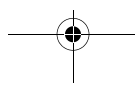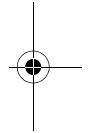# InviLink 802.11
user's guide

Model Number : _____

Serial Number: _____

Purchase Date: _____

Place of Purchase: _____
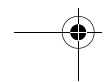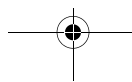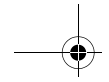
Regulatory Information

The MPCI-101 Wireless LAN Card must be installed and used in strict accordance with the manufacturer's instructions. This device complies with the following radio frequency and safety standards.

Canada - Industry Canada (IC)

• This device complies with RSS 210 of Industry Canada.

Europe - EU Declaration of Conformity

This device complies with the specifications listed below, following the provisions of the EMC Directive 89/336/EEC:

• ETS 300-826
• ETS 300-328 Technical requirements for Radio equipment.

USA - Federal Communications Commission (FCC)

This device complies with Part 15 of FCC Rules. Operation of the devices in an MPCI-101 Wireless LAN System is subject to the following two conditions:

• This device may not cause harmful interference.
• This device must accept any interference that may cause undesired operation.

Exposure to Radio Frequency Radiation

The radiated output power of the MPCI-101 Wireless LAN Card is far below the FCC radio frequency exposure limits. Nevertheless, the MPCI-101 Wireless LAN Card shall be used in such a manner that the potential for human contact during normal operation is minimized.

The transmitter and the antenna are permanently installed inside the notebook, and are specific for this model (not for generic computer). The antenna of this device is installed on the corner of the bottom of the LCD display. For compliance with FCC radiation exposure limits. it should be operated with a separation distance of 20cm or more between the antenna and the body of the user, and the antenna should not be operated next to a nearby person.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful

2
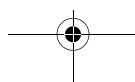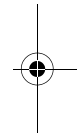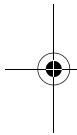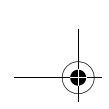
interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

- Reorient or relocate the receiving antenna.

- Increase the separation between the equipment and receiver.

- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.

- Consult the dealer or an experienced radio/TV technician for help.

FCC Caution: To assure continued compliance, any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment (example - use only shielded interface cables when connecting to computer or peripheral devices).

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Responsible Party: Acer America Corporation, 2641 Orchard Parkway, San Jose, CA 95134

Telephone No:1-408-432-6200
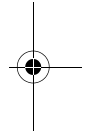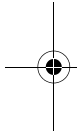
FC Tested To Comply
With FCC Standards

FOR HOME OR OFFICE USE

FEDERAL COMMUNICATIONS COMMISSION
DECLARATION OF CONFORMITY (DoC)

FOR THE FOLLOWING EQUIPMENT:

PRODUCT NAME   :   Receiver Computer Peripheral
MODEL NO.   :   MPCI-101
TRADE NAME   :   Acer

IS HEREWITH CONFIRMED AND FOUND TO COMPLY WITH THE REQUIREMENTS OF ANSI C63.4 & FCC PART 15 REGULATIONS. THE RESULTS OF ELECTROMAGNETIC EMISSION EVALUATION IS SHOWN IN THE REPORT NO.: RF89080208

THIS DEVICE COMPLIES WITH PART 15 OF THE FCC RULES. OPERATION IS SUBJECT TO THE FOLLOWING TWO CONDITIONS:
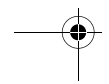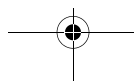(1) THIS DEVICE MAY NOT CAUSE HARMFUL INTERFERENCE AND,
(2) THIS DEVICE MUST ACCEPT ANY INTERFERENCE RECEIVED, INCLUDING INTERFERENCE THAT MAY CAUSE UNDESIRED OPERATION.

THE FOLLOWING MANUFACTURER/IMPORTER IS RESPONSIBLE FOR THIS DECLARATION:

 Acer America Corp.   (USA)
(COMPANY NAME)

 2641 Orchard Parkway, San Jose, CA 95134   (USA)
          (COMPANY ADDRESS)

TEL: 408-922-3012   FAX: 408-922-2939

  Campbell Kan   Director of Mobil Product Marketing
  (NAME)   (TITLE)

                                 Sep. 18, 2000
SIGNATURE   DATE

4

EC-Conformity Declaration

For the following equipment:

MPCI-101 Wireless LAN Card

(Product Name)

MPCI-101

(Model Designation)

is herewith confirmed to comply with the requirements set out in the Council Directive
on the Approximation of the Laws of the Member States relating to R&TTE Directive (99/5/EC).
For the evaluation regarding the electromagnetic compatibility, the following standards were
applied:

