

## SX-SDCAG 802.11a/b/g SDIO Card Module



### Ultracompact Wireless Solution for Embedded Applications

The Silex SX-SDCAG 802.11a/b/g wireless module is designed for OEMs who need a highly compact wireless radio/baseband solution with very low power consumption. This SDIO card contains MAC & baseband processors to offload processing from the main CPU and enables wireless connection even on a low processing power design. SX-SDCAG's diversity antenna option gives you better and wider wireless coverage than any other 802.11a/b/g SDIO cards.

SX-SDCAG is ideal for low power / battery operated devices like portable medical devices, barcode scanners, RFID readers, mobile printers, and many more.

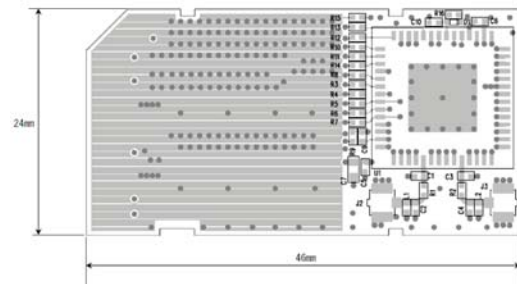
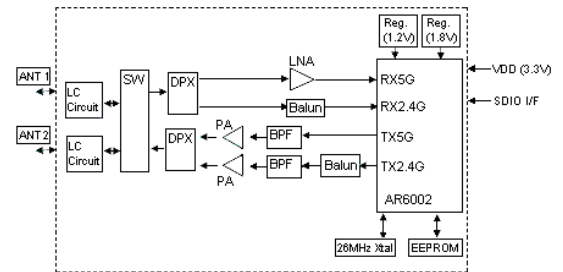
The SX-SDCAG is designed to be directly inserted to a SD card slot on OEM's PCB to minimize size and cost.\* It features an industry-standard SDIO interface, and is pre-tuned for ease of design and manufacturing. In order to expedite your product development process, Silex can also provide both hardware and software engineering services, as well as turnkey product design and manufacturing.

#### Key Features:

- Highly Integrated System for 802.11a/b/g WLAN
- Integrated Atheros AR6002 Single Chip design
- Very low power consumption ( 20mW standby; 1,056mW transmit / 363mW receive@5GHz typical; 970mW transmit / 330mW receive @2.4GHz typical)
- Advanced power management to minimize standby and active power
- Built-In EEPROM for storage of MAC address and other parameters
- WEP 64/128, WPA (TKIP), WPA2 security
- Driver development/porting and hardware design services are available from Silex. Please consult with our sales representative for further information.

\*It may not fit into some card slots.

#### Diagrams



#### Specifications:

Product Name	SX-SDCAG
Chipset	Atheros Communications AR6002
Electrical Interface	SDIO V 1.1 (4-bit, 1-bit)
Operating Voltage	3.30 VDC +/- 5%
Radio Specifications	2.4-2.4897GHz (FCC, ETSI, TELEC) 5.15-5.85GHz (FCC, ETSI, TELEC)
Radio Transmit Power (Typical)	18 dBm (802.11b/g); 16dBm (802.11a)
Baseband Specifications	CSMA/CA media access; DSSS, OFDM
Temperature	-20 to +70 degrees C**
Packaging	24 x 46 x 4.1 mm

\*\* Performance may vary across the temperature range and frequency depending on the implementation

silex technology is a registered trademark of silex technology, Inc. Other product or brand names may be registered trademarks or trademarks of their respective owners. Technical information and specifications are subject to change without notice. © 2009 silex technology, Inc. All rights reserved.

### silex global sales & support locations



**US Office**  
silex technology america, Inc.  
+1-801-747-0656  
US toll free 866-765-8761  
www.silexamerica.com  
sales@silexamerica.com

**Europe Office**  
silex technology europe GmbH  
+49-2159-67500  
German toll free 0800-7453938  
www.silexeurope.com  
contact@silexeurope.com

**China Office**  
silex technology beijing, Inc  
+86-10-8497-1430  
www.silex.com.cn  
contact@silex.com.cn

**Corporate Headquarters**  
silex technology, Inc.  
+81-774-98-3781  
www.silex.jp  
support@silex.jp

PN: 141-00197-100-X1  
20091015