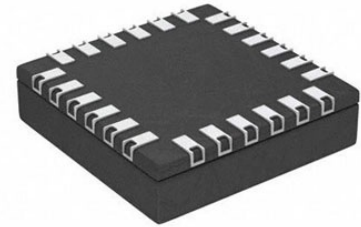


900MHz ISM Band Analog RF Front End; Package: 48 ld LFCSP (7x7mm w_4.1mm EP);
No of Pins: 48; Temperature Range: Commercial

| | |
|---------------|-------------------------------------|
| Manufacturers | Analog Devices, Inc |
| Package/Case | 48-WFQFN, CSP |
| Product Type | RF Integrated Circuits |
| RoHS | Pb-free Halide free |
| Lifecycle | |



Images are for reference only

Please submit RFQ for ADF9010BCPZ or [Email to us: sales@ovaga.com](mailto:sales@ovaga.com) We will contact you in 12 hours.

[RFQ](#)

General Description

The ADF9010 is a fully integrated RF Tx modulator and Rx analog baseband front end that operates in the frequency range from 840 MHz to 960 MHz. The receive path consists of a fully differential I/Q baseband PGA, low-pass filter, and general signal conditioning before connecting to an Rx ADC for baseband conversion. The Rx LPF gain ranges from 3 dB to 24 dB, programmable in 3 dB steps. The Rx LPF features four programmable modes with cutoff frequencies of 330 kHz, 880 kHz, and 1.76 MHz, or the filter can be bypassed if necessary.

The transmit path consists of a fully integrated differential Tx direct I/Q upconverter with a high linearity PA driver amplifier. It converts a baseband I/Q signal to an RF carrier-based signal between 840 MHz and 960 MHz. The highly linear transmit signal path ensures low output distortion.

Complete local oscillator (LO) signal generation is integrated on chip, including the integer-N synthesizer and VCO, which generate the required I and Q signals for transmit I/Q upconversion. The LO signal is also available at the output to drive an external RF demodulator. Control of all the on-chip registers is via a simple 3-wire serial interface. The device operates with a power supply ranging from 3.15 V to 3.45 V and can be powered down when not in use.

Features

840 MHz to 960 MHz ISM bands

Rx baseband analog low-pass filtering and PGA

Integrated RF Tx upconverter

Integrated integer-N PLL and VCO

Integrated Tx PA preamplifier

Differential fully balanced architectures

3.3 V supply

See Data Sheet for Additional Information

Application

900 MHz RFID readers

Unlicensed band 900 MHz applications

Related Products



[ADL5330ACPZ](#)

Analog Devices, Inc
LFCSP24



[ADL5240ACPZ-R7](#)

Analog Devices, Inc
LFCSP-32



[AD630SD](#)

Analog Devices, Inc
20 ld Side-BrazedCerDIP



[ADRF5040BCPZ](#)

Analog Devices, Inc
HIGH ISOLATION, SP4T, 9KHZ - 12G



[AD607ARSZ-REEL](#)

Analog Devices, Inc
SSOP-20



[AD831AP](#)

Analog Devices, Inc
20 ld PLCC



[ADG901BRM](#)

Analog Devices, Inc
MSOP-8



[ADL5350ACPZ](#)

Analog Devices, Inc
LFCSP-8