

The logo for OPPIOT, featuring the word "OPPIOT" in a bold, white, sans-serif font. The letter "O" is stylized with a small circle inside it. The background is a solid orange color with a repeating pattern of various industrial and technical symbols, including gears, hammers, and circuit-like patterns.

OPPIOT

Craftsman's Spirit

RFID Industrial TAG

R&D - Manufacture - Quality



OPPIOT Technologies Co., LTD.

OPPIOT has been dedicated to industrial IOT revolution since 2013, now it is one of the powering trusted leaders in developing & manufacturing IOT hardware-Industrial RFID tags.

OPPIOT provides cost effective industrial-based asset tracking and material flow management solution. Smart IOT sensor provided by OPPIOT are high performance, highly durable in the presence of harsh working environment. R&D is our business core competence, we create custom products to fit any asset tracking.

OPPIOT will keep exploring and challenging the RFID technology, we are the professional partner for high quality industrial 4.0 automated solutions, just contact us!

Our Certification:



ISO9001 Certification



CE Certification

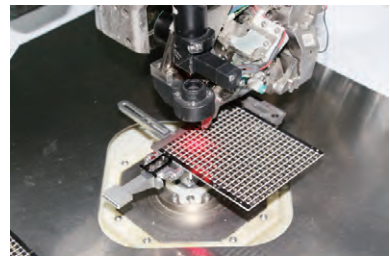
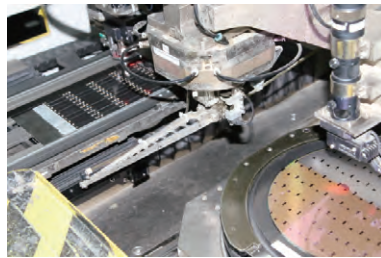


RoHS Certification

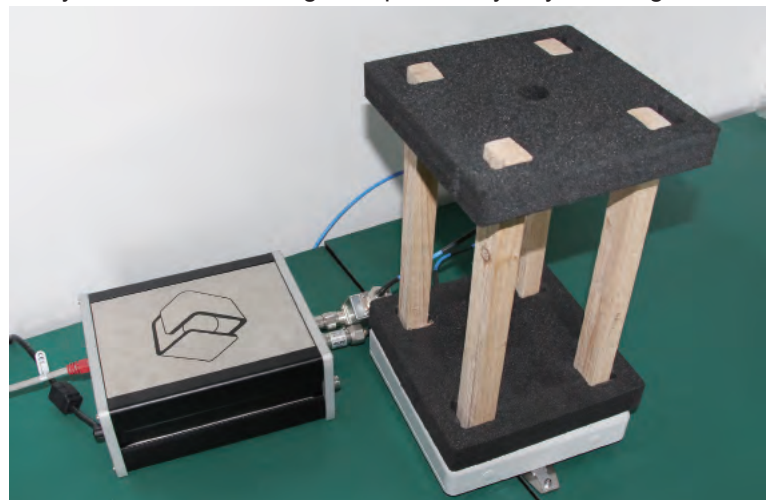


Reach Certification

Our Equipments:



Quality Control: All UHF tags are passed by Voyantic Tagsurance.



MICRO UHF METAL TAG

Smallest Size Diameter 5mm Read Distance 100cm



UHF Metal tag Atom series:

D5mm, 5x3mm, D6mm, 6x3mm, 6x6mm, 8x3mm, 10x4mm, D10mm,
13x7mm, D16mm, 15x4mm, 18x8mm

Application:

Instrument tracking, Tool tracking, Medical device management, Source tagging, Surgical instrument management, Small asset tracking, IT and laptop tracking, embedded bolt identification, Weapons tracking.



PCB UHF Metal Tag Atom Series:

