

PRODUCT SUMMARY

SKY77786-11 High Band Multimode Multiband Power Amplifier Module Supporting LTE Advanced Applications

Applications

- Multiband 4G / LTE handsets
- FDD LTE Bands 7 and 30
- TDD LTE Band 38, 40, 41

Features

- Two T/R (RX) port and 3 outputs
- Industry-leading PAE for 4G
- Optimized for APT DCDC operation
- Fully programmable Mobile Industry Processor Interface (MIPI) control
- MIPI programmable bias modes optimize best 4G efficiency/linearity performance.
- Small, low profile package:
 - 3.0 x 3.0 x 0.71 mm
 - 20-pad configuration



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.

Description

Skyworks SKY77786-11 SkyLiTE™ is a multimode multiband (MMMB) Power Amplifier Module (PAM) that supports 4G handsets and operates efficiently in LTE bands from 2.3 GHz to 2.7 GHz. The module is fully programmable through a Mobile Industry Processor Interface (MIPI®).

The PAM consists of a single high band LTE block, a Multi-Function Control (MFC) block, and a T/R switch block. RF input/output ports internally matched to 50 Ω to reduce the number of external components. A CMOS integrated circuit uses standard MIPI controls to provide the internal MFC interface and operation. Extremely low leakage current maximizes handset standby time.

The InGaP die and the silicon die and passive components are mounted on a multi-layer laminate substrate. The assembly is encapsulated in a 3.0 mm x 3.0 mm x 0.71 mm, 20-pad MCM, SMT package which is a more highly manufacturable, low cost solution.

4G: The SKY77786-11 supports 1.4, 3, 5, 10, 15, 20, 30, 35, 40 MHz channel bandwidths. Similar to 3G operation, output power is controlled by varying the input power and V_{CC} is adjusted using a DCDC converter to maximize efficiency for each power level.

4G Modulation scheme includes:

- FDD LTE
- TDD LTE
- Uplink Carrier Aggregation (CA) support for Bands 40/41 (up to 40 MHz)

Ordering Information

Product Name	Order Number	Evaluation Board Part Number
SKY77786-11 SkyLITE™ Multimode Multiband Power Amplifier Module	SKY77786-11	EN41-D315-001

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