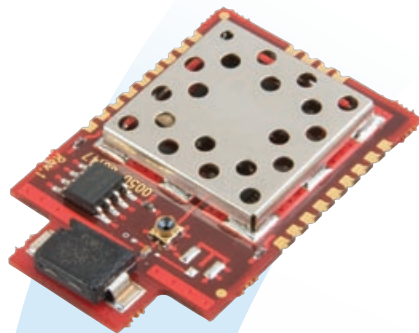


阅读申明

- 1.本站收集的数据手册和产品资料都来自互联网，版权归原作者所有。如读者和版权方有任何异议请及时告之，我们将妥善解决。
- 2.本站提供的中文数据手册是英文数据手册的中文翻译，其目的是协助用户阅读，该译文无法自动跟随原稿更新，同时也可能存在翻译上的不当。建议读者以英文原稿为参考以便获得更精准的信息。
- 3.本站提供的产品资料，来自厂商的技术支持或者使用者的心得体会等，其内容可能存在描述上的差异，建议读者做出适当判断。
- 4.如需与我们联系，请发邮件到marketing@iczoom.com，主题请标有“数据手册”字样。

Read Statement

1. The datasheets and other product information on the site are all from network reference or other public materials, and the copyright belongs to the original author and original published source. If readers and copyright owners have any objections, please contact us and we will deal with it in a timely manner.
2. The Chinese datasheets provided on the website is a Chinese translation of the English datasheets. Its purpose is for reader's learning exchange only and do not involve commercial purposes. The translation cannot be automatically updated with the original manuscript, and there may also be improper translations. Readers are advised to use the English manuscript as a reference for more accurate information.
3. All product information provided on the website refer to solutions from manufacturers' technical support or users the contents may have differences in description, and readers are advised to take the original article as the standard.
4. If you have any questions, please contact us at marketing@iczoom.com and mark the subject with "Datasheets" .



THE FASTEST WAY TO WIRELESS

Based on Texas Instruments' leading edge 802.15.4 SoC & Z-Stack™ technology, the ZB2430 family of wireless modules is one of the most powerful ZigBee™-compliant solutions in the market today. It provides OEMs with industry-leading 2.4GHz module performance in low power conservation, ease of integration, range, features, and functionality.

ZB2430 is ideal for power-restricted or battery-operated applications. Its receive and power-down performance offer OEMs the lower power consumption of any comparable transceiver module. Since it operates in the 2.4 GHz ISM band, the modules can be used globally--allowing OEMs to standardize on a single platform. Although the IEEE 802.15.4 (PHY & MAC) and ZigBee stack are industry standards, our flexible approach allows OEMs to customize a solution specific to application requirements.

With the embedded Z-stack, ZB2430 is aimed squarely at secure, low-power mesh network applications. Modules are offered as Coordinators, Routers, End Devices or Commissioners. Network scan, remote configuration, dynamic routing, discovery, security...all unleash the full power of ZigBee. The Development Kit platform and test utility allow the OEM to explore the best of ZigBee straight out of the box.

FEATURES

- Outstanding power consumption
- Reliable ZigBee™ mesh architecture
- 2.4GHz ISM band for global applications
- Temperature sensor
- Long-range performance
- Configurable GPIO, ADC
- Over-the-air download (OAD) firmware updating capability

APPLICATIONS

- Automated meter reading
- Irrigation systems
- Medical devices
- ePOS

global solutions: local support™

USA: +1 800 492.2320

Europe: +44 1628 858 940

Asia: +852 2268 6567

wirelessinfo@lairdtech.com

www.lairdtech.com/wireless

ZB2430 supports ZigBee's MESH architecture. Each system consists of a Coordinator, Router, Commissioner and optional End Devices.

