

# Quectel FC10

## LCC Wi-Fi Module



Quectel FC10 is a cost-effective embedded Wi-Fi solution providing high performance connectivity capabilities. Designed with ultra-compact 16.6mm × 13.0mm × 2.1mm form factor, FC10 module can effectively optimize size and cost for end-products, which totally meets the customer requirements on size sensitive applications to the maximum extent.

FC10 adopts surface-mount technology (SMT), making it an ideal solution for durable and rugged designs. The low profile and small size of LCC package make sure FC10 can be easily embedded into size-constrained applications and also provide reliable connectivity with these applications. The advanced package is ideally suited for fully automated large-scale manufacturing which has strict requirements for cost and efficiency. Additionally, the module can be manually soldered for low-volume applications.

Combining advantages such as compact form factor, low power consumption, extended temperature range and stable SDIO interface, FC10 is typically used in combination with Quectel EC20 LTE module to serve a wide range of M2M applications, such as automotive, security, industrial PDA, MiFi, medical and more.



### Key Benefits

- ✓ Ultra compact Wi-Fi module
- ✓ Easier soldering and testing process with LCC package
- ✓ Stable and reliable SDIO communication interface
- ✓ Support IEEE802.11b/g/n standard
- ✓ Fast time-to-market: simple design minimizes design-in time and development efforts



Ultra Compact Size



SDIO Interface



IEEE802.11 b/g/n Standard



LCC Package



Extended Temperature range: -40°C ~ +85°C



RoHS Compliant

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## LCC Wi-Fi Module



### Data

802.11b: Max 11Mbps

802.11g: Max 54Mbps

802.11n: Max 65Mbps

### General Features

Frequency Range: 2.4~2.4835GHz

WLAN Standard: 802.11b/g/n

Channel Number: 14

Modulation Mode:

DBPSK, DQPSK, BPSK, QPSK, 16QAM, 64QAM

Encryption Mode:

WEP, TKIP, AES, WPA-PSK, WPA2-PSK

AP (Max Access Point): 10

Supply Voltage Range:

3.14~3.46V, 3.3V Typ.

Temperature Range: -40 °C ~ +85 °C

Dimension: 16.6mm × 13.0mm × 2.1mm

Weight: About 0.63g

### Electrical Characteristics

#### Receiving Sensitivity:

-93dBm @802.11b/1Mbps

-85dBm @802.11b/11Mbps

-89dBm @802.11g/6Mbps

-72dBm @802.11g/54Mbps

-90dBm @802.11n/HT20 MCS0

-69dBm @802.11n/HT20 MCS7

#### Transmitting Power:

13dBm @802.11b/11Mbps

12.5dBm @802.11g/6Mbps

9.5dBm @802.11g/54Mbps

10dBm @802.11n/HT20 MCS0

6dBm @802.11n/HT20 MCS7

### Interfaces

SDIO V2.0 × 1

Reset × 1

Wi-Fi Antenna × 1

### Approvals

CE (Europe)