

File No.	File version	confidential

F3827 LTE&WCDMA ROUTER TECHNICAL SPECIFICATION

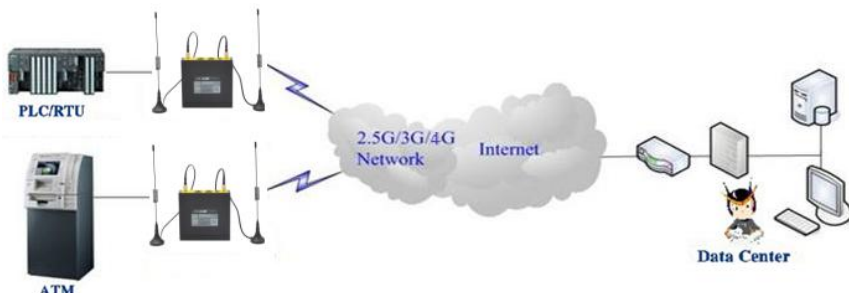


General

F3827 LTE&WCDMA Router is a kind of cellular terminal device that provides data transmission function by public LTE-FDD network.

It adopts high-powered industrial 32-bits CPU and embedded real time operating system. It supports RS232 (or RS485/RS422) and Ethernet port that can conveniently and transparently connect one device to a cellular network, allowing you to connect to your existing serial and Ethernet devices with only basic configuration.

It has been widely used on M2M fields, such as self-service terminal, intelligent transportation, smart grid, industrial automation, telemetry, finance, POS, water supply, environment protection, post, weather, and so on.



Product Feature

Design for Industrial Application

- ◆ High-powered industrial cellular module
- ◆ High-powered industrial 32bits CPU
- ◆ Support low-consumption mode, including sleep mode, scheduled online/offline mode, scheduled power-on/power-off mode(optional)
- ◆ Housing: iron, providing IP30 protection.
- ◆ Power range: DC 5~36V

Stability and Reliability

- ◆ Support hardware and software WDT
- ◆ Support auto recovery mechanism, including online detect, auto redial when offline to make router always online
- ◆ Ethernet port: 1.5KV magnetic isolation protection

- ◆ RS232/RS485/RS422 port: 15KV ESD protection
- ◆ SIM/UIM port: 15KV ESD protection
- ◆ Power port: reverse-voltage and overvoltage protection
- ◆ Antenna port: lightning protection(optional)

Standard and Convenience

- ◆ Support standard RS232(or RS485/RS422), Ethernet port that can connect to serial, Ethernet devices directly
- ◆ Support intellectual mode, enter into communication state automatically when powered

- ◆ Provide management software for remote management
 - ◆ Support several work modes
 - ◆ Convenient configuration and maintenance interface (WEB or CLI)
- High-performance**
- ◆ Support 3G/HSPA/4G WAN access methods.
 - ◆ Support VPN client(PPTP, L2TP, OPENVPN, IPSEC and GRE)(only for VPN version)
 - ◆ Support VPN server(PPTP, L2TP, OPENVPN, IPSEC and GRE)(only for VPN version)
 - ◆ Support local and remote firmware upgrade,import and export configure file.
 - ◆ Support NTP, RTC embedded.

- ◆ Support multiple DDNS provider service.
- ◆ Support MAC Address clone, PPPoE Server
- ◆ Support multi online trigger ways, including SMS, ring and data. Support link disconnection when timeout
- ◆ Support APN/VPDN
- ◆ Support DHCP server and client, firewall, NAT, DMZ host , URL block, QoS, traffic,statistics, real time link speed statistics etc.
- ◆ Full protocol support , such as TCP/IP, UDP, ICMP, SMTP, HTTP, POP3, OICQ, TELNET, FTP, SNMP, SSHD, etc.
- ◆ Schedule Reboot, Schedule Online and Offline,etc.

Product Specification
Cellular Specification


Cellular Module	Industrial cellular module
Cellular Module	Industrial cellular module
Standard and Band	LTE FDD 2600/2100/1800/900/800MHz, 700/1700/2100MHz(optional) HSPA+/HSDPA/HSUPA/WCDMA /UMTS900/2100MHz, 800/850/1900/2100MHz(optional) EDGE/GPRS/GSM 900/1800/1900MHz GPRS CLASS 10 GPRS CLASS 12
Bandwidth	LTE(DL:100Mbps,UL:50Mbps) HSUPA:5.76Mbps(Upload speed) HSDPA:7.2Mbps(Download speed) UMTS:384Kbps (DL/UL) HSPA+: 21Mbps(Download speed) 5.76Mbps(Upload speed)
TX power	<32dBm
RX sensitivity	<-93.3dBm

Hardware System

Item	Content
CPU	Industrial 32bits CPU
FLASH	16MB(Extendable to 64MB)
DDR2	128MB(Extendable to 256MB)

Interface type

Item	Content
Ethernet	1 10/100 Mbps Ethernet port(RJ45), auto MDI/MDIX, 1.5KV magnetic isolation protection
Serial	1 RS232(or RS485/RS422) port, 15KV ESD protection

	Data bits: 5, 6, 7, 8 Stop bits: 1, 1.5(optional), 2 Parity: none, even, odd, (space, mark) (optional) Baud rate: 2400~115200 bps
Indicator	"PWR", "SYS", "SIM", "Online", "ETH", "Signal Strength"
Antenna	Standard main, deputy SMA Yin double antenna interface, characteristic impedance 50 ohm
SIM/UIM	Standard 3V/1.8V user card interface, 15KV ESD protection
Power	Standard 3-PIN power jack, reverse-voltage and overvoltage protection
Reset	Restore the router to its original factory default settings
	

Power supply

Item	Content
Standard Power	DC 12V/1.5A
Power range	DC 5~36V

Power consumption

Working state	Power consumption
Standby	99~130mA@12VDC
Working	215~290mA@12VDC
Timing shutdown	3.15~3.70mA@12VDC

Physical Characteristics

Item	Content
Housing	Iron, providing IP30 protection
Dimensions	100x97x25 mm
Weight	320g

Environmental Limits

Item	Content
Operating Temperature	-35~+75°C (-31~+167°F)
Storage Temperature	-40~+85°C (-40~+185°F)
Operating Humidity	95% (unfreezing)