COORDINATOR

- a) One coordinator per network
- b) Scans to find available channel
- c) Establishes a network
- d) Maintains routing tables
- e) Communicates with any device type

ROUTER

- a) Maintains routing tables
- b) Communicates with any device type
- c) Extends range of network by routing data over multiple hops

END DEVICE

- a) Communicates with any device type
- b) Supports sleep modes
- c) Dedicated to parent (Router or Coordinator)

COMMISSIONER

- a) One Commissioner per network
- b) Server module for OAD firmware upgrades
- c) Required for OAD ability

ORDERING INFORMATION

Coordinator	Z100S1*FC
Router	Z100S1*FR
End Device	Z100S1*FE
Commissioner	Z100S1*FM
Coordinator	Z040S1*FC
Router	Z040S1*FR
End Device	Z040S1*FE
Commissioner	Z040S1*FM

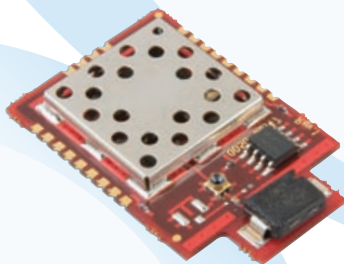
* = A for integrated antenna; U for u.FL connector (external antenna)

Parameter	Z100S1*	Z040S1*
Form Factor	Surface Mount	Surface Mount
Output Power	100mW	40mW
Frequency	2400-2483.5 MHz	2400-2483.5 MHz
Outdoor Range	4.8 km (ext antenna)	1.6 km (ext antenna)
Indoor Range	400m	160m
Receive Sensitivity	-100 dB typical	-100 dB typical
Serial Data Rate	Up to 115 bps	Up to 115 bps
RF Baud Rate	250 kbps	250 kbps
Temperature Range	-40° C to +85° C	-40° C to +85° C
Size	25.4mm x 39 mm x 3.6 mm	25.4mm x 39 mm x 3.6 mm
Serial Interface	3V TTL	3V TTL
Power Consumption:		
Tx	140mA@ 3.3V +18dBm	95mA@ 3.3V +14dBm
Rx	44mA @ 3.3V	30mA @ 3.3V
Sleep	7.6 uA	7.6 uA
Antenna Options	Integrated 2dBi ceramic antenna, u.FL connector for external antenna	Integrated 2dBi ceramic antenna, u.FL connector for external antenna
Approvals*	FCC/IC	CE

*for additional country approvals, contact us for more information.

Development Kit – External antenna	SDK-Z100S1UF
Development Kit - Integrated antenna	SDK-Z100S1AF
Development Kit – External antenna, CE	SDK-Z040S1UF
Development Kit - Integrated antenna, CE	SDK-Z040S1AF
Development Kit – External antenna OAD	SDK-Z100S1UF-M
Development Kit - Integrated antenna OAD	SDK-Z100S1AF-M
Development Kit – External antenna, CE, OAD	SDK-Z040S1UF-M
Development Kit - Integrated antenna, CE, OAD	SDK-Z040S1AF-M

Development Kit include one Coordinator module, two router modules and two end devices.



LWS-SPEC-ZB2430 0209

Any information furnished by Laird Technologies and its agents is believed to be accurate and reliable. Responsibility for the use and application of Laird Technologies materials rests with the end user since Laird Technologies and its agents cannot be aware of all potential uses. Laird Technologies makes no warranties as to the fitness, merchantability, or suitability of any Laird Technologies materials or products for any specific or general uses. Laird Technologies shall not be liable for incidental or consequential damages of any kind. All Laird Technologies products are sold pursuant to the Laird Technologies terms and conditions of sale in effect from time to time, a copy of which will be furnished upon request. For further information please visit our website at www.lairdtech.com. Alternatively contact: wirelessinfo@lairdtech.com. Bluetooth® is a trademark owned by Bluetooth SIG, Inc., USA and licensed to Laird Technologies.

© 2009 All Rights Reserved. Laird Technologies is a registered trademark of Laird Technologies, Inc.