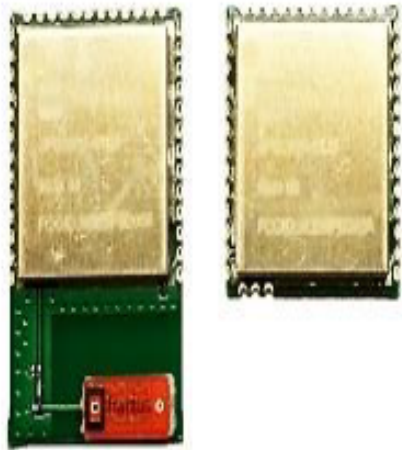


# SPB209A WLAN and Bluetooth Module



## TRIA SPB209A



14 x 14 x 2,5 mm



-40 +85 °C



## Highlights

- IEEE 802.11ac compliant
- IEEE 802.11 PHY data rates of up to 433 Mbps
- Driver support for Linux
- Advanced Power management system allowing “Always On”
- Bluetooth 4.2
- Internal co-existence arbitration
- FCC and CE approved reference design
- Interfaces SDIO 3.0, HS UART, PCM
- Industrial temp range -40 to +85C°
- High RF output TX power
- Supports multiple SW features such as 802.11 e/i (Security, QoS), Soft AP and Wi-Fi Direct
- Extensive DMA hardware support for data flow to reduce CPU load
- RoHS compliant

# SPB209A WLAN and Bluetooth Module



## Technical Data

<b>Wireless Network Standard Support</b>	IEEE 802.11a/b/g/n/ac, BT4.2
<b>Frequency Band</b>	Dual, 2.4/5 GHz
<b>Data rates</b>	802.11 a/b/g standard rates 802.11n 20/40Mhz channels 802.11ac 20/40/80Mhz channels up to 433Mbps Bluetooth BR, EDR 2Mbps
<b>Hardware interfaces</b>	SDIO 3.0, UART, GPIO:s – Host / PCM – BT Audio
<b>WLAN functions, QoS</b>	Power save modes, automatic roaming, Ad-hoc, Soft AP, Wi-Fi Direct and Infrastructure mode
<b>Wireless Security</b>	✓ WEP-64 ✓ WEP-128 ✓ WPA-PSK ✓ WPA2-PSK
<b>NFC</b>	Functions: R/W, Card Emulation and P2P
<b>Bluetooth</b>	BT for stereo audio and data BLE for fast configuration and sensor data upload
<b>HW dimensions</b>	14 mm x 14 mm x 2.5 mm
<b>Output power</b>	802.11 b: 18 dBm 802.11 a/g/n/ac: 15 dBm Bluetooth: 7 dBm
<b>Power consumption</b>	2.5GHz HT20: Wi-Fi IEEE 802.11 b TX 295mA RX:51mA Wi-Fi IEEE 802.11 g/n/ac: TX 285mA / RX 66mA 5GHz HT80: Wi-Fi IEEE 802.11 ac MCS9: TX 330mA / RX 121mA BT BT TX (+4dBm) 22mA / RX 17mA
<b>Supply Voltage</b>	3.0-3.6V
<b>Operating Temp.</b>	-40 to + 85°C (industrial)

Technical Data for TRIA SPB209A

# SPB209A WLAN and Bluetooth Module



## Order Reference

Part No.	Description	Integrated PCB Antenna	LTE Filter	Chip
SPB209A-LRNMQ	WLAN BT MODULE without Antenna without LTE Filter	No	No	88W8887-A2-CBKE/AZ
SPB209A-LRLMQ	WLAN BT MODULE without Antenna with LTE Filter	No	Yes	88W8887-A2-CBKE/AZ
SPB209A-LBNMZ	WLAN BT MODULE with Antenna without LTE Filter	Yes	No	88W8887-A2-CBKE/AZ
SPB209A-LBLMZ	WLAN BT MODULE with Antenna with LTE Filter	Yes	Yes	88W8887-A2-CBKE/AZ

Ordering Information for available SPB209A-versions

Tria Technologies GmbH  
Industriestr. 16  
76297 Stutensee  
info@tria-technologies.com  
tria-technologies.com

Copyright © 2024 Tria Technologies GmbH. All data is for information purposes only and is subject to change without notice. No guarantee for legal purposes is implied. Information in this document has been carefully checked, however, no responsibility for inaccuracies has to be assumed. All brand or product names may be trademarks and property of their respective owners.