



# **USB***Pro* RFID Reader



## World-class UHF RFID Desktop Reader

The ThingMagic **USB***Pro* RFID Reader allows solutions developers to support applications that require desktop reading and writing of EPC Global Gen2 tags as well as other protocols such as ISO18000-6B, IPx and AEI ATA through additional license. Based on ThingMagic's best-in-class M6e-Micro LTE UHF RFID module, the **USB***Pro* RFID Reader is controlled and powered by a host PC or laptop through a USB interface, and, in addition, supports autonomous operation. The ThingMagic **USB***Pro* RFID Reader is compatible with ThingMagic's application development tools, including Universal Reader Assistant, permitting rapid creation of solutions to support a wide range of applications, including tag commissioning, manufacturing WIP, document tracking, retail POS, and workflows for healthcare, events, and hospitality.

Ordering Information	
Reader	USB-6EP
Development Kit	USB-6EP-DEVKIT
Tag / Transponder Protocols	
RFID Protocol Support	EPC Gen2V2 ISO18000-63 standard ISO18000-6B, IPx, AEI ATA are available through additional license
RF Interface	
Antenna Ports	Internal antenna with an average gain of +1 dBi from 865-869MHz and 902-928MHz, External RP-SMA antenna connector
RF Power Output	Separate read and write levels (into the antenna) are command-adjustable from -5 dBm to 30 dBm* (1W), +/- 1.0 dBm accuracy with +20dBm default
Frequency	Pre-configured for the following regions: FCC 902-928,917.4-927,917.5-922.5 MHz (Americas) ETSI 865.6-867.6 MHz, 869.85 MHz (EU) TRAI 865-867 MHz (India) KCC 917-920.8 MHz (Korea) ACMA 920-926 MHz (Australia) SRRC-MII 920-925 MHz (P. R. China) MIC 916.7-920.9 MHz (Japan) Open (Customizable) 865-869 and 902-928 MHz
Data/Control Interface	
Physical	USB Micro-B connector, with removable six (6) foot cable with dual USB-A type plug
Signaling	USB 2.0
1/0	Two I/O command controlled LEDs and two I/O command queried switches

Command-response protocol protected by

length field and 16-bit CRC

**Protocol** 

Physical		
Dimensions (not including stand)	97 mm L x 61 mm W x 25 mm H (3.8 in L x 2.4 in W x 1.0 in H)	
Regulatory & Safety		
Regulatory	FCC 47 CFR Ch. 1 Part 15, Industrie Canada RSS-21 0, ETSI EN 302 208 v3.1.1 (RED 2014/53/EU)	
Safety	IEC 60950-1 (ed.2) US-17650-UL	
Power		
DC Power Required	DC Voltage: 4.5 to 5.5 VDC from USB cable DC Power: 6.2 W max Supplied interface cable terminates in two type-A plugs: one for power and signal, the second for additional power if needed	
Idle Power Consumption	0.35 W max at idle (Power management modes can be used to reduce this to as little as 0.1 W)	
Environment		
OperatingTemp.	-40C to +60C*	
StorageTemp.	-40C to +85C	
Architecture		
User Memory	16 kB	
Tag Buffer	200 tags	
Performance		
Tag Read Rate	50 tags/second	
Tag Read Distance	Up to 4 feet (1.2m) depending on tag sensitivity and orientation with internal antenna. Up to 20 feet (6.1m) with external 6dBi linearly polarized wideband antenna.	

<sup>\*</sup>Duty cycle restrictions based on temperature, tx power >23dBm







## **MAKING RFID EASY TO USE**

ThingMagic is dedicated to driving the barriers to deploying RFID technology as low as possible. We design our products to be easy to use out-of-the-box and to deliver predictable, reliable, and repeatable performance. Our development tools require little RFID expertise, enabling you to rapidly design, test, and deploy your RFID solutions.

## **Hardware Developers Kit**

Everything needed to read and write RFID tags and begin developing RFID-enabled applications:

USB*Pro* Reader SMA to RP-SMA Cable USB Cable Antenna Sample Tags

## **Mercury API SDK**

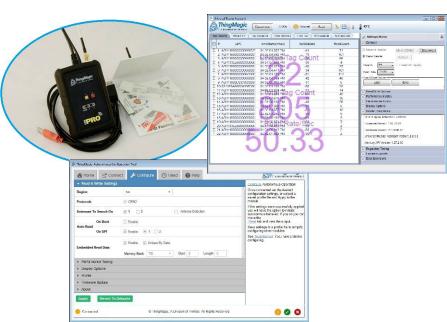
A common development platform, supporting an extensive variety of hardware to connect, configure, and control ThingMagic readers.

#### **Universal Reader Assistant**

A utility for advanced demo, testing, and tuning of all ThingMagic readers.

## **Autonomous Configuration Tool**

Utility to configure USBpro reader to operate without a host controller.







© 2015 JADAK LLC

02.21.17

**USA Office** 7279 William Barry Blvd. North Syracuse, NY

13212-3349

+1 315.701.0678 Phone +1 315.701.0679 Fax

email: info@jadaktech.com

European Office Emmastraat 16 4811 AG Breda The Netherlands

+31 (0)76.522.5588 Phone +31 (0)76.522.4747 Fax email: info@jadak.eu

### **Asia Pacific Office**

Building 8 Gangtian Industrial Square GangTian Road Suzhou Industrial Park JiangSu, China 215024

+86 512.6283.7080 Phone email: info@jadaktech.com