ETS 300 328 A1 (1997-7)

ETS 300 826 (1997-11)

EN 60950:1992 +A1:1993+A2:1993+A3:1995+A4:1996+A11:1997

The following importer/manufacturer is responsible for this declaration:

Acer Computer Iberica S.A.U

(Company Name, Importer)

Frederic Mompou 5, 6 4   08960
Sant Just Desvern   BARCELONA   (SPAIN)

(Company Address, Importer)

Contact Person for this declaration   Person responsible for this declaration:

William Bengioar

(Name, Surname, Manufacturer)   (Name, Surname, Importer)
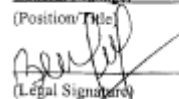
General Manager

(Position/Title)   (Position/Title)

(Legal Signature)   (Legal Signature)

Sant Just Desvern   05/09/00

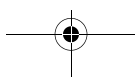(Place)   (Date)   (Place)   (Date)

Starting InviLink 802.11

When you first start your computer, press the InviLink 802.11 button

$\bigcirc$ to turn on the capability. A dialog box will be displayed showing which capability is enabled.
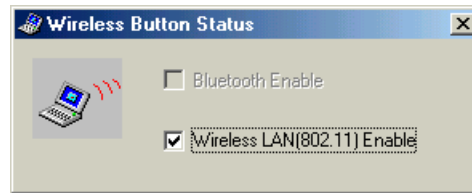
Note: Before you can use the InviLink 802.11 capability, there are some settings you should consider. To access these settings, open the MPCI-101 Wireless LAN Client Manager software.

Note: The 802.11 does not support Wake-On LAN (WOL).

Using the MPCI-101 Wireless LAN Client Manager

To access the MPCI-101 Wireless LAN Client Manager software, click on the icon at the bottom right of your screen.

The MPCI-101 Wireless LAN Client Manager dialog box will appear as follows:

6

The Current configuration profile setting is **Default**. You can edit this by clicking on the **Actions** option, at the top of the dialog box, to access the **Add/Edit Configuration Profile** dialog box.
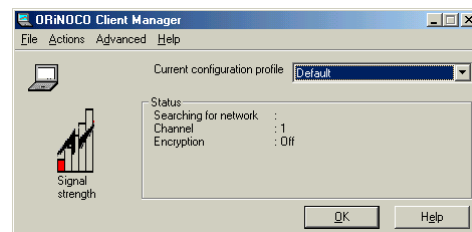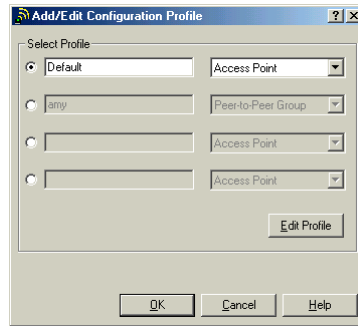

In this dialog box, you can add or change a profile name, change the kind of profile or edit a profile. There are two profiles currently available with your MPCI-101 Wireless LAN Client Manager software, Access Point and Peer-to-Peer Group.

Access Point

Under the **Basic** tab in **Edit Profile**, the Network Name is left blank by default. This will enable your system to connect to any available Access Point in your area.
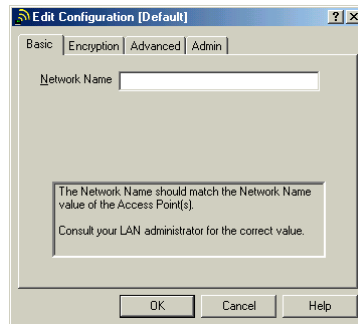
You can access a specific Access Point by typing the **Network Name**. You can also make your transmissions to and from an Access Point secured by enabling the **Enable Data Security** option under the

Encryption tab and then typing the code corresponding to each key. Click the **Help** button for more detail.
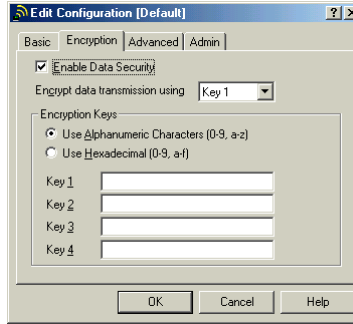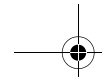

Peer-to-Peer

For a **Peer-to-Peer** connection, set the correct **Network Name** and **Encryption Key** if you want secure transmissions to and from other Peer-to-Peer enabled systems. Click on **OK** to confirm your settings.
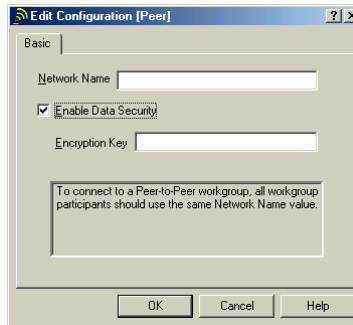
The InviLink 802.11 button is used to toggle on and off its capabilities. By default, when you power up your system, these wireless communication features are disabled. See the table below for more detail.

