



[Interface](#) / [Expansion](#) / [Power](#), [USB TO RS232](#) / [RS485](#) / [UART](#) / [CAN](#)

Industrial Isolated USB To 4-Ch RS232 Converter, USB To Serial Adapter,
Original FT4232HL Chip, Mac / Linux / Android / Windows Multi-OS
Compatible

SKU27022

Part No.USB TO 4CH RS232 (F)

BrandWaveshare

\$32.99

1

ADD TO CART

Price	Quantity
	Contact

\$32.39	2+
\$32.09	3+
\$31.97	4+

Version Options

- RS232 Male Port
- RS232 Female Port

DESCRIPTION	PACKAGE CONTENT
<div>Industrial Isolated USB To 4-Ch RS232 Converter, USB To Serial Adapter, Original FT4232HL Chip, Mac / Linux / Android / Windows Multi-OS Compatible, Wall-Mount Support</div>	
<div><div>Industrial Isolated USB Converter</div><div>USB To 4-Ch RS232</div><div>FT4232HL Stable Transmission Multiple Devices Applicable Multi-OS Compatible</div></div>	
<div>Contact</div>	



Features At A Glance

- Adopts original FT4232HL chip, fast communicating, stable and reliable, better compatibility
- Supports USB to 4-ch isolated RS232, convenient for expanding multiple RS232 industrial serial devices
- Onboard unibody power supply isolation, provides stable isolated voltage

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- Onboard unibody digital isolation, allows signal isolation, high reliability, strong anti-interference, low power consumption
- Onboard TVS (Transient Voltage Suppressor), effectively suppress surge voltage and transient spike voltage in the circuit, lightningproof & ESD protection
- Onboard self-recovery fuse and protection diodes, ensure the current/voltage stable outputs, provide over-current/over-voltage proof, improve shock proof performance
- Onboard power supply screw terminal, allows 5V~36V DC wide range input
- 9 LEDs for indicating the power and transceiver status
- Aluminum alloy enclosure with sand blasting and anodic oxidation, solid and durable

Version Options

Contact



USB TO 4CH RS232

to 4-ch RS232 male port



USB TO 4CH RS232 (F)

to 4-ch RS232 female port

Contact

Specifications

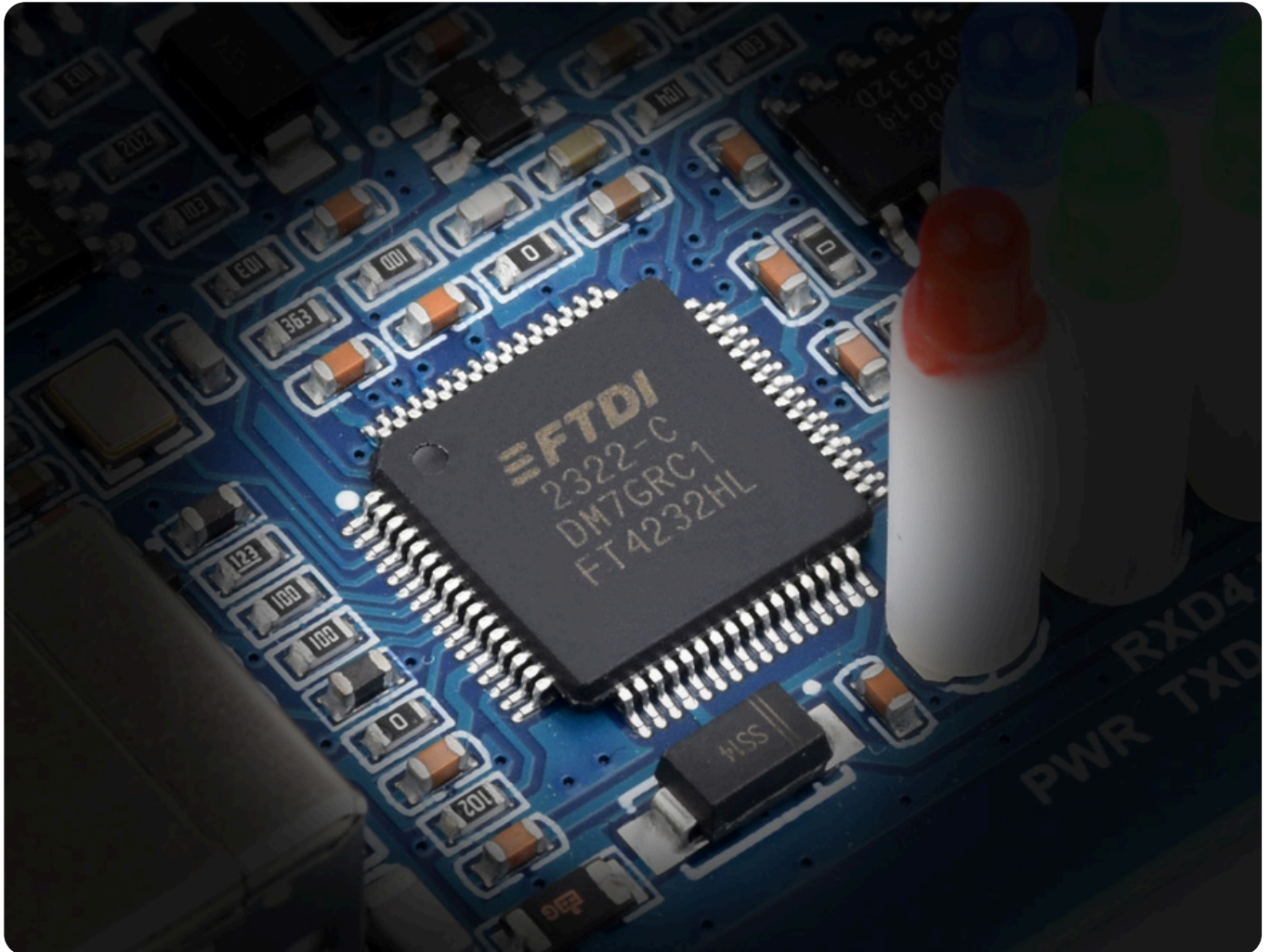
PRODUCT TYPE	Industrial USB to RS232 isolated converter	
HOST PORT	USB	
DEVICE PORT	RS232	
BAUD RATE	300bps ~ 921600bps	
USB	Operating voltage	5V
	Connector	USB-B
	Protection	200mA self-recovery fuse, isolated output
	Transmission distance	about 5m
POWER SUPPLY INTERFACE	Power supply	5~36V DC screw terminal
	Protection	Anti-reverse

