

IT7070E

Suzhou Inovance Technology Co. IT7070E Operator Interface Module User Manual

Model: IT7070E

1. INTRODUCTION

This manual provides comprehensive instructions for the installation, operation, and maintenance of the Suzhou Inovance Technology Co. IT7070E Operator Interface Module. Please read this manual thoroughly before using the device to ensure proper functionality and safety. The IT7070E is designed to provide a reliable and efficient human-machine interface for various industrial applications.

2. SAFETY INFORMATION

Adherence to the following safety precautions is crucial for preventing injury and damage to the device.

- Ensure the power supply matches the specified voltage (DC 24V).
- Do not operate the module outside its specified operating temperature range (-10°C to 55°C).
- Disconnect power before performing any installation, maintenance, or troubleshooting.
- Only qualified personnel should perform installation and wiring.
- Avoid exposing the module to excessive moisture, dust, or corrosive environments.
- Do not attempt to disassemble or modify the module. Refer all servicing to authorized personnel.

3. PRODUCT OVERVIEW

The IT7070E Operator Interface Module features a display screen and various input/output ports for connectivity. Understanding its components is essential for effective use.



Figure 3.1: Front view of the IT7070E module, showing the display screen and the "INOVANCE" branding at the bottom.



Figure 3.2: Rear view of the IT7070E module, displaying connection ports including a green terminal block, a D-sub connector, an Ethernet port, and USB ports.

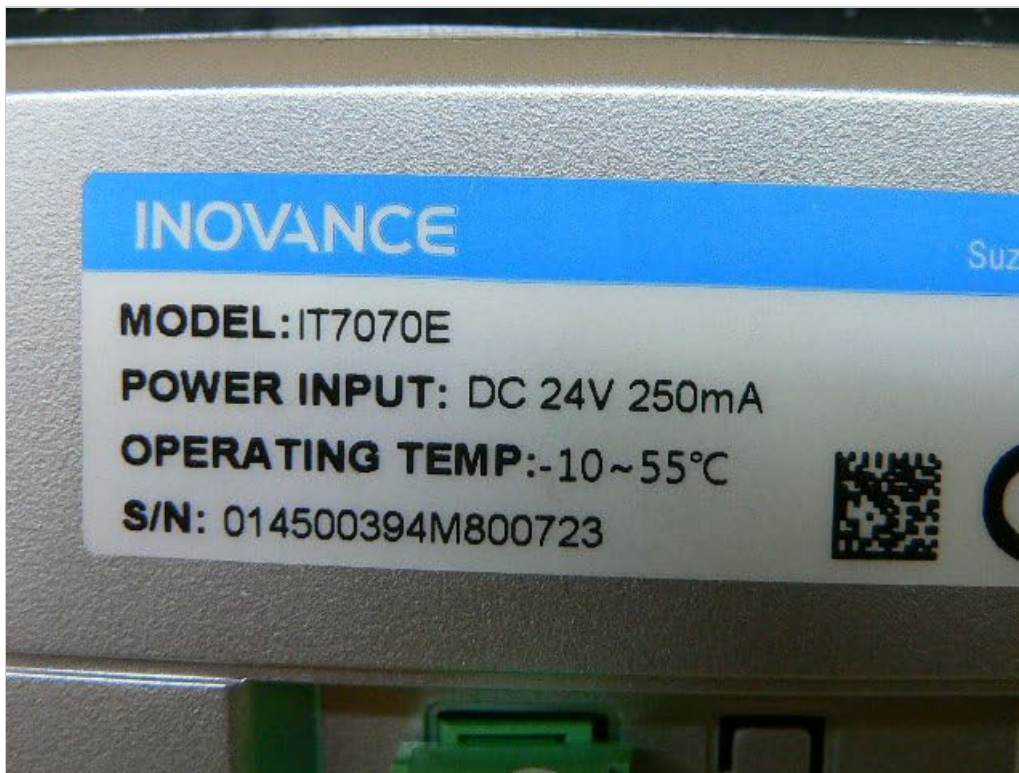


Figure 3.3: Close-up of the product label, detailing the model number (IT7070E), power input (DC 24V 250mA), operating temperature (-10~55°C), and serial number.

3.1 Key Components

- **Display Screen:** Primary interface for visual feedback and interaction.
- **Power Input Terminal:** Green terminal block for DC 24V power connection.
- **Serial Port (DB9):** For communication with external devices.
- **Ethernet Port:** For network connectivity.
- **USB Ports:** For connecting peripherals or data transfer.

4. SETUP AND INSTALLATION

Follow these steps for proper installation of the IT7070E module.

