



GPS Receiver 1575.42MHz 3.3V Automotive 28-Pin TQFN EP T/R

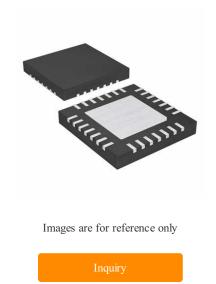
Manufacturer: <u>Maxim Integrated</u>

Package/Case: QFN28

Product Type: Discrete Semiconductor Modules

RoHS: RoHS Compliant/Lead free

Lifecycle: Active



General Description

The MAX2769 is the industry's first global navigation satellite system (GNSS) receiver covering GPS, GLONASS, and Galileo navigation satellite systems on a single chip. This single-conversion, low-IF GNSS receiver is designed to provide high performance for a wide range of consumer applications, including mobile handsets. Designed on Maxim's advanced, low-power SiGe BiCMOS process technology, the MAX2769 offers the highest performance and integration at a low cost. Incorporated on the chip is the complete receiver chain, including a dual-input LNA and mixer, followed by the image-rejected filter, PGA, VCO, fractional-N frequency synthesizer, crystal oscillator, and a multibit ADC. The total cascaded noise figure of this receiver is as low as 1.4dB. The MAX2769 completely eliminates the need for external IF filters by implementing on-chip monolithic filters and requires only a few external components to form a complete low-cost GPS receiver solution. The MAX2769 is the most flexible receiver on the market. The integrated delta-sigma fractional-N frequency synthesizer allows programming of the IF frequency within a ±40Hz accuracy while operating with any reference or crystal frequencies that are available in the host system. The integrated ADC outputs 1 or 2 quantized bits for both I and Q channels, or up to 3 quantized bits for the I channel. Output data is available either at the CMOS logic or at the limited differential logic levels. The MAX2769 is packaged in a compact 5mm x 5mm, 28-pin thin QFN package with an exposed paddle. The part is also available in die form. Contact the factory for further information.

Key Features Application

GPS/GLONASS/Galileo Receivers Digital Still Cameras and Camcorders

No External IF SAW or Discrete Filters Required

In-Vehicle Navigation Systems

Programmable IF Frequency

Fractional-N Synthesizer with Integrated VCO Supports Wide Range of Reference Frequencies

Dual-Input Uncommitted LNA for Separate Passive and Active Antenna Inputs

Location Based Services (LBS)

1.4dB Cascade Noise Figure PDAs (Personal Digital Assistants)

Integrated Crystal Oscillator PMPs (Personal media Players)

Integrated Active Antenna Sensor
PNDs (Personal Navigation Devices)

10mA Supply Current in Low-Power Mode

Small, 28-Pin, RoHS-Compliant, Thin QFN Lead-Free Package (5mm x 5mm)

Telematics (Asset Tracking, Inventory Management)

Recreational/Marine Navigation/Avionics

Laptops and Ultra-Mobile PCs

Recommended For You

2.7V to 3.3V Supply Voltage

MAX2309EGI MAX2021EIX MAX2150ETI

Maxim Integrated Maxim Integrated Maxim Integrated

QFN QFN

MAX2608EUT MAX2829EIN+ MAX2606EUT

Maxim Integrated Maxim Integrated Maxim Integrated

SOT23-6 QFN56 SOT23-6

MAX2015EUA+ MAX2051ETP+ MAX41461GUB+

Maxim Integrated Maxim Integrated Maxim Integrated

MSOP8 QFN-52 MSOP10

MAX4003EUA+T MAX1473EUI MAX2674EWT+T

Maxim Integrated Maxim Integrated Maxim Integrated

MSOP8 TSSOP28 6WLP

MAX4003EUA+ MAX2659ELT+T MAX2769EII+

Maxim Integrated Maxim Integrated Maxim Integrated

MSOP8 UDFN-6 28TQFN