Number	Picutre	IC Type	size (mm)	Hole	Read Range(on Metal): (Fix Reader:ThingMagic M6-E, 36dBm/4W)		Read Range(on Metal) : (Handheld Reader: OP9908, R2000, 33dBm/2W)		Weight (g)
					US (902-928MHz)	EU (865-868MHz)	US (902-928MHz)	EU (865-868MHz)	
OPPD5		Alien Higgs-3	Diameter 5mmxT4.0mm	No	100cm	90cm	60cm	55cm	0.5g
OPP 060302		Alien Higgs-3	6x3mmxT3.0mm	No	85cm	80cm	50cm	45cm	0.5g
OPP0603		Alien Higgs-3	6x3mmxT4.0mm	No	90cm	80cm	50cm	45cm	0.5g
OPPD6		Alien Higgs-3	Diameter 6mmxT4.0mm	2mmx1	85cm	75cm	45cm	45cm	0.5g
OPP0606		Alien Higgs-3	6x6mmxT4.0mm	No	110cm	110cm	80cm	80cm	0.5g
OPP0803		Alien Higgs-3	8x3mmxT3.0mm	No	110cm	120cm	70cm	85cm	0.5g
OPP1004		Alien Higgs-3	10x4mmxT3.0mm	2mmx1	135cm	135cm	90cm	75cm	0.5g
OPPD10		Alien Higgs-3	Diameter 10mmxT3.0mm	2mmx1	150cm	130cm	100cm	95cm	0.5g
OPP1307		Alien Higgs-3	13x7mmxT3.0mm	2mmx2	250cm	240cm	170cm	140cm	0.7g
OPPD13		Alien Higgs-3	Diameter 13mmxT2.0mm	2mmx2	180cm	150cm	140cm	120cm	0.7g
OPPD16		Alien Higgs-3	Diameter 16mmxT3.0mm	2mmx2	260cm	240cm	160cm	150cm	1.3g
OPP1504		Alien Higgs-3	15x4mmxT2.0mm	2mmx2	210cm	220cm	130cm	150cm	0.7g
OPP1806		Alien Higgs-3	18x6mmxT3.0mm	2mmx1	260cm	250cm	200cm	180cm	1.2g

*Supply OEM/ODM service.

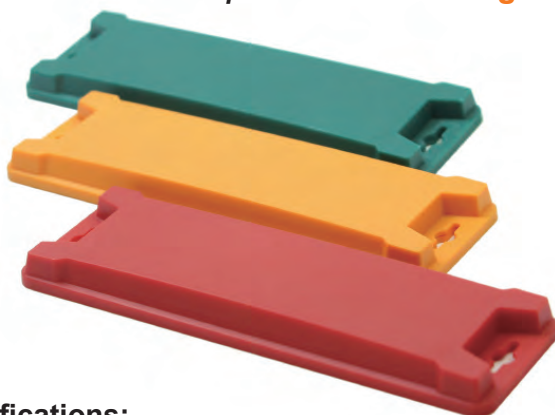
PCB UHF Metal Tag Dolphin Series:

Number	Picutre	IC Type	Size (mm)	Hole	Read Range(on Metal): (Fix Reader:ThingMagic M6-E, 36dBm/4W)		Read Range(on Metal) : (Handheld Reader: OP9908, R2000, 33dBm/2W)		weight (g)
					US (902-928MHz)	EU (865-868MHz)	US (902-928MHz)	EU (865-868MHz)	
OPPD20		Alien Higgs-3	Diameter 20mmxT2.0mm	2mmx2	320cm	280cm	240cm	230cm	1.0g
OPP2208		Alien Higgs-3	22x8mmxT3.0mm	2mmx2	450cm	470cm	260cm	300cm	1.3g
OPP2510		Alien Higgs-3	25x10mmxT2.0mm	2mmx2	325cm	300cm	250cm	240cm	1.3g
OPP2626 PPS Tag		Alien Higgs-3	26x26mmxT5.5mm	4mmx2	260cm	250cm	150cm	130cm	6.5g
OPP3005		Alien Higgs-3	30x5mmxT2.0mm	2mmx2	310cm	280cm	210cm	200cm	0.8g
OPP3310		Alien Higgs-3	33x10mmxT3.5mm	2mmx2	420cm	350cm	280cm	250cm	3.0g
OPP3613		Alien Higgs-3	36x13mmxT3.5mm	2mmx2	470cm	450cm	270cm	250cm	3.5g
OPP4010		Alien Higgs-3	40x10mmxT2.0mm	3mmx2	450cm	420cm	300cm	280cm	1.8g
OPP4215		Alien Higgs-4	42x15mmxT2.1mm	4mmx2	680cm	700cm	530cm	550cm	2.2g

PCB UHF Metal Tag Everest Series:

