

PRODUCT SUMMARY

SKY66520-11: 3300 to 3800 MHz Wide Instantaneous Bandwidth High-Efficiency Power Amplifier

Applications

- 5G NR and 4G LTE enterprise small cell
- Driver amplifier for micro base stations and macro base stations
- 5G massive MIMO driver

Features

- Wide instantaneous signal bandwidth: 200 MHz
- Wide operational bandwidth: 3300 to 3800 MHz
- High output power: 30 dBm with 200 MHz signal
- High linearity: 3GPP compliant with 200 MHz 5G, 8.5 dB PAR signal
- High efficiency
- High gain
- Integrated active bias: performance compensated over temp
- Integrated enable ON/OFF function
- Pin-to-pin compatible PA family supporting major 3GPP bands
- Compact (16-pin, 5 × 5 mm) package (MSL3, 260 °C per JEDEC J-STD-020)



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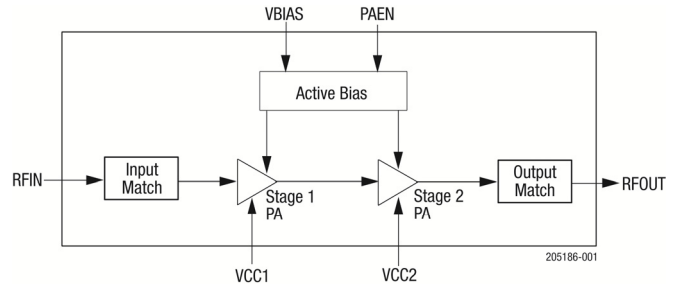


Figure 1. SKY66520-11 Block Diagram

Description

The SKY66520-11 is a 200 MHz wide instantaneous bandwidth, fully input/output matched 30 dBm power amplifier (PA) with high gain, efficiency and linearity. The compact 5 × 5 mm PA is designed for 5G NR and 4G LTE systems operating from 3300 to 3800 MHz. The active biasing circuitry is integrated to compensate PA performance over temperature, voltage, and process variation.

The SKY66520-11 is part of high-efficiency, pin-to-pin compatible PA family supporting major 3GPP bands.

A block diagram of the SKY66520-11 is shown in Figure 1 and Table 1 lists the pin-to-pin compatible parts in the PA family.

Table 1. Pin-to-Pin Compatible PA Family

Part Number	Frequency (MHz)	3GPP Band
SKY66520-11	3300 to 3800	n78, B42, and B43
SKY66523-11	3550 to 4200	n77, n48
SKY66312-11	2300 to 2400	Bands 30 and 40
SKY66317-11	2496 to 2690	Bands 7, 38, and 41
SKY66318-11	3300 to 3600	Bands 22, 42, n77, and n78
SKY66318-21	3400 to 3700	Bands 22, 42, n77, and n78
SKY66320-11	3550 to 3800	Bands 43, 48, and n77
SKY66319-11	4400 to 5000	Band n79

Ordering Information

Part Number	Product Description	Evaluation Board Part Number
SKY66520-11	3300 to 3800 MHz Wide Instantaneous High-Efficiency PA	SKY66520-11EK1

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