

Features

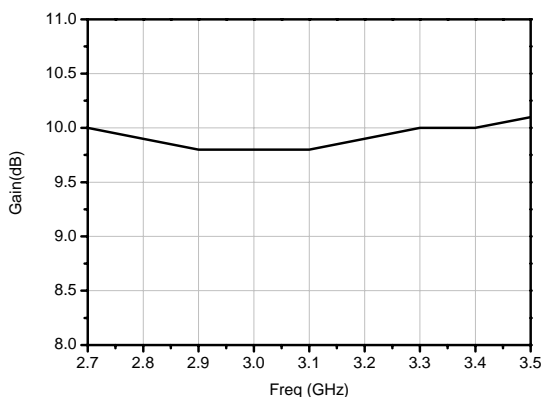
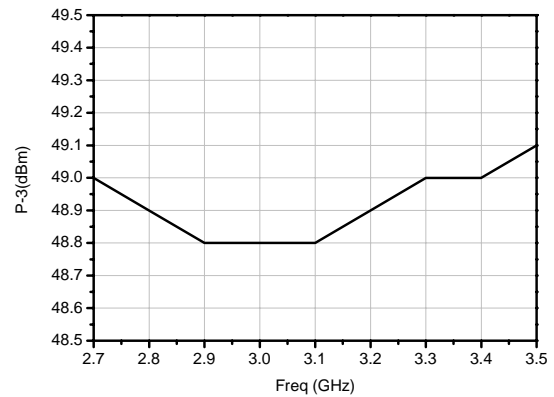
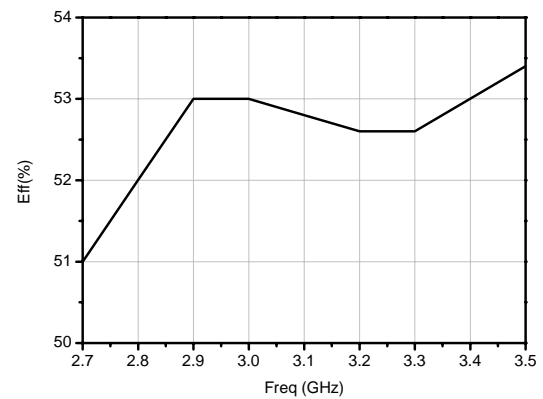
Freq: 2.7~3.5GHZ
 Power Gain: 10dB
 Output P_{3dB}(P_{3dB}): 49dBm
 PAE@P_{3dB}(PAE_{3dB}): 50%
 2nd/3rd Harmonic: -15dBc
 Supply Voltage: +28V(V_{dd}), -2.4V(V_{gg})
 Chip Size:24mm×17.4mm×5.5mm

General Description

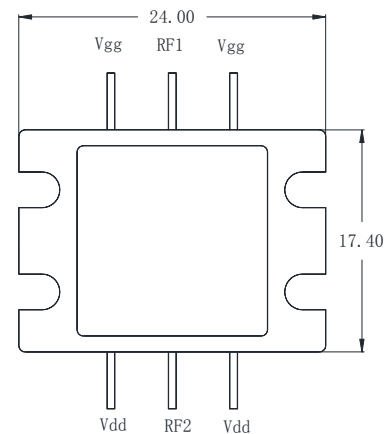
The HG533FB-F07 is an internally-matched GaN HEMT operating between 2.7 and 3.5GHz. The module has been optimized to provide 10dB gain, 47dBm output power for 3dB compression, and 50% efficiency at P_{3dB}.

Electrical Specifications(T_A=25 °C, V_{dd}= 28V).

Parameter	Min.	Typ.	Max.
Freq(GHz)	2.7~3.5		
Gain (dB)	—	10	—
Gain Flatness (dB)	—	±0.5	—
Input VSWR	—	2	—
Output VSWR	—	2	—
P _{3dB} (dBm)	—	49	—
PAE _{3dB}	—	50%	—
2 nd /3 rd Harmonic(dBc)	—	-15	—

Measured Performance
Power Gain

Output Power for 3dB Compression

PAE@P_{3dB}

Absolute Maximum Ratings

Supply Voltage	+36V
RF Input Power	+43dBm
Operating Temperature	-55 °C ~ 125 °C
Storage Temperature	-65 °C ~ 150 °C

Outline Drawing (mm)(Package:QF136GC)


Notes:

1. The module should be stored in a dry and nitrogen environment, and used in a clean environment.
2. The pin of the module is brittle, easy to break by external force ,so must be careful when using.
3. The feeder line of the gate and drain need a decoupling capacitor of 10uF, the absolute voltage should not less than 50V.
4. GaN devices are susceptible to damage from electrostatic discharge, proper precautions should be observed in use.