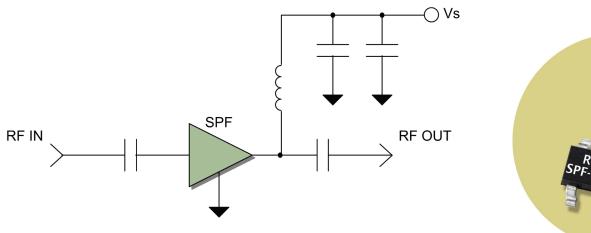
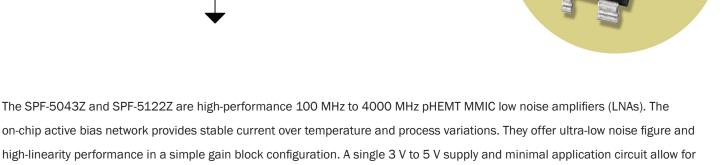
## RFMD® SPF-5043Z and SPF-5122Z

## 100 MHz to 4000 MHz, GaAs pHEMT MMIC Low Noise Amplifiers





on-chip active bias network provides stable current over temperature and process variations. They offer ultra-low noise figure and high-linearity performance in a simple gain block configuration. A single 3 V to 5 V supply and minimal application circuit allow for maximum flexibility with a low bill of materials cost. High P1 dB and maximum RF input power specifications make these LNAs ideal for high dynamic range receivers. They are internally matched to 50 ohms.

## SPF-5043Z AND SPF-5122Z SPECIFICATIONS

| Part Number | Frequency           | Gain                 | ld    | NF                  | Output IP3          | P1dB                | Vcc       |
|-------------|---------------------|----------------------|-------|---------------------|---------------------|---------------------|-----------|
| SPF-5043Z   | 100 MHz to 4000 MHz | 18.2 dB <sup>1</sup> | 46 mA | 0.8 dB <sup>1</sup> | 33 dBm <sup>1</sup> | 20 dBm <sup>1</sup> | 3.0 - 5.0 |
| SPF-5122Z   | 100 MHz to 4000 MHz | 18.9 dB <sup>1</sup> | 90 mA | 0.6 dB <sup>1</sup> | 38 dBm <sup>1</sup> | 23 dBm <sup>1</sup> | 3.0 - 5.0 |

<sup>1 -</sup> Typical Performance at 900 MHz

## **FEATURES**

- Single 3 V to 5 V supply operation
- · Broadband internal matching
- Robust MSL-1 rating
- · Ultra low noise figure, high linearity

- Multiband operation
- Active biased
- · Ideal for cellular, PCS, WCDMA, ISM Band, WiMAX receivers and low-noise, high-linearity gain block applications

