

Datasheet

Smart IoT Box

WI-IOTBOX01 | WI-IOTBOX02 | WI-IOTBOX03

Hardware: V3

New Upgrade: The new cooling duct design for more efficient cooling!



Overview

Wi-Tek's Smart IoT Box is an all-weather outdoor electrical equipment protection box designed for outdoor use in the outdoor environment. It has waterproof, dustproof, heat dissipation, anti-ultraviolet, anti-theft, anti-rust, acid and alkali corrosion, anti-electromagnetic interference (anti-lightning EMP), modular structure design in the box, electrical equipment can be installed vertically or horizontally according to the situation.

Fit outdoor CCTV, WLAN, Wi-Fi Coverage, Industrial IoT Application requirements with Wi-Tek industrial switch, 4G LTE router, outdoor wireless transmitter, solar powered PoE switch, IoT M2M gateway, and mesh AP, greatly decrease your project deployment cost by flexible modular installation.

Features

IP55 Ingress Protection

Outstanding dustproof and waterproof design protects the equipment inside the box in the outdoor.

Rugged construction

A seamless welding box body can withstand huge external forces without deformation.

Advanced Outdoor Protection

Made of aluminum alloy or stainless-steel connecting mounting parts, Electrostatic powder spraying main body, can anti-aging, gas corrosion resistance, UV damage resistance, acid and alkali corrosion resistance, salt spray moisture resistance.

Modular Installation

The modular structure design, top cover, side panel, DIN-rail, mounting plate, waterproof connector, fan, and microswitch are all detachable.

Heat Dissipation

The fan on the top and ventilation holes on the bottom form a bottom-up air duct to help heat dissipation.

Microswitch for Flexible Application

The door microswitch can be connected to the power supply, to the cloud alarm via I/O, or to the buzzer alarm.



Specifications

Products	WI-IOTBOX01
Hardware Version	V3
Hardware Features	
Overall Dimensions (W*H*D)	300*400*220mm (Include mounting slot) 300*400*206.2mm
Inner Dimensions (W*H*D)	180*340*160mm (Recommended)
Weight(kg)	8.7
Package Dimensions (W*H*D)	460*360*275mm
Package Weight(kg)	10
Thickness	1.2mm
Material	SPCC
Color	Light Grey + Grey
Surface Treatment	Electrostatic Spraying
Installation	Pole/Wall/Floor mounted
Door	1
Lock Hole	1
Detachable Side Plate	4 (2 on each side panel)
M25 Waterproof Connector	4 (2 on each side inner panel)
Aluminum Alloy Chute	2 (on the rear panel)
Bottom Cable Entry	1 (at the bottom)
Water Outlet Holes	4 (at the bottom, can be blocked with rubber plugs)
Microswitch	1 (on the upper right inside)
Fan	1 (on the top inner panel)
Insect Net	3 (2 on bottom inner side, by adhering it to the BOX with the magnetic bar in the attachment to achieve the best performance, 1 is between the fan and the top cover interlayer)
Equipment Installation	2*180mm DIN-Rail *Optional: 1* 188*42*120mm Mounting Plate
Protection	IP55
Application	
Application	Junction, Distribution, Electrical, Battery, Control, Monitoring etc. Outdoor waterproof Enclosure Box



Products	WI-IOTBOX02	WI-IOTBOX03
Hardware Version	V3	V3
Hardware Features		
Overall Dimensions (W*H*D)	400*600*265mm (Include mounting slot) 400*600*251.2mm	500*720*300mm (Include mounting slot) 500*720*286.2mm
Inner Dimensions (W*H*D)	280*540*200mm (Recommended)	380*660*240mm (Recommended)
Weight(kg)	14.1	19.8
Package Dimensions (W*H*D)	680*480*315mm	800*580*355mm
Package Weight(kg)	16.5	23
Thickness	1.2mm	
Material	SPCC	
Color	Light Grey + Grey	
Surface Treatment	Electrostatic Spraying	
Installation	Pole/Wall/Floor mounted	
Door	1	
Lock Hole	1	2
Detachable Side Plate	4 (2 on each side panel)	
M25 Waterproof Connector	4 (2 on each side inner panel)	
Aluminum Alloy Chute	2 (on the rear panel)	
Bottom Cable Entry	1 (at the bottom)	
Water Outlet Holes	4 (at the bottom, with rubber plugs)	
Microswitch	1 (on the upper right inside)	
Fan	1 (on the top inner panel)	
Insect Net	3 (2 on bottom inner side, by adhering it to the BOX with the magnetic bar in the attachment to achieve the best performance, 1 is between the fan and the top cover interlayer)	
Equipment Installation	2* 275mm DIN-Rail 1* 285.2*42*99mm Mounting Plate 2* 285.2*42*124mm Mounting Plate	2* 345mm DIN-Rail 1* 373.2*142mm Vertical DIN Rail Mounting Plate 2* 373.2*214mm Horizontal Mounting Plate
Protection	IP55	
Application		
Application	Junction, Distribution, Electrical, Battery, Control, Monitoring etc. Outdoor waterproof Enclosure Box	

Accessory Specifications

Products	
Fan	
Brand	Delta
Model	AFB0912HH
Input Voltage	12V DC (7.0 – 13.8 VDC)
Bearing	Ball
Termination	2 wire leads
Input Current	0.25 (≤0.4) A
Power consumption	3.0 (≤4.8) W
Speed	3200 RPM (Ref.)
Air Flow	57.92 CFM (1.640 m³/min)
Acoustical Noise	38.0 (≤41.0) dB–A
Dimensions	92*92*25.4mm
Operation temperature	–10°C ~70°C
Miniature Circuit Breaker	
Brand	CHINT
Model	NXB–63 C25
Number of Poles	2P
Rated Current	25A
Rated Voltage	400V~
Thermal Magnetic Release	C
Mechanical Life	20,000 cycles
Electrical Life	10,000 cycles
Short–circuit Breaking Capacity (Icn)	6000A
Dimensions (W*H*D)	36*81*77.8mm
Installation	DIN–rail mounted
Microswitch	
Brand	Omron
Model	V156–1C25
PIN	NC, NO, COM; NC and COM have connected cables.
Rated Current	15A
Rated Voltage	250V
Mechanical Life	15,000,000 cycles

Products

Heater (Optional)

Brand	CHINT
Model	NTR1-045
Heater Capacity (Typical)	45W
Input Voltage	220V AC (120V~240V AC) *The heating performance will be reduced by 10% when operating voltage is lower than 140V.
Input Current	3A max.
Heating Element	PTC resistor
Material	Aluminum
Connector	3*press clamps, fit 0.5~1.5mm ² standard wire and 0.5~2.5mm ² rigid wire
Dimensions	70*110*57mm
Weight	0.22kg
Installation	DIN-rail mounted
Operation temperature	-45°C ~70°C

Thermostat (Optional)

Brand	CHINT
Model	Red Thermostat: NTK1-211G Blue Thermostat: NTK1-111G
Function	NTK1-211G Red Thermostat: normally close, disconnect the circuit when the set temperature is reached, usually used for heating. NTK1-111G Blue Thermostat: normally open, connect the circuit when the set temperature is reached, usually used for fans.
Setting Temperature Range	0~60°C
Switch Temperature Difference	7K
Service Life	100000 cycles
Max capacity	250V AC@10A
Connection	2-pole, 2.5mm ² (12AWG) max. wire
Dimensions (W*H*D)	33*60*39mm
Weight	40g
Installation	DIN-rail mounted
Operation Temperature	-20°C ~80°C