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ISOLATED RS232	Connector	DB9 male/female
	Protection	TVS diode, surge protection & ESD protection, power isolation and signal isolation
	Transmission mode	Point-to-point
	Transmission distance	about 15m
INDICATORS	PWR	Red power indicator, lights up when there is USB connection and voltage is detected
	TXD1~4	Green TX indicator, blinking when the RS232 port is sending data
	RXD1~4	Blue RX indicator, blinking when the RS232 port is receiving data
OPERATING ENVIRONMENT	Temperature range	-40°C ~ 85°C
	Humidity range	5%RH~95%RH
OPERATING SYSTEM	MacOS, Linux, Android, Windows 11 / 10 / 8.1 / 8 / 7	

Contact

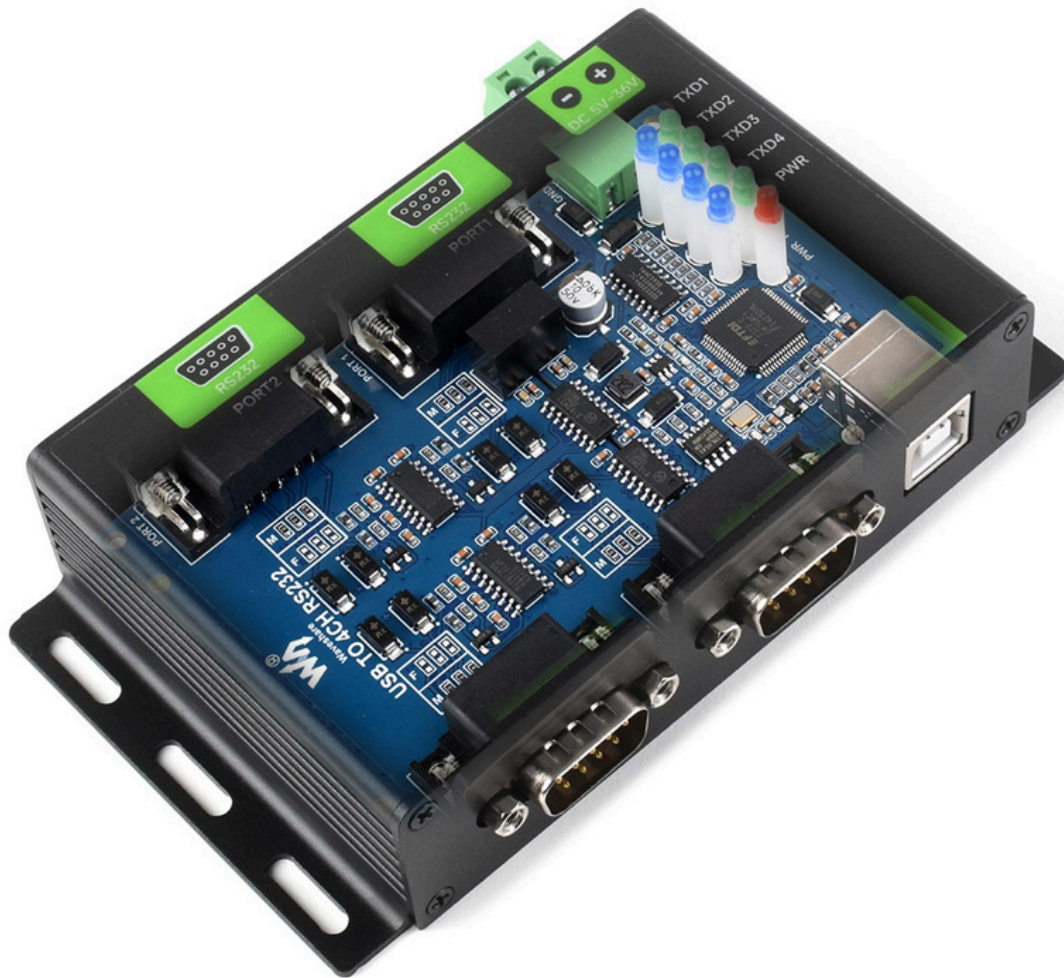
Onboard Original FT4232HL Chip,
Fast Communication, Stable & Reliable, Better Compatibility



- Onboard unibody power supply isolation, provides stable isolated voltage

<https://www.waveshare.com/usb-to-4ch-rs232.htm?sku=27022>

- Onboard unibody digital isolation, allows signal isolation, high reliability, strong anti-interference, low power consumption



Voltage
Isolation



Signal
Isolation



High
Reliability



Strong
Anti-Interference



Low
Power

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Multiple Protection, Safe And Stable

Onboard TVS (Transient Voltage Suppressor), effectively suppress surge voltage and transient spike voltage in the circuit, lightningproof & ESD protection. Onboard self-recovery fuse and protection diodes, ensure the current/voltage stable outputs, provide over-current/over-voltage proof, improve shock proof performance.

