CP-104UL/JU

4-port RS-232 smart Universal PCI serial boards



- > Over 800 kbps data throughput for top performance
- > 921.6 kbps maximum baudrate for super fast data transmission
- > 128-byte FIFO and on-chip H/W, S/W flow control
- > Compatible with 3.3/5 V PCI and PCI-X
- > Drivers provided for a broad selection of operating systems, including the latest Windows and Linux
- > Wide temperature model available for -40 to 85°C environments



















: Introduction

The CP-104UL and CP-104JU 4-port universal PCI boards are designed for POS and ATM applications. They are a top choice of industrial automation engineers and system integrators, and support many different operating systems, including Windows, Linux, and even Unix. In addition, each of the boards' RS-232 serial ports supports a

super fast 921.6 kbps baudrate. The CP-104UL and CP-104JU provide full modem control signals to ensure compatibility with a wide range of serial peripherals, and they work with both 3.3 V and 5 V PCI buses, allowing the boards to be installed in virtually any available PC server.

Specifications

Hardware

Comm. Controller: MU860 (16C550C compatible)

Bus: 32-bit Universal PCI

Connector:

CP-104UL: DB44 female CP-104JU: RJ45 x 4 **Serial Interface** Number of Ports: 4 Serial Standards: RS-232 Max. No. of Boards per PC: 4

Performance

Baudrate: 50 bps to 921.6 kbps

Serial Communication Parameters

Data Bits: 5, 6, 7, 8 Stop Bits: 1, 1.5, 2

Parity: None, Even, Odd, Space, Mark Flow Control: RTS/CTS, XON/XOFF

Serial Signals

RS-232: TxD, RxD, RTS, CTS, DTR, DSR, DCD, GND

Physical Characteristics

Dimensions:

CP-104UL: 64.4 x 120 mm (2.53 x 4.72 in) CP-104JU: 83 x 120 mm (3.27 x 4.72 in)

Driver Support

Windows: Windows 95/98/ME/NT/2000, Windows XP/2003/ Vista/2008/7/8/8.1/10 (x86/x64). Windows 2008 R2/2012/2012 R2 (x64), DOS, Windows Embedded CE 5.0/6.0, Windows XP Embedded

Linux: Linux 2.4.x, 2.6.x, 3.x

Unix-like Systems: QNX 6, SCO OpenServer, UnixWare 7, Solaris 10,

FreeBSD

Note: Please refer to Moxa's website for the latest driver support information.

Environmental Limits

Operating Temperature:

Standard Models: 0 to 55°C (32 to 131°F) Wide Temp. Models: -40 to 85°C (-40 to 185°F) Storage Temperature: -40 to 85°C (-40 to 185°F) Ambient Relative Humidity: 5 to 95% (non-condensing)

Standards and Certifications

EMC: EN 55032/24

EMI: CISPR 32, FCC Part 15B Class B

EMS: CP-104UL:

IEC 61000-4-2 ESD: Contact: 4 kV; Air: 8 kV IEC 61000-4-3 RS: 80 MHz to 1 GHz: 3 V/m IEC 61000-4-4 EFT: Power: 1 kV; Signal: 0.5 kV

IEC 61000-4-5 Surge: Power: 2 kV

IEC 61000-4-6 CS: 150 kHz to 80 MHz: 3 V/m; Signal: 3 V/m

IEC 61000-4-8 PFMF IEC 61000-4-11 CP-104JU:

IEC 61000-4-2 ESD: Contact: 4 kV; Air: 8 kV IEC 61000-4-3 RS: 80 MHz to 1 GHz: 3 V/m MTBF (mean time between failures)

Time:

CP-104UL: 558,961 hrs CP-104JU: 571.627 hrs

Standard:

CP-104UL: MIL-HDBK-217F CP-104JU: Telcordia (Bellcore) TR/SR

Power Requirements

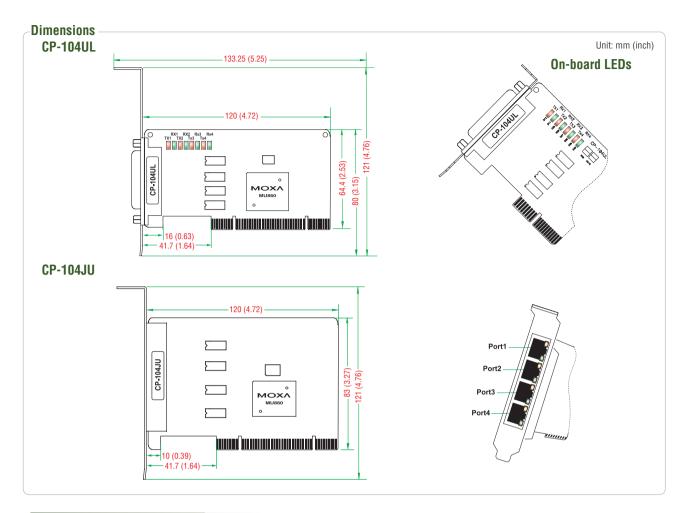
Input Current:

CP-104UL: 120 mA @ 5 VDC CP-104JU: 135 mA @ 5 VDC

Warranty

Warranty Period: 5 years

Details: See www.moxa.com/warranty



Ordering Information

Available Models

CP-104UL-DB9M: 4-port RS-232 low profile Universal PCI serial board, 0 to 55°C operating temperature (CBL-M44M9x4-50 cable included)

CP-104UL-DB25M: 4-port RS-232 low profile Universal PCI serial board, 0 to 55°C operating temperature (CBL-M44M25x4-50 cable included)

CP-104JU: 4-port RS-232 Universal PCI serial board with RJ45 ports on the board, 0 to 55°C operating temperature

CP-104UL-T: 4-port RS-232 low profile Universal PCI serial board. -40 to 85°C operating temperature CP-104JU-T: 4-port RS-232 Universal PCI serial board with RJ45 ports on the board, -40 to 85°C operating temperature

Connection Options (can be purchased separately)

Low Profile Bracket: Bracket for DB44 connector (1490000001000)

CBL-M44M9x4-50: M44 to 4 x DB9-M cable, 50 cm CBL-M44M25x4-50: M44 to 4 x DB25-M cable, 50 cm

CBL-M44M9x4-50

DB44 male to DB9 male x 4 (50 cm cable)



CBL-RJ45M9-150 8-pin RJ45 to DB9 male (150 cm cable)

PIN	RS-232
1	DCD
2	RxD
3	TxD
4	DTR

PIN	RS-232
5	GND
6	DSR
7	RTS
8	CTS



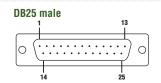
CBL-M44M25x4-50 DB44 male to DB25 male x 4 (50 cm cable)



CBL-RJ45M25-150 8-pin RJ45 to DB25 male (150 cm cable)



PIN	RS-232	PIN	RS-232
2	TxD	6	DSR
3	RxD	7	GND
4	RTS	8	DCD
5	CTS	20	DTR



Package Checklist

- 1 CP-104UL or CP-104JU board
- Low profile bracket (CP-104UL only)
- 1 connection cable (optional)
- Documentation and software CD
- Quick installation guide (printed)
- Warranty card