

## WLAN 802.11 b/g/n and *Bluetooth*® v4.0 BLE Module from Murata

### FEATURES

- IEEE 802.11 b/g/n Wi-Fi
- Typical WLAN Transmit power:
  - +14.5dBm, 65Mbps (11n)
  - +20dBm, 11Mbps (11b)
- Typical WLAN Receiver sensitivity:
  - –70dBm, 65Mbps
  - –88dBm, 11Mbps
- *Bluetooth*® v4.0 with Bluetooth Low Energy (BLE)
- Typical *Bluetooth* Sensitivity:
  - –92dBm DH5
  - –85dBm EDR
- *Bluetooth* Power class 1.5
  - +8dBm BDR (Typical)
- Best-in-class WLAN and *Bluetooth* Coexistence Technology on a Single-chip
- Enhanced Low Power (ELP™) Technology for Extended Battery Life
- On module 38.4MHz Reference Oscillator, DC-DC Voltage Regulation, and U.FL Coaxial
- Hardware and Software Pre-integration With TI's AM335x (ARM Cortex-A8) Platform
- Software Upgradable for ANT
- Dimensions: 17 mm x 10 mm x 2.2 mm
- FCC Certified
- Operating Temperature Range: –30°C to 75°C

### APPLICATIONS

- Mobile Consumer Devices
- Industrial and Home Automation, metering
- Portable data terminals
- Video Conferencing, Video Camera

### DESCRIPTION

The following product brief applies to Murata's Wi-Fi + Bluetooth module, series name: Type TN. The Wi-Fi + *Bluetooth* chip used is the WL1271 from Texas Instruments.

The WL1271-TypeTN is a fully-integrated high performance module offered by Murata utilizing TI's single-chip WL1271 2.4GHz IEEE 802.11 b/g/n and *Bluetooth* v4.0 BLE Transceiver. Based on TI's 6<sup>th</sup> generation Wi-Fi technology and 7<sup>th</sup> generation *Bluetooth* technology, the solution provides best-in-class coexistence capabilities coupled with TI's Enhanced Low Power (ELP™) technology. The WL1271-TypeTN is provided as a module to help customers reduce development time, lower manufacturing costs, save board space, ease certification, and minimize RF expertise required. For evaluation and development, platforms are available which integrate the WL1271-TypeTN module, Linux Wi-Fi drivers, BlueZ *Bluetooth* stack, and sample source applications running on a TI host processor (AM335x).

The full specification and purchasing of the WL1271-TypeTN module can be found on Murata's website ([www.murata-ws.com/type-tn.htm](http://www.murata-ws.com/type-tn.htm)). More information on TI's wireless platform solutions can be found on the Wireless Connectivity Wiki ([www.ti.com/connectivitywiki](http://www.ti.com/connectivitywiki)).

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### Applications

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