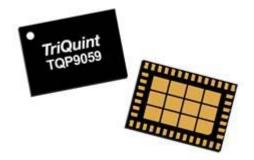


## **Applications**

- WCDMA/HSDPA/HSUPA/HSPA+/ LTE
- QB GMSK + EDGE
- B34, B39 TD-SCDMA, TD-LTE
- BC0, BC1 CDMA2000



42-Pin 5x7x1 mm Package

### **Product Features**

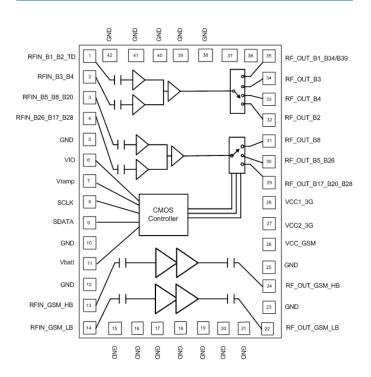
- ET optimized/ APT compatible
- Quad-Band Linear GSM/EDGE
- UMTS Bands 1, 2, 3, 4, 5, 8, 12, 17, 20, 26, 28
- CDMA 2000 BC0, BC1
- WCDMA has 2 modes HPM & LPM
- Input power controlled 8PSK
- Vramp controlled output power GMSK
- Vramp optimized bias in 8PSK for linearity and current consumption
- Integrated band distribution switches
- HBT / CuFlip® PA Technology
- 50 Ohm input and output impedance
- Lead-free 260°C/RoHS/Halogen-free

#### **General Description**

The TQP9059 is a fully matched multimode multiband Power Amplifier Module that supports Quad-band GSM/EDGE, W/CDMA & LTE Bands 1, 2, 3/4, 5, 8, 12, 17, 20, 26, and 28; and CDMA 2000 bands BC0 and BC1 for both ET and APT operation. The GSM PA output power is controlled by a Vramp input from the transceiver in GMSK modes, while for 8PSK operation Vramp is used to optimize current consumption and linearity. The 2-Gain state WCDMA PA operates in LPM and HPM to maximize talk time over the entire range of operating conditions. It also includes a built-in regulator, ideal for today's extremely small data enabled phones.

The TQP9059 is designed on TriQuint's GaAs HBT technology with CuFlip® assembly offering state of the art reliability, temperature stability and ruggedness. RF performance meets the stringent linearity requirements for multi-mode operation.

**Functional Block Diagram** 



# **Ordering Information**

Part No.	Description
TQP9059	Quad-Band EDGE + Hepta-band WCDMA Multi-Mode PA Module
Standard T/R size = 2500 pieces on a 7" reel	