Air Quality Monitor Instruction Manual



24-05-V4-72B WiFi

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Product Description

This product is an advanced multifunctional air quality monitor that combines various high-quality air sensors with a built-in fan to provide real-time monitoring of Carbon Dioxide (CO2), Particulate Matter (PM2.5/1.0/10), Formaldehyde (HCHO), Total Volatile Organic Compounds (TVOC), Temperature, and Humidity with time on its digital LCD display. It not only measures various air quality datas in real time, but also supports intelligent connection and convenient operation through Tuya WiFi. After connecting your phone, you can view real-time data, analysis and anywhere, making you familiar with the air quality around you.

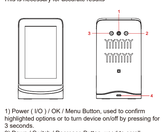


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Instructions

1. Start Up

When you long-press the center power button, the air quality monitor will boot up. Defective will proceed through its warm-up sequence for about 3 minutes to allow sensors to preheat and fan to draw in fresh ambient air. This is necessary for accurate results



1) Power (I/O) / OK / Menu Button, used to confirm highlighted options or to turn device on/off by pressing for 3 seconds
2) Down / Switch / Decrease Button, used to scroll between interfaces
3) Up / Switch / Increase Button, used to scroll between interfaces
4) Micro USB charging Port

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2. Switching Among Data Display Formats (Figure 1-5)

Press the up or down buttons to switch among data display formats (figures 1-5) that displays air quality readings in various formats:



Figure 1 Figure 2

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3.Setting (Figure 6)

Double Press center I/O button to enter the Time Setting screen.



Figure 6

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Figure 3 Figure 4 Figure 5

DATE: Change the date by using the up and down button. Confirm each setting with one press on the on/off button.

TIME: Change the time by using the up and down button and by confirming with the on/off button

UNIT: Change the temperature unit between Celcius (°c) or Fahrenheit (°F).

Buzzer: can turn on/off alarm sound. (If Buzzer is on, and CO2 value more than 1200 ppm and keep rising, would beep alarm sound.)

Temperature Numerical Compensation Settings

Temperature compensation is used to compensate for errors in the measurement process.
You can set it to: -5, -4, -3, -2, -1, 0, 1, 2, 3, 4, 5.

4. About Charging

When low battery icon is displayed, the device needs to be charged. Insert the included or another compatible micro USB charging cable into the device. Attach the other end to a USB DC charger (such as a smart phone charger) that outputs DC 5V at >=1000mA. Fully charge for at least 2-3 hours before use. Avoid charging with a USB computer port which only outputs 500mA.

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5. History (Figure 3,Figure 5)

Graph shows the last 5 data values for PM2.5, CO2 and taken every 10 minutes over the previous 50 minutes.



Figure 3 Figure 5

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Air Quality Standard

CO2 Standard Reference Table :

	Air Quality Level	CO2 Average Standard Value (ppm)
CO2	Good-Green	400-799
	Slight-Yellow	800-1199
	Moderate-Red	1200-1999
	Serious-Purple	2000-5000

Note1: The default alarm threshold for CO2 is 1200ppm. When it reaches 1200ppm, the device will sound.
Note2: The AQI Level is taken as the maximum value of CO2.

PM2.5 Standard Reference Table :

	Air Quality Level	PM2.5 Average Standard Value (ug/m³)
PM2.5	Excellent	0-35
	Good	36-75
	Light Pollution	76-115
	Moderate Pollution	116-150
	Heavy Pollution	151-250
	Serious Pollution	>251

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HCHO(Formaldehyde) Standard Reference Table :

	Air Quality Level	HCHO Average Standard Value (ug/m³)
HCHO (Formaldehyde)	Safety	+0.100
	Slight Pollution	0.101-0.200
	Moderate Pollution	0.201-0.300
	Heavy Pollution	>0.301

TVOC Standard Reference Table :

	Air Quality Level	TVOC Average Standard Value (ug/m³)
TVOC	Safety	< 0.600
	Exceeding the standard can cause respiratory system abnormal, inflamed, cancerous, etc	> 0.601

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Tips

Tip 1: Strange Readings? Do This:

1. Turn the device off for some time and then turn it back on again effectively allowing the monitor to reset. After continuous use for extended periods, the device may simply need to be reset.
2. Open a window or bring the device outdoors to allow the sensor to exhaust any accumulated fumes and to allow the readings to adjust back down to more normal levels.

