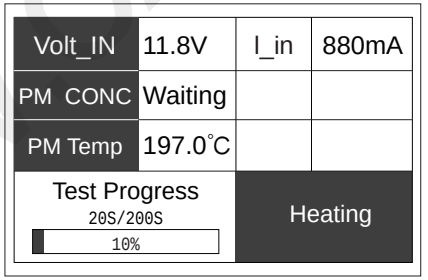
Fourthly:

Select 24V or 12V PM Sensor.

Notes: Please confirm that the PM sensor is supplied with 24V/12V power. Choosing the wrong voltage could potentially damage the PM sensor.

Click to enter the PM sensor diagnosis. If selected incorrectly, the machine will display a message 'No CAN signal received or PM sensor damaged'. With the harness properly connected, the concentration and temperature of the PM sensor will be displayed after 400 seconds.





6、Product Software Upgrade

Step 1：Connect the device and update the program

1、Please connect the device to the computer through USB interface, as shown below:

After successful connection, press “return” button to enter the update mode. Ifthe screen displays "Update mode", it means that it has successfully entered the update mode (as shown in Figure 2).

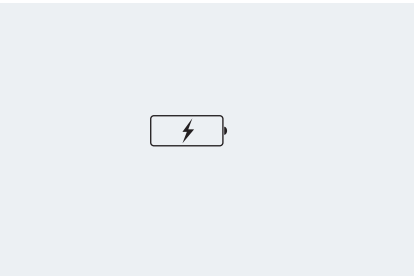
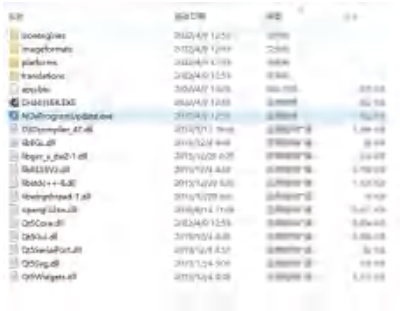


Figure 1

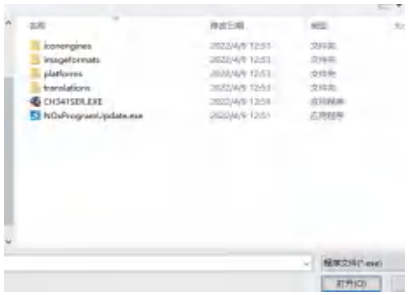
Figure 2

Step 2: Install the CH340serial driver

Open the CyberPower Disc Creator of Nitrogen and Oxygen sensor program, click NOxProgramUpdate.



Find the file directory and click the SETUP.EXE file below, just as shown below:

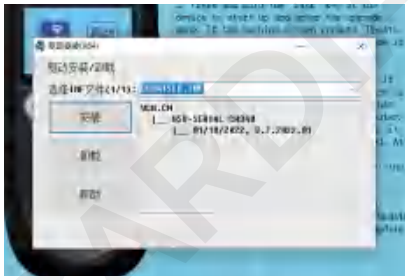


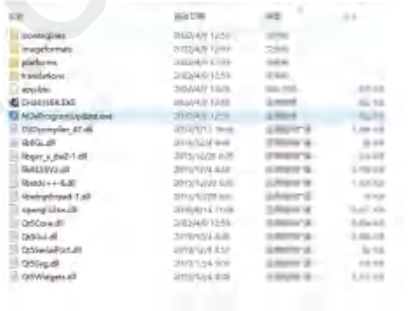
NOxProgramUpdate

Re-open theCyberPower Disc Creator “NOxProgramUpdate” of the nitrogen and oxygen sensorprogram.

Install the CH340 driver, just as shown below:

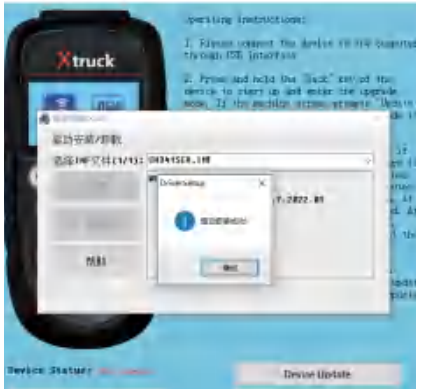
Click the Install button, the interface as shown in the figure will pop up, and just wait for the installation.





If the connection status shows connected (as shown below), click the button to update the main program.

Wait for the update, if the following pop-up window is displayed, it means that the program update is successful.



7、 Setting

System information

Can view the software version, hardware version, and software version.

Software center Version:V01.01
Hardware_Version V1
Release date:22.02.22.20:00