Bluetooth	802.11 Wireless LAN	Default	Press once	Press twice	Press again
Not installed	Not installed	Off	Off	Off	Off

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Bluetooth	802.11 Wireless LAN	Default	Press once	Press twice	Press again
Not installed	Installed	Off	802.11 selected	Off	802.11 selected
Installed	Not installed	Off	Bluetooth selected	Off	Bluetooth selected
Installed	Installed	Off	Bluetooth selected	802.11 selected	Off

**Important**: Turn off the wireless function when inside an airplane to prevent interference with navigation systems.

InviLink 802.11 additional information for Peer-to-Peer Group feature

To optimize your InviLink 802.11 capabilities, there are some settings that need to be added. Follow the instructions below:

1   Right-click on the **Network Neighborhood** icon on your Windows desktop and click on **P**r**operties**.

9
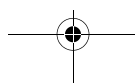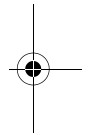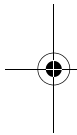
2   In the Network dialog box, under the Configuration tab, click on
Client for Microsoft Networks and then click on **Add...** to add
the selection.
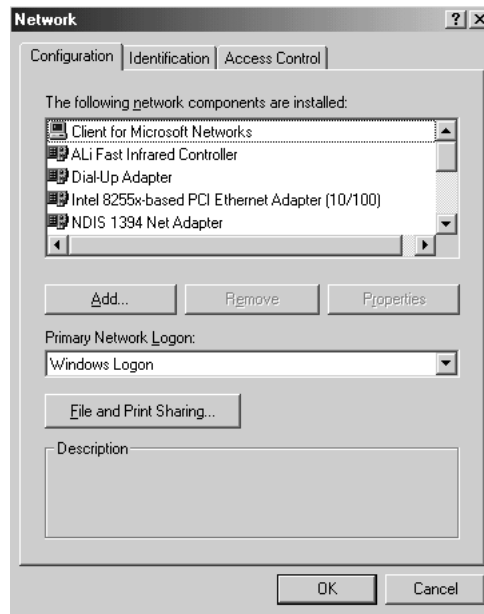
3   In the Select Network ComponentType dialog box, click on
Protocol and then click on **Add...** to add the selection.
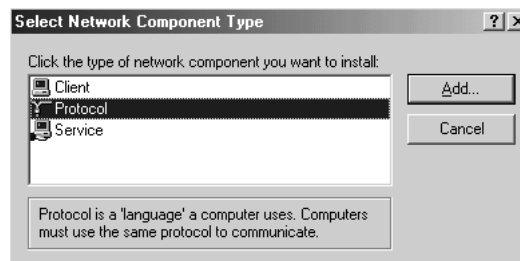
4   In the Select Network Protocol dialog box, on the left side under
Manufacturers:, select **Microsoft**. On the right side under the
Network Protocols:, left-click on **NetBEUI**. Then click on **OK** to
confirm the selection. In the Network dialog box, click on **OK** to

10

exit. You have to reboot your computer in order for the new
settings to take effect.
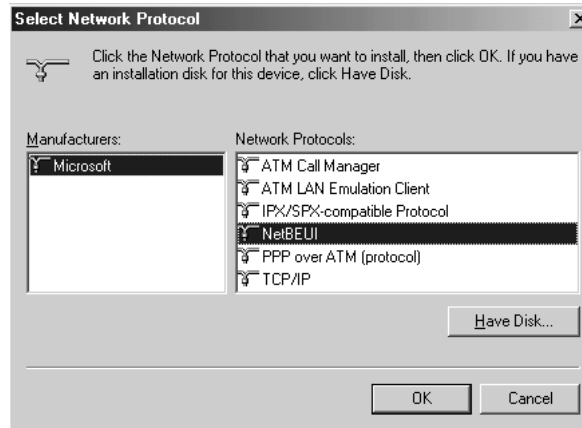
5 After you have reboot you computer, you will be able to see the
icon at the bottom right of your screen. Click on the icon shown
below to access your wireless LAN dialog box.

6 Click on the **Actions** menu and select **Add/Edit Configuration
Profile**.