Tip 2: Not Using It? Turn It Off!

For the most consistently accurate readings and longest product life, it is recommended to turn the monitor off while it is not in use. This will preserve the battery, sensor, and fan.

Tip 3: Open a Window:

Often the quickest and most practical way to get readings back into the desired range is to simply open a window to ventilate more clean outdoor air into your home. This obviously does not apply if you are located in a Wildfire area or any other area with compromised outdoor air quality.

Tip 4: Cooking Impacts Air Quality:

Cooking often releases increased amounts of unhealthy pollutants into the air including but not limited to CO2, PM2.5 and 10, and VOCs. Furthermore, how and what you cook determine the types of pollutants which will be released into the air.

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Considerations & Precautions

- **Sampling Frequency:**

The sampling frequency of the monitor is 1.5 seconds. This means that your monitor is providing you with updated readings every 1-2 seconds. Please note that, in order to provide consistently-updated, real-time readings, it contains a continuously running mini fan which gives off a very slight buzzing sound.

- Upon turning off the monitor, you will see a brief " Power Off " appear on the screen. This is normal. This is not an error message.

- This air monitor should be used indoors and kept dry at all times. It is strongly recommended to store in a cool, dry place.

- **DO NOT** expose to sunlight or use in an extremely polluted, dusty, or smoky environment for prolonged periods as doing so may damage the sensors over time.

- **DO NOT** cover the air intake areas during use to avoid inaccurate measurements.

- **DO NOT** use chemicals or solvents to clean the product as residual fumes will skew air quality readings.

- **DO NOT** put water or other liquids on or near the product to avoid electrical damage.

- **DO NOT** allow unauthorized modification or repair of this product.

- **DO NOT** take apart or disassemble this monitor. Doing so may damage the product and will invalidate the warranty.

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Product Specifications

Item	Air Quality Monitor
Product Size	145 x 74 x 97.2mm
Product Weight	229g
Display Method	LCD Screen
Measuring Item	CO2, PM2.5, PM10, PM1.0, AQI, HCHO (Formaldehyde), TVOC, Temperature, Humidity
Detection method for CO2	Infrared (NDIR)
Detection method for PM	Laser Scattering
Detection method for HCHO	Electrochemistry
Detection method for TVOC	Semiconductor
Concentration unit for CO2	ppm
Concentration unit for PM	ug / m³
Concentration unit for HCHO and TVOC	mg / m³
CO2 measuring range	400-5000 ppm
PM measuring range	0-999 ug / m³
HCHO measuring range	0.001 - 1.999 mg / m³
TVOC measuring range	0.001 - 9.999 mg / m³
Atmospheric Pressure	12.5 PSI - 15.4 PSI
Sampling Time	1.5 Seconds
Temperature Range	-10°C - 60°C (14°F - 122°F)
Storage Temperature	-10°C - 60°C (14°F - 140°F)
Relative Humidity	20%-85%
Humidity Range	20%-85%
Power Source	3000 mAh Rechargeable Lithium battery 5V DC Power Charging via USB Port

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Warning:

While this product can reduce your risk of harm by increasing your awareness of air quality, it can in no way guarantee your health or safety. Please instead take a comprehensive approach to living healthy and do not depend on this monitor alone to improve your health or save your life.

Legal Disclaimer

The use or misuse of this monitor is conditioned upon the user's agreement that in no event shall the manufacturer, importer, reseller, or distributor of this monitor be liable for any direct, indirect, punitive, incidental, special consequential damages, to property or life, whatsoever arising out of or connected with the use of this monitor.

Product List

Air Quality Monitor	x 1
USB Charging Cable	x 1
Product Manual	x 1

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How to connect your device to an Android or Apple IOS smartphone Via Tuya Smart App

1. Download and install the Tuya Smart App through the Google Play Store or Apple App Store, or scan the QR code. (Picture 1) . To download the Tuya APP, then registration and login it.

2. Turn on the air quality monitor by long pressing the center button.

3. Connect your phone to a WiFi network and open the Tuya Smart App.

4. Select Add Device, then Click the scan icon in the upper right corner of Tuya Interface (Picture 2), and scan the QR code (Picture 3) to connect and follow the instructions of Tuya Interface.



Picture 1



Picture 2

Picture 3

Picture 4

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