1. **Mounting:** Securely mount the module in a suitable enclosure or panel, ensuring adequate ventilation and protection from environmental factors. Refer to the product's mechanical drawings for precise cutout dimensions.
2. **Power Connection:** Connect a stable DC 24V power supply to the designated green terminal block on the rear of the module. Ensure correct polarity.
3. **Communication Wiring:**
 - *Ethernet:* Connect an Ethernet cable to the RJ45 port for network communication.
 - *Serial:* Connect the appropriate serial cable to the DB9 port for serial communication with PLCs or other devices.
 - *USB:* Connect USB devices as required for data transfer or peripheral use.
4. **Grounding:** Ensure the module is properly grounded to prevent electrical interference and ensure safety.
5. **Initial Power-Up:** After all connections are secure, apply power to the module. The display should illuminate, indicating successful power-up.

5. OPERATING INSTRUCTIONS

The IT7070E operates as a human-machine interface, displaying information and accepting user input via its touch screen.

5.1 Basic Operation

- **Power On/Off:** The module powers on automatically when DC 24V is supplied. To power off, disconnect the power supply.
- **Touch Screen Interaction:** Navigate menus and input data by touching the screen. Use light, firm touches.
- **Software Interface:** The specific functions and screens displayed are determined by the application software loaded onto the module. Refer to the software documentation for detailed operational procedures.

5.2 Configuration

Configuration of the IT7070E typically involves using a dedicated software tool on a PC to create and upload HMI projects. This includes setting up communication protocols, designing user interfaces, and defining data tags.

- Connect the module to a PC via Ethernet or USB.
- Launch the Inovance HMI programming software.
- Create or open an existing project.
- Configure communication settings to match the connected PLC or device.
- Download the compiled project to the IT7070E module.

6. MAINTENANCE

Regular maintenance ensures the longevity and optimal performance of your IT7070E module.

- **Cleaning:**
 - *Screen:* Use a soft, lint-free cloth slightly dampened with a non-abrasive, mild cleaner. Do not spray cleaner directly onto the screen.
 - *Casing:* Wipe the casing with a dry or slightly damp cloth. Avoid harsh chemicals.
- **Environmental Check:** Periodically inspect the installation environment to ensure it remains within the specified temperature and humidity ranges.
- **Connection Integrity:** Check all cable connections (power, Ethernet, serial, USB) periodically to ensure they are secure and free from damage.
- **Firmware Updates:** Check the manufacturer's website for any available firmware updates that may improve performance or add features. Follow update instructions carefully.

7. TROUBLESHOOTING

This section addresses common issues you might encounter with the IT7070E module.

Problem	Possible Cause	Solution
Module does not power on.	No power supply; incorrect voltage; faulty wiring.	Verify DC 24V power supply connection and voltage. Check wiring for shorts or disconnections.

Problem	Possible Cause	Solution
Display is blank or distorted.	Software issue; hardware malfunction; incorrect resolution setting.	Reboot the module. Re-download the HMI project. If problem persists, contact support.
Touch screen unresponsive.	Calibration issue; software freeze; physical damage.	Restart the module. Check for physical obstructions. If available, recalibrate the touch screen via system settings.
Communication error with PLC.	Incorrect communication settings; faulty cable; PLC not responding.	Verify communication protocol and parameters in HMI project. Check cable integrity. Ensure PLC is powered and operational.

If the problem persists after attempting these solutions, please contact technical support.

8. SPECIFICATIONS

Technical specifications for the Suzhou Inovance Technology Co. IT7070E Operator Interface Module.

Parameter	Value
Model	IT7070E
Power Input	DC 24V, 250mA
Operating Temperature	-10°C to 55°C (14°F to 131°F)
Product Dimensions (L x W x H)	7.87 x 6.3 x 8.27 inches
Weight	1.32 Pounds (approx. 0.6 kg)
Manufacturer	Generic (Suzhou Inovance Technology Co.)
ASIN	B0D383CSPD

9. WARRANTY AND SUPPORT

For warranty information and technical support, please refer to the official documentation provided with your purchase or visit the manufacturer's website. As this product is listed under a "Generic" brand, specific warranty details may vary based on the reseller or regional distributor.

For technical assistance, troubleshooting beyond this manual, or inquiries regarding repairs, please contact your supplier or the official Inovance support channels if available in your region.

- **Manufacturer:** Suzhou Inovance Technology Co., Ltd.
- **Product Model:** IT7070E
- **Serial Number:** (Refer to product label, e.g., 014500394M800723)