Number	Picture	IC Type	Size (mm)	Hole	Read Range(on Metal): (Fix Reader:ThingMagic M6-E, 36dBm/4W)		Read Range(on Metal) : (Handheld Reader: OP9908, R2000, 33dBm/2W)		weight (g)
					US (902-928MHz)	EU (865-868MHz)	US (902-928MHz)	EU (865-868MHz)	
OPP5010		Alien Higgs-3	50x10mmxT1.0mm	2mmx2	280cm	250cm	190cm	170cm	1.5g
OPP5213		Impinj Monza 4QT	52x13mmxT3.5mm	3mmx2	800cm	820cm	490cm	510cm	5.5g
OPP8008		Alien Higgs-3	80x8mmxT3.5mm	3mmx2	650cm	590cm	340cm	310cm	5.0g
OPP7020		Alien Higgs-3	70x20mmxT3.6mm	4mmx2	1000cm	1030cm	630cm	660cm	11.0g
OPP9020		Alien Higgs-3	90x20mmxT3.0mm	3mmx2	1080cm	1050cm	650cm	630cm	12.0g
OPP7111 (FPC)		Alien Higgs-3	71x11xT0.13mm	No	Global900cm (off Metal)		Global530cm (off Metal)		0.2g
OPP130		Alien Higgs-3	130x42xT10.5mm	Long hole	3000cm	2800cm	2200cm	2200cm	40g

Read Distance: Up to 30 Meters Long Distance Metal UHF TAG
OPP130



Functional Specifications:

RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	(US) 902-928MHz, (EU) 865-868MHz
IC type:	Alien Higgs-3
Memory:	EPC 96bits (Up to 480bits) , USER512bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Metal Surfaces
Read Range : (Fix Reader: ThingMagic M6-E, 36dBm/4W)	30M -(US) 902-928MHz; 28M -(EU) 865-868MHz, On Metal 16M -(US) 902-928MHz; 14M -(EU) 865-868MHz, Off Metal
Read Range : (Handheld Reader: OP9908, R2000, 32dBm/2W)	22M -(US) 902-928MHz; 22M -(EU) 865-868MHz, On Metal 11M -(US) 902-928MHz; 11M -(EU) 865-868MHz, Off Metal
Warranty:	1 Year

Physical Specification:

Size:	130x42mm
Thickness:	10.5mm
Material:	PC
Colour:	Black (Red, Blue, Green, White)
Mounting Methods:	Adhesive, Screw
Weight:	40g

Environmental Specification:

IP Rating:	IP68
Storage Temperature:	-30°C to +100°C
Operation Temperature:	-20°C to +80°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

High Temperature UHF Metal TAG

OPP4215/OP2019

Withstands: 280°C for 50 minutes, 250°C for 150minutes



Functional Specifications:

	OPP4215	OPP2019
RFID Protocol:	EPC Class1 Gen2, ISO18000-6C	
Frequency:	(US) 902-928MHz, (EU) 865-868MHz	
IC type:	Alien Higgs-4	
Memory:	EPC 128bits, USER128bits, TID64bits	
Write Cycles:	100,000 times	
Functionality:	Read/write	
Data Retention:	Up to 50 Years	
Applicable Surface:	Metal Surfaces	
Read Range :	680cm-(US) 902-928MHz, On Metal;	250cm-(US) 902-928MHz, On Metal;
(Fix Reader: ThingMagic M6-E, 36dBm/4W)	700cm-(EU) 865-868MHz, On Metal;	270cm-(EU) 865-868MHz, On Metal;
Read Range :	530cm-(US) 902-928MHz, On Metal;	120cm-(US) 902-928MHz, On Metal;
(Handheld Reader: OP9908, R2000, 33dBm/2W)	550cm-(EU) 865-868MHz, On Metal;	140cm-(EU) 865-868MHz, On Metal;
Warranty:	1 Year	

Physical Specification:

Size:	42x15mm, (Hole: D4mmx2)	D:20mm, (Hole: D2mmx2)
Thickness:	2.1mm, 2.8mm with IC bump	2.1mm, 2.8mm with IC bump
Material:	High Temperature Material	
Colour:	Black	
Mounting Methods:	Adhesive, Screw	
Weight:	2.2g	1.0g

Environmental Specification:

IP Rating:	IP68
Storage Temperature:	-55°C to +200°C (280°C for 50 minutes, 250°C for 150minutes)
Operation Temperature:	-40°C to +150°C (working 10hours in 180°C)
Certifications:	Reach Approved, RoHS Approved, CE Approved



Functional Specifications:

RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	(US) 902-928MHz, (EU) 865-868MHz
IC type:	Alien Higgs-4
Memory:	EPC 128bits, USER128bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Metal Surfaces
Read Range : (Fix Reader: ThingMagic M6-E, 36dBm/4W)	630cm -(US) 902-928MHz; On Metal 650cm -(EU) 865-868MHz, On Metal
Read Range : (Handheld Reader: OP9908, R2000, 32dBm/2W)	450cm -(US) 902-928MHz; On Metal 460cm -(EU) 865-868MHz; On Metal
Warranty:	1 Year