Contact



Multi System Support

Supports MacOS, Linux, Android, Windows 11 / 10 / 8.1 / 8 / 7, Etc.

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Aluminum Alloy Enclosure

Aluminum Alloy Enclosure With Sand Blasting And Anodic Oxidation, Solid And Durable

Contact



Aluminum Alloy Material,
Solid, Durable And Anti-corrosion

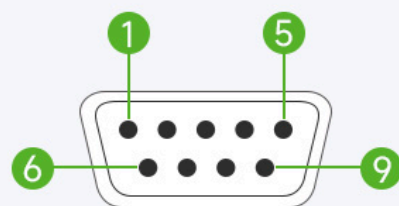


Pin Definition

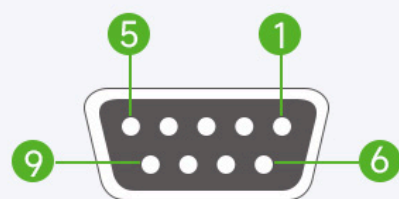
Contact

LED Indicators

PWR	Red power indicator, lights up when power connected
TXD1~4	Green TX indicator, blinking when the RS232 port is sending data
RXD1~4	Blue RX indicator, blinking when the RS232 port is receiving data



RS232 Male Pinout



RS232 Female Pinout

RS232 Pinout

DB9 (PIN)	RS232 Male Pinout	RS232 Female Pinout
2	Receiving data (RXD)	Sending data (TXD)
3	Sending data (TXD)	Receiving data (RXD)
5	Ground	Ground
1, 4, 6, 7, 8, 9	N/C	N/C

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Outline Dimensions



Resources & Services

Contact



WAVESHARE
ORIGINAL ✓



PROFESSIONAL
TECH SUPPORT



RICH RESOURCES
MANUAL & DEMO



User Manual



Circuit Diagram



Example Code




Dev Resources

WIKI: www.waveshare.com/wiki/USB_TO_4CH_RS232

* Resources for different product may vary, please check the wiki page to confirm the actually provided resources.

