

GSM | GPRS

GC 864-QUAD

GC 864-PY





Ultra Compact



Telit Unified AT Command Set



Telit Unified Form Factor



Quad Band GPRS



GPRS Class 10



RoHS Compliant



SIM Access Profile



Script Interpreter



80 Pin Connector



Embedded FTP and SMTP Client



Extended Temperature Range



Extended RF Sensitivity



Serial Port Multiplexer (GSM 7.10)



Embedded TCP/IP Stack

optional



Integrated SIM holder



TELIT INFINITA SERVICES





The new GC864 product family is one of the smallest GSM/GPRS quad-band modules with industrial connectors in the market.

With its ultra-compact design and extended temperature range, the Telit GC864-QUAD is the perfect platform for medium-volume m2m applications and mobile data devices. Additional features such as integrated TCP/IP protocol stack, SIM Holder on the board (only for GC864-QUAD with SIM holder variant) and serial multiplexer give extend functionality of the application at no additional cost.

The GC864-PY makes it possible to run the customer's application inside the module, thus making it one of the smallest, complete platforms for m2m solutions. State-of-theart SPI and IIC interfaces provide connectivity to external peripherals such as sensors and displays.

All Telit modules, support Over-the-Air firmware update by means Premium FOTA Management. By embedding RedBend's vCurrent® agent, a proven and battle-tested technology powering hundreds of millions of cellular handsets world-wide Telit is able to update its products by transmitting only a delta file, which represents the difference between one firmware version and another.

As a part of Telit's corporate policy of environmental protection, all products comply to the RoHS (Restriction of Hazardous Substances) directive of the European Union (EU Directive 2002/95/EG).

Product features

- Quad-band EGSM 850 / 900 / 1800 / 1900 MHz
- Output power
 - Class 4 (2W) @ 850 / 900 MHz
 - Class 1 (1W) @ 1800 / 1900 MHz
- Control via AT commands according to GSM 07.05, 07.07 and Telit enhancements
- Serial port multiplexer GSM 7.10
- SIM access profile
- Supply voltage range: 3.22-4.5 V DC (3.8 V DC recommended)
- TCP/IP stack access via AT commands

- Power consumption (typical values)
 - Power off: < 26 uA
 - Idle (registered, power saving): 2.6 mA
 - Dedicated mode: 200 mA
 - GPRS cl.10: 370 mA
- Sensitivity:
 - -107 dBm (typ.) @ 850 / 900 MHz
 - -106 dBm (typ.) @ 1800 / 1900 MHz
- Dimensions: 30 x 36.2 x 3.2 mm
- Weight: 6.1 grams
- Extended temperature range
- 40°C to +85°C (operational)
- 40°C to +85°C (storage temperature)
- RoHS compliant

GC 864-QUAD

GC864-PY







actual size GC864-QUAD

3C864-QUAD with SIM holder



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availability

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Interfaces

- 80-pin Molex connector
- 22 I/O ports maximum
- Analog audio (balanced and unbalanced)
- 3 A/D plus 1 D/A converter
- Buzzer output
- ITU-T V.24 serial link through UART:
 - CMOS level
 - Baud rate from 300 to 115,200 bps
 - Autobauding from 1,200 to 115,200 bps
- 50 Ohm murata GSC antenna connector

Audio

- Telephony, emergency call
- Half rate, full rate, enhanced full rate and adaptive multi rate voice codecs (HR, FR, EFR, AMR)
- Superior echo cancellation & noise reduction
- Handset & hands-free operations
- DTMF

Approvals

- Fully type approved conforming with R&TTE
- CE, GCF, FCC, PTCRB, IC, Anatel

SMS

- Point-to-point mobile originated and mobile terminated SMS
- Concatenated SMS supported
- SMS cell broadcast
- Text and PDU mode

Circuit switched data transmission

- Asynchronous transparent circuit switched data (CSD) up to 14.4 kbps
- Asynchronous non-transparent CSD up to 9.6 kbps
- V.110

GPRS data

- GPRS class 10
- Mobile station class B
- Coding scheme 1 to 4
- PBCCH support

Fax

Group 3, class 1

GSM supplementary

- Call forwarding
- Call barring
- Call waiting & call hold
- Advice of charge
- Calling line identification presentation (CLIP)
- Calling line identification restriction (CLIR)
- Unstructured supplementary services mobile originated data (USSD)
- Closed user group

Additional features

- SIM phonebook
- SIM Holder (only for GC864-QUAD variant with SIM holder)
- Fixed dialing number (FDN)
- Real-time clock
- Alarm management
- Battery management
- Network LED support
- IRA character SET, UCS2 and GSMDefault
- Jamming detection & report
- Embedded TCP/IP stack, including TCP, IP, UDP, SMTP and FTP protocols
- PFM (Premium FOTA Management) Over the Air Update
- MUX driver
- RIL driver

Python* application resources (GC864-PY ONLY)

- Python* script interpreter (module takes the application code directly in the Python* language)
- Memory: 1.9 MB of NV memory for the user scripts and 1 MB RAM for the Python* engine usage
- Over-the-air application SW update
- IIC Bus and SPI Bus controlled in Python*



Telit's EASY features

 EASY SCAN[®] automatic scan over GSM frequencies (also without SIM card)

Order-No.

Please contact your Telit representative for order codes and all further information

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