Functional Specifications:

Size:	60x19mm, (Hole: D5mmx2)
Thickness:	4.8mm
Material:	PPS shell
Colour:	Black
Mounting Methods:	Adhesive, Screw, binding
Warranty:	13g

Environmental Specification:

IP Rating:	IP68
Withstands Exposure To:	Fuel B, mineral oil, petroleum, salt mist, vegetable oil;
Storage Temperature:	-55°C to +200°C (230°C for 30 minutes, 180°C for 120minutes)
Operation Temperature:	-40°C to +150°C
Certifications:	Reach Approved, RoHS Approved, CE Approved



Functional Specifications:

RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	(US) 902-928MHz, (EU) 865-868MHz
IC type:	Alien Higgs-3
Memory:	EPC 96bits (Up to 480bits) , USER 512bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Metal Surfaces
Read Range :	260cm -(US) 902-928MHz; 250cm -(EU) 865-868MHz, On Metal
(Fix Reader: ThingMagic M6-E, 36dBm/4W)	130cm -(US) 902-928MHz; 120cm -(EU) 865-868MHz, Off Metal
Read Range :	190cm -(US) 902-928MHz; 150cm -(EU) 865-868MHz, On Metal
(Handheld Reader: OP9908, R2000, 32dBm/2W)	100cm -(US) 902-928MHz; 90cm -(EU) 865-868MHz, Off Metal
Warranty:	1 Year

Functional Specifications:

Size:	26x26mm, (Hole: D4mmx2)
Thickness:	5.5mm
Material:	PPS shell, PCB Antenna
Colour:	Black
Mounting Methods:	Adhesive, Screw, binding
Warranty:	6.5g

Environmental Specification:

IP Rating:	IP68
Withstands Exposure To:	Fuel B, mineral oil, petroleum, salt mist, vegetable oil;
Storage Temperature:	-40°C to +150°C (230°C for 30 minutes, 180°C for 120minutes)
Operation Temperature:	-40°C to +100°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

**Functional Specifications:**

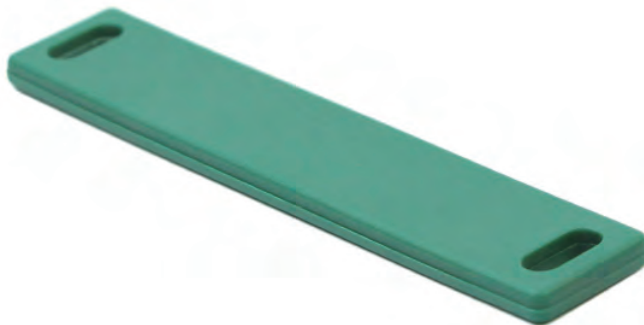
RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	Global 840Mhz to 960Mhz
IC type:	Alien Higgs-3
Memory:	EPC 96bits (Up to 480bits) , USER 512bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Non Metal Surfaces
Read Range : (Fix Reader: ThingMagic M6-E, 36dBm/4W)	Up to 9.0M, Off Metal
Read Range : (Handheld Reader: OP9908, R2000, 32dBm/2W)	Up to 5.0M, Off Metal
Warranty:	1 Year

Physical Specification:

Antenna Size:	71x11mm
Thickness:	0.13mm
Material:	FPC
Colour:	
Mounting Methods:	Adhesive
Weight:	0.2g

Environmental Specification:

IP Rating:	IP68
Storage Temperature:	-40°C to +200°C
Operation Temperature:	-40°C to +100°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

**Functional Specifications:**

RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	Global 840Mhz to 960Mhz
IC type:	Alien Higgs-3
Memory:	EPC 96bits (Up to 480bits) , USER 512bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Non Metal Surfaces
Read Range : (Fix Reader: ThingMagic M6-E, 36dBm/4W)	Up to 4.0M, Off Metal
Read Range : (Handheld Reader: OP9908, R2000, 32dBm/2W)	Up to 1.5M, Off Metal
Warranty:	1 Year

Physical Specification:

Size:	90x18mm, Hole: 10x4mm
Thickness:	4.0mm
Material:	TPU
Colour:	Green, Red, Yellow, Black, White, Blue
Mounting Methods:	Cable tie
Weight:	8g

Environmental Specification:

IP Rating:	IP68
Storage Temperature:	-40°C to +100°C
Operation Temperature:	-40°C to +100°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

*Supply OEM/ODM service.