USB To Serial Port Converter Selection

MODEL	DESCRIPTION	SERIAL PORT CONVERTER
 USB TO RS232/485/TTL	USB to single-channel serial port; Adopts FT232RL solution; Industrial grade, with isolation; Wall-mount and desktop support	Single serial port converter: <ul style="list-style-type: none">• USB to RS232• USB to RS485• USB to TTL

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 <p>USB TO RS232/485/TTL (B)</p>	<p>USB to single-channel serial port; Adopts CH343G solution; Industrial grade, with isolation; Wall-mount and desktop support</p>	<p>Single serial port converter:</p> <ul style="list-style-type: none"> • USB to RS232 • USB to RS485 • USB to TTL
 <p>USB TO RS232/485/422/TTL</p>	<p>USB to single-channel serial port; Adopts FT232RNL solution; Industrial grade, with isolation; Wall-mount and rail-mount support</p>	<p>Single serial port converter:</p> <ul style="list-style-type: none"> • USB to RS232 • USB to RS485 • USB to RS422 • USB to TTL
 <p>USB TO UART/I2C/SPI/JTAG</p>	<p>USB to 2-ch serial port; Adopts CH347T solution; Industrial grade, without isolation; Wall-mount and desktop support</p>	<p>Multi-functional serial port converter:</p> <ul style="list-style-type: none"> • USB to 2-ch TTL • USB to 1-ch TTL + 1-ch I2C + 1-ch SPI • USB to 1-ch TTL + 1-ch JTAG
 <p>USB TO 4CH TTL</p>	<p>USB to 4-ch serial port; Adopts CH344 solution; Industrial grade, without isolation; Wall-mount and desktop support</p>	<p>4-ch serial port converter:</p> <ul style="list-style-type: none"> • USB to 4-ch TTL

[Contact](#)



USB TO 4CH RS485

USB to 4-ch serial port;
Adopts CH344 solution;
Industrial grade, without
isolation;
Wall-mount and desktop
support

4-ch serial port converter:

- USB to 4-ch RS485

USB TO 4CH RS485
(B)

USB to 4-ch serial port;
Adopts CH344 solution;
Industrial grade, with
isolation;
Wall-mount and desktop
support

4-ch serial port converter:

- USB to 4-ch RS485

USB TO 4CH
RS232/485

USB to 4-ch serial port;
Adopts FT4232HL solution;
Industrial grade, with
isolation;
Wall-mount and rail-mount
support

4-ch serial port converter:

- USB to 4-ch RS232
- USB to 3-ch RS232 + 1-ch RS485
- USB to 2-ch RS232 + 2-ch RS485



USB TO 4CH RS232

USB to 4-ch serial port;
Adopts FT4232HL solution;
Industrial grade, with
isolation;
Wall-mount and desktop
support

4-ch serial port converter:

- USB to 4-ch RS232

Contact



USB TO 4CH
RS485/422

USB to 4-ch serial port;
Adopts FT4232HL solution;
Industrial grade, with
isolation;
Wall-mount and rail-mount
support

4-ch serial port converter:

- USB to 4-ch RS485
- USB to 3-ch RS485 + 1-ch RS422
- USB to 2-ch RS485 + 2-ch RS422



USB TO 4CH Serial
Converter

USB to 4-ch serial port;
Adopts FT4232HL solution;
Industrial grade, with
isolation;
Wall-mount and desktop
support

4-ch serial port converter:

- USB to 1-ch TTL + 3-ch RS485
- USB to 1-ch TTL + 2-ch RS485 + 1-ch RS232
- USB to 1-ch TTL + 2-ch RS485 + 1-ch RS422
- USB to 1-ch TTL + 2-ch RS485 + 1-ch RS232 + 1-ch RS422
- USB to 2-ch TTL + 2-ch RS485
- USB to 2-ch TTL + 1-ch RS485 + 1-ch RS422
- USB to 2-ch TTL + 1-ch RS422 + 1-ch RS232



USB TO 8CH RS485

USB to 8-ch serial port;
Industrial grade, with
isolation;
Wall-mount and rail-mount
support

8-ch serial port converter:

- USB to 8-ch RS485

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