SparkFun Thing Plus - ESP32 WROOM - with WiFi and Bluetooth communication - USB-C - SparkFun WRL-20168

Minicomputer User Manual

SPF-21962

SparkFun Thing Plus - ESP32 WROOM - with WiFi and Bluetooth communication - USB-C - SparkFun WRL-20168

1. Usage Information and Warnings

1. The device should operate in conditions consistent with its intended use.
2. Avoid improper connection of wires. Incorrect connection may lead to short circuits and damage to the equipment.
3. To ensure proper operation of the equipment, provide it with an appropriate power source according to its specifications.
4. Do not directly touch unprotected parts of the equipment, as this may lead to short circuits or the transfer of electrostatic charges.
5. Operating in high humidity environments can affect the operation of the electronics, leading to damage and errors in sensor readings.

2. Unpacking and Assembly

1. **Unpacking** - checking the completeness of the set and the condition of the elements.
2. **Connection** - plugging in the necessary elements to the minicomputer's connectors.
3. **Operating System** - uploading the operating system to the data carrier.
4. **Startup and Configuration** - configuring the minicomputer settings.

3. Intended Use

The product is intended for use within the parameter ranges specified by the manufacturer and should be used only by qualified personnel trained to operate this product. Before each use, check the product for damage and do not use it if any defects are found. Failure to follow the manufacturer's guidelines may cause potential product damage.

4. Technical Specification

Product code	SPF-21962
Weight:	0.008 kg
Dimensions	Width:5, Height:11, Depth:1 cm
UC - Microcontroller	ESP32-WROOM-32E
UC - Digital pins	21

UC - PWM	16
UC - analog in	13
UC - freq	240 MHz
UC - Flash	16 MB
UC - RAM	520 kB
UC - USB	USB C
UC - Core	Tensilica Xtensa LX6
UC - A/C	12-bit
UC - WiFi	yes
UC - Bluetooth	yes
UC - core	2. Dual Core
UC - Connector	USB typ C
UC - UART	yes
UC - I2C	yes
UC - SPI interface	yes
Niebezpieczne	Component

5. Contact Information

For product-related questions, please contact an authorized service center or the manufacturer:

- **Importer:** Botland. B. Derkacz Sp. K.
- **Address:** Gola 25, 63-640 Bralin
- **Phone Number:** 62 593 10 54
- **Website address:** www.botland.store