UHF Flexible Anti-Metal label



Functional Specifications:

OPPF8020

OPPF5015

RFID Protocol:	EPC global and ISO 18000-63 compliant, Gen2v2 compliant	
Frequency:	(US) 902-928MHz, (EU) 865-868MHz	
IC type:	IMPINJ Monza R6	
Memory:	EPC 96bits , TID96bits	
Write Cycles:	100,000times	
Functionality:	Read/write	
Data Retention:	Up to 50 Years	
Applicable Surface:	Metal Surfaces	
Read Range :	650cm -(US) 902-928MHz, On Metal	350cm -(US) 902-928MHz, On Metal
(Fix Reader:ThingMagic M6-E,36dBm/4W)	500cm -(EU) 865-868MHz, On Metal	300cm -(EU) 865-868MHz, On Metal
Read Range :	300cm -(US) 902-928MHz, On Metal	200cm -(US) 902-928MHz, On Metal
(Handheld Reader: OP9908, R2000,32dBm/2W)	200cm -(EU) 865-868MHz, On Metal	180cm -(EU) 865-868MHz, On Metal
Warranty:	1 Year	

Physical Specification:

Size:	80x20mm	50x15mm
Thickness:	1.3mm	1.3mm
Material:	PET Antenna	PET Antenna
Colour:		
Mounting Methods:	Adhesive	Adhesive
Weight:	5.0g	2.5g

Environmental Specification:

IP Rating:	IP54
Storage Temperature:	-20°C to +70°C
Operation Temperature:	-20°C to +50°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

Read Distance 100cm **MICRO UHF METAL TAG****OPPD5****Functional Specifications:**

RFID Protocol:	EPC Class1 Gen2, ISO18000-6C
Frequency:	(US) 902-928MHz, (EU) 865-868MHz
IC type:	Alien Higgs-3
Memory:	EPC 96bits (Up to 480bits) , USER 512bits, TID64bits
Write Cycles:	100,000 times
Functionality:	Read/write
Data Retention:	Up to 50 Years
Applicable Surface:	Metal Surfaces
Read Range :	100cm -(US) 902-928MHz, On Metal
(Fix Reader:ThingMagic M6-E, 36dBm/4W)	90cm -(EU) 865-868MHz, On Metal
Read Range :	60cm -(US) 902-928MHz, On Metal
(Handheld Reader: OP9908, R2000, 32dBm/2W)	55cm -(EU) 865-868MHz, On Metal
Warranty:	1 Year

Physical Specification:

Size:	Diameter : 5mm
Thickness:	3.8mm
Material:	FR4(PCB)
Colour:	Black
Mounting Methods:	
Weight:	0.5g

Environmental Specification:

IP Rating:	IP68
Storage Temperature:	-40°C to +150°C
Operation Temperature:	-40°C to +100°C
Certifications:	Reach Approved, RoHS Approved, CE Approved

*Supply OEM/ODM service.



Standard Parts	
General Specifications	
Operating system	Android 4.4 embedded OS
CPU	1.2GHz
RAM	RAM 1G ,ROM 8G or RAM 2G, ROM 16G
Ports	One USB 2.0 port(OTG supports U Flash Disk, Mouse, 100M ethernet), one charging mouth, one TF card(128G), one SIM card
Protection Grade	
Industrial Protection Grade	IP65
Drop Grade	Drop resistance from 1.2m
Wireless Communication	
Bluetooth	V4.0
GPS	Built-in Beidou/GPS/GLONASS; supports A-GPS; External Beidou/GPS/GLONASS; supports RTCM 2.3 differential data
WIFI	Support IEEE 802.11b/g/n
4G	FDD/WCDMA/GSM LTE_FDD B1/B3/B7 LTE_TDD B41/B40 WCDMA B1//B2/B5 GSM 900/1800/1900
Physical Layer Parameter	
Display Screen	4 inch LCD screen, 480x800 IPS screen, capacitive touch screen
Touch screen	Thicken tempered glass(thickness 1mm); supports 10 points touch and doubleclick for waking up
Keyboard	Physical keypad with 19 phiscal keys
Camera	8.0 million pixels; support auto focus and fi ll-fl ash function.
Headset	Supports standard headset, Bluetooth headset; support Mike and receiver function
Vibration Function	Vibrating prompt function
Sensor	Supports light sensation, gyroscope, compass, gravity
Flashlight Functio	Used for emergency lighting
Rechargeable Lithium Battery	3.7V, 3800mAh
Handle Battery	3.7V, 5000mAh
Standby	The standby current is less than 10mA
Dimension	168mm*75mm*26mm
Weight	350g



