# ATF65559-11

## Wi-Fi 7 5 GHz Front End Module


16 Pin 3×3 mm QFN Package

## Key Features

- Frequency Range：5.15 - 5.895 GHz
- Optimized for +5 V Operation
- Transmit gain：32 dB
- Receive gain: 15.5 dB
- Noise Figure：1.8 dB
- 10 dB 2.4 GHz Rejection on Rx Path
- Integrated RF Couple and DC Power Detector
- Output power：
  - MCS13, +19 dBm, -43 dB DEVM
  - MCS11, +20.5 dBm, -40 dB DEVM
  - MCS9， +23 dBm, -35 dB DEVM
  - MCS0, +26 dBm, Spectral Mask Compliance
- Small 16-pin, 3 × 3 mm QFN package

## Product Overview

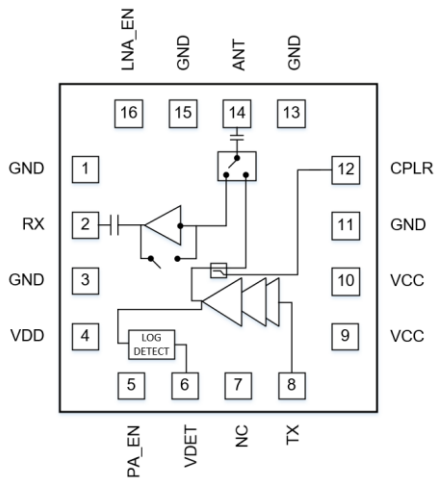
The ATF65559-11 is an integrated front end module (FEM) designed for Wi-Fi 7 (802.11be) systems. The compact form factor and integrated matching minimizes layout area in the application.

Performance is focused on optimizing the PA for a 5V supply voltage that conserves power consumption while maintaining the highest linear output power and leading edge throughput.

Integrated die level filtering for 2nd and 3rd harmonics as well as 2.4 GHz rejection for DBDC operation are included. A RF coupler, as well as, broadrange, constant slope voltage logarithmic power detector is provided for application feedback.

The ATF65559-11 integrates a 5 GHz power amplifier (PA), single pole two throw switch (SPDT) and bypassable low noise amplifier (LNA) into a single device.

## Function Block Diagram




ATF65559-11 Block Diagram

## Applications

- Access Points
- Wireless Routers
- Residential Gateways
- Customer Premise Equipment
- Internet of Things