# LPC - USB



*iii* CAUTION *!!!* BEFORE DOING ANY CONNECTION, CHECK THE "TTL" AND "RS485" WIRING DIAGRAM (PAG. 3 y 4)

## **SPECIFICATIONS**

This board will enable you to communicate with the whole family of JR Security Systems control panels, it is possible to establish communication using the TTL (RS) channel or using RS485. It can be also be used as an universal USB-RS485 converter.

Power Supply:	From USB connector, 5V - 500mA / max
Consumption:	Standby: 11mA
	Max.: 30mA
Supported communication speeds:	300 – 115000 bps.
RS485 Bus Range:	Up to 1500m

#### **CONNECTORS**

CONNECTOR	DESCRIPTION
JP1	RS485 bus connector, here you can connect with DomoVox, LT-2G and PRO-4G
CN2	USB-B Connector, where the computer must be plugged
CN3	TTL (RS) connector, direct connection using 4 wires transparent cable.
5V	This +5V output it intended to power supply devices without the need of powering them
	from mains or battery. However, be sure to check if the device supports powering from
	+5V, as damage can result to the device.

#### **JUMPERS**

JUMPER	FUNCTION
JP2	Closed: Disables RS485 bus.
	<b>Open:</b> Enables RS485 bus.
JP3	<b>Closed:</b> Enables the $120\Omega$ end of line resistor of the Rs485 bus.
	<b>Open:</b> Disables the end of line resistor of RS485 bus.

**Important:** The RS485 communication using RS485(JP1) or TTL (CN3), cannot be used at same time, so if you like to use RS485 you should unplug any device in CN3 and if you whish to use CN3 you should unplug any device in JP1 or open the JP2 jumper.

## RS485 WIRING DIAGRAM (JP1)

Use the following terminals, to connect via RS485 to the following JR Security products.

- Domovox Central-4G
- GSM-Pro Lite-2G



# TTL WIRING DIAGRAM (CN3)

Use the following terminals, to connect via TTL to the following JR Security products.

- Domovox
- Centrum-A1/A2
- Centrum 10

- GSM-Pro
- GSM-Lite
- Centrum A12



#### <u>LEDS</u>

- **DTR** : Data Terminal Ready, the computer is on line.
- **PWR** : The device is power supplied.
- **TX** : Data comming from the computer.
- **RX** : Data going to the computer.

#### **INSTALATION OF USB DRIVER**

The Driver of the USB device for Win2K/XP it is located in the JR-Express CD or you could download it from www.jrsecurity.com/support.

To install the USB Driver of the device follow the following steps:

1. Connect the device to a free USB port in your PC. This will launch the Found New Hardware Wizard of Windows. Press "Next" to proceed with the installation.

Welcome to the Found New Hardware Wizard This wizard helps you install a device driver for a hardware device.
To continue, click Next. < Back Next > Cancel

2. Select "Search for a suitable driver for my device (recommended)" like it is shown in the following capture and press "Next".

ound New Hardware Wizard
Install Hardware Device Drivers A device driver is a software program that enables a hardware device to work with an operating system.
This wizard will complete the installation for this device
USB <-> Serial Cable
A device driver is a software program that makes a hardware device work. Windows needs driver files for your new device. To locate driver files and complete the installation click Next.
What do you want the wizard to do?
Search for a suitable driver for my device (recommended)
O Display a list of the known drivers for this device so that I can choose a specific driver
< Back Next > Cancel

3. Mark the checkbox "Specify a location" unmark all the others like shown above.

Found New Hardware Wizard	
Locate Driver Files Where do you want Windows to search for dr	iver files?
Search for driver files for the following hardwar	e device:
USB <-> Serial Cable	
The wizard searches for suitable drivers in its any of the following optional search locations	friver database on your computer and in hat you specify.
To start the search, click Next. If you are sear insert the floppy disk or CD before clicking Ne	ching on a floppy disk or CD-ROM drive, xt
Optional search locations:	
Floppy disk drives	
CD-ROM drive:	
Specify a location	
Microsolt Windows Update	
	<back next=""> Cancel</back>

4. Pressing "Next" a dialog box will be shown in order to introduce the location of the drivers.

_)	Insert the manufacturer's installation disk into the drive selected, and then disk 0.5.	DK.
		Cancel
	Copy manufacturer's files from:	
		Browne

5. Press "Browse" to show a open file dialog box.

Locate File				<u>? x</u>
Look in	G VCP Driver	5		-
Hislory Desktop My Documente	ETDIBUS. IN FTDIPORT. II FTSERMOU.	= NF INF		
My Lomputer	Fie name: Fies of type:	FTDIBUS.INF Setup Information (* inf)	•	Open Cancel

6. Look for the folder containing the latest drivers in the CD-ROM, and press "Open", then click "OK". Once Windows has found the required .INF files, press "Next" to continue.

Found New Hardware Wizard	
Driver Files Search Results The wizard has finished searching for driver files for	or your hardware device.
The wizard found a driver for the following device:	
USB <> Serial Cable	
Windows found a driver for this device. To install t	he driver Windows found, click Next.
c:\vcp drivers\ftdibus.inf	
<	Back Next> Cancel

7. Windows should be now showing a message indicating that the installation was successfully accomplished Windows. Click "Finish" to complete the installation. The device is now prepared to be used.

Found New Hardware Wizard	
	Completing the Found New Hardware Wizard         Image: USB Serial Converter         Image: Windows has finished installing the software for this device.
	< Back Finish Cancel

8. Having a look at the Device Manager (situated in the Control Panel\System, select the tab "Hardware" and click "Device Manager"), the device appears such as a "*USB Serial Port*" connected to a USB port.

Action       Mew       Media         Image: Action       Media	🛱 Device Manager	
Computer     Computer     Computer     Disk drives     Display adapters     Display adap	j Action ⊻ew j ← → 🛍 🖬 😫 j 🚉	
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Electric RTL/ATAPI controllers     Keyboards     Keyboards     Mice and other pointing devices	🕀 🖅 Floppy disk drives	
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