Standard Parts	
General Specifications	
Operating System	Android 4.4 embedded OS
CPU	MSM8916, A53, 4 core CPU, 1.2GHz
RAM	RAM 2G, ROM 16G
USB port	5 pin MicroUSB; support OTG (U-disk/Mouse/Keyboard/USB Ethernet cable)
Protection Grade	
Industrial Protection Grade	IP67
Drop Grade	Drop resistance from 1.2m
Wireless Communication	
Bluetooth	V4.0
GPS	Support GPS, DBS, GLONASS and professional GPS,Ublox; GPS and Beidou (alternative)
WIFI	WIF Support IEEE 802.11b/g/n
4G	FDD/WCDMA/GSM LTE_FDD B1/B3/B7 LTE_TDD B41/B40 WCDMA B1//B2/B5 GSM 900/1800/1900
Physical Layer Parameter	
Display Screen	7 inch LCD screen, 1280x800 IPS screen, capacitive touch screen
LED indicator light	Support (ordinary fl icker, Call fast fl icker, missed calls) three status bar
Keyboard	Android menu, Homepage, Return, Volume, Barcode, ON/OFF, Reset
Camera	2 million pixels front camera, 8 million pixels rear camera with automatic focus and lighting function
Headset	3.5mm audio Interface, has mike andtelephone receiver
Vibration Function	Vibrating prompt function
Sensor	Supports light sensation, gyroscope, compass, gravity
Flashlight Functio	Used for emergency lighting
Rechargeable Lithium Battery	3.7V, 7000mAh
Standby	The standby current is less than 10mA
Dimension	209mm*139mm*19mm
Weight	590g

4-Port Enterprise UHF RFID Reader**OPM6A****The synopsis of the reader:**

The OPM6A is a low profile, high-performance 4-port RFID reader designed for both indoor and outdoor applications. Driven by ThingMagic's powerful Mercury6e UHF RFID reader module.

1.Tag / Transponder Protocols:

EPCglobal Gen 2 (ISO 18000-6C) with DRM
ISO 18000-6B (optional)
IP-X (optional)

2.Interface:

Four RP-TNC connectors

3.RF Power Output:

Separate read and write levels, command adjustable from 5 dBm to 31.5 dBm* (1.4W) with +/-0.5 dBm accuracy above +15 dBm

4.Frequency:

Pre-configured for the following regions:
FCC 902-928 MHz (Americas)
ETSI 865.6-867.6 MHz (EU)
KCC 917-920.8 MHz (Korea)
TRAI 865-867 MHz (India)
ACMA 920-926 MHz (Australia)
'Open' (Customizable) 865-869 MHz,
902-928 MHz

5.Connectors:

RJ45 (10/100 Base-T Ethernet)
9-pin serial connector, supporting RS232
GPIO interface

7.External DC Power:

12V supply voltage
Maximum DC power: 15 W

8.Environment:

Operating Temp: -20°C to +70°C
Storage Temp: -40°C to +85°C
Humidity 5-95% non-condensing

9.Architecture:

Operating System: Linux 2.6.35

10.Performance:

Max Tag Read Rate: More than 750 tags/second using high-performance settings
Max Tag Read Distance: depend on tag
Max EPC ID Length: Up to 496 bits

11.Application Interface:

On reader API: MercuryOS C API
Host API: Java, C, .NET

The Mercury6e (M6e) embedded UHF RFID reader module offers world leading performance, form factor, and time-to-market advantages to OEM, Value Added Reseller, and Solution Provider customers. It is designed to the performance standards of full size readers, but is small and efficient enough to be used in mobile applications. The M6e supports 4 ports and will operate to a level of +31.5 dBm. Serial and USB interfaces are provided to support both board-to-board and board-to-host connectivity

**Electrical Specifications:**

Model	OPRFA915
Frequency Range(MHz)	840-960
Bandwidth MHz	100
Gain	6dBi
Horizontal Beamwidth °	Hor:65ert:58
F/B Ratio	≥ 23
VSWR	≤ 1.3
Impedance	50 Ω
Polarization	Circular polarization
Max. Power	100W
Connector	SMA-K

Mechanical Specifications:

Size	140*120*20mm
Weight	0.4 KG
Rated Wind Velocity	60 m/s
Reflector material	H Copper plate
Radome material	ABS
Operating temperature	-40~80℃
Suitable pole diameter	Φ40-Φ75mm

