

FC-302 VHF/UHF Data Radio

Key Features

- Programmable 1W~5W Output Power
- 12.5KHz/25KHz Channel Spacing
- Programmable 16 channels
- Fast start-up time:5ms
- CTCSS/DCS Encode/Decode
- Pocsag Support
- Digital SQ programmable via PC
- LED Status Indicator
- Time out timer
- FCC,CE & AS/NZS Certified



Product Information

FC-302 is a PLL synthesized 5-watt FM transceiver module, which is designed for data transmission and voice communication. It can support preemphasis, squelch, CTCSS/DCS and audio amplifier. Two-point modulation technology makes good low frequency response and POCSAG application possible. The radio has fast start-up time and makes it a competitive choice for 1200-19200bps rate data application. Compact dimension and wide range DC support make it flexible to use.

Interface Description

Pin1	Audio in	Pin10	RXD(modem)
Pin2	Audio out	Pin11	TXD(modem)
Pin3	PTT	Pin12	CD_OUT(modem)
Pin4	13.8V DC	Pin13	NC
Pin5	Prog Data Out	Pin14	Ground
Pin6	Busy	Pin15	NC
Pin7	MIC IN/RSSI		
Pin8	Prog Data In		
Pin9	Speaker/pocsag		



DB15 FEMALE

Technical Specifications

General

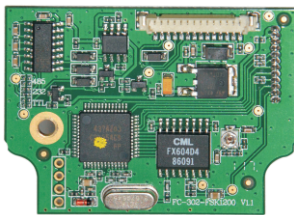
Frequency Range	VHF:136-174MHz UHF:400-440MHz,430-470MHz,450-490MHz
Channel Spacing	12.5 KHz/25KHz
Channel Capacity	16
Optional Modems.....	FSK-V23/Bell 202: 1200 bps 4FSK: 9600/19200 bps GMSK: 9600 bps
Power Supply.....	9.5V-16V DC
Operation Voltage	12V DC(Nominal)
Temperature Range.....	- 30°C ~+ 65°C(Operating) - 40°C ~+ 80°C (Storage)
Dimensions.....	63×122×32mm(L×W×H)

Transmitter

Output Power.....	1~5W(Programmable)
Modulation Type	F3D/F3E
TX Current.....	5W RF Power, 12V, 1.5A 1W RF Power, 12V, 1A
Standby(Muted) Current.....	65mA
TX Attack Time.....	<5ms
Frequency Deviation.....	<5KHz(25KHz) <2.5KHz(12.5KHz)
Audio Response.....	300Hz~3KHz +1/-3dB (25KHz) 300Hz~2.55KHz +1/-3dB(12.5KHz)
Adj. Channel Power.....	<- 70dBc(25KHz) <- 65dBc(12.5KHz)
TX SNR.....	>45dB(25KHz) >40dB(12.5KHz)

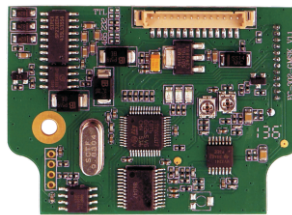
RX Sensitivity(12 dB Sinad)	<-119dBm Extreme<-115dBm
Intermodulation.....	>65dB
Audio Output Power.....	0.5W @ 8Ω
RX Audio Distortion.....	<5%
Image Rejection.....	>70dB
Spurious Rejection.....	>70dB

Data Modem of FC-302



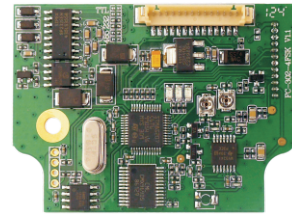
FC-302-FSK

Modulation: FSK
Data Rate:1200bps



FC-302-GMSK

Modulation: GMSK
Data Rate:9600bps



FC-302-4FSK

Modulation: 4FSK
Data Rate:9600/19200bps

- Serial Interface:TTL/RS-232/RS-485(8N1)
- Supply Voltage:DC +12.5V
- Data Transmission Mode:Transparent

Friendcom®

Shenzhen Friendcom Technology Development Co., Ltd.
Address:Complex Building, Wanyelong Industry Park, Shiyantown,
Bao'an District, Shenzhen, China
Tel: +86-755-23230518 +86-755-26621700
Fax: +86-755-86026300
Email:sales@friendcom.com support@friendcom.com

www.friendcom.com