

**PRODUCT SUMMARY**

# SKY85314-11: 2.4 GHz, 64 QAM WLAN Front-End Module

**Applications**

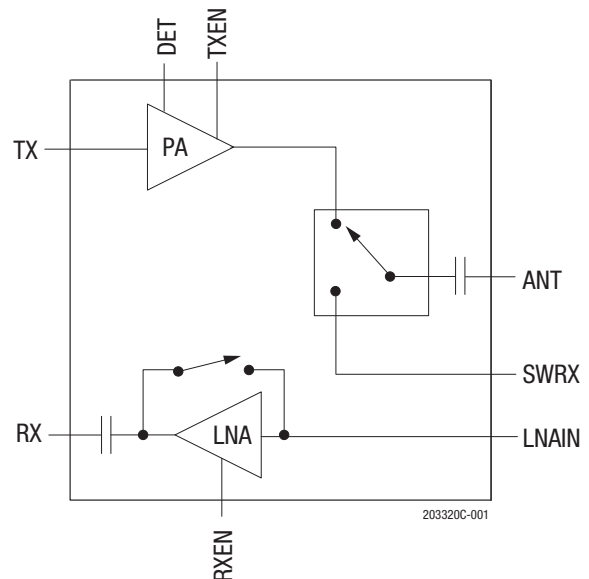
- 802.11b/g/n networking, set-top boxes, and personal computer systems
- WLAN-enabled wireless video systems

**Features**

- Integrated high-performance 2.4 GHz PA, LNA with bypass, and T/R switch
- LNA with integrated bypass mode
- Transmit gain: 25 dB
- Receive gain: 16 dB
- Output power: +18.5 dBm @ 3% EVM, 64 QAM 3/4
- Output power: +18 dBm, MCS7
- Small QFN (16-pin, 2.5 mm × 2.5 mm) package (MSL1, 260 °C per JEDEC J-STD-020)



Skyworks Green™ products are compliant with all applicable legislation and are halogen-free. For additional information, refer to *Skyworks Definition of Green™*, document number SQ04-0074.



**Figure 1. SKY85314-11 Block Diagram**

**Description**

The SKY85314-11 is a complete 802.11b/g/n 64 QAM WLAN RF front-end module (FEM). The device provides all the functionality of a fully matched power amplifier (PA), power detector, low-noise amplifier (LNA), and single-pole, double-throw (SPDT) switch.

The SKY85314-11 provides a complete 2.4 GHz WLAN RF solution from the output of the transceiver to the antenna, and from the antenna to the input of the transceiver. The LNA increases the receive sensitivity of embedded solutions to improve range.

The SKY85314-11 also includes a transmitter power detector with 20 dB of dynamic range, and a digital enable control for transmitter power ramp on/off control.

The device is provided in an ultra-compact, 16-pin, 2.5 × 2.5 mm Quad Flat No-Lead (QFN) package. A functional block diagram is shown in Figure 1.

## Ordering Information

| Model Name                            | Manufacturing Part Number | Evaluation Board Part Number |
|---------------------------------------|---------------------------|------------------------------|
| SKY85314-11: 2.4 GHz Front-End Module | SKY85314-11               | SKY85314-11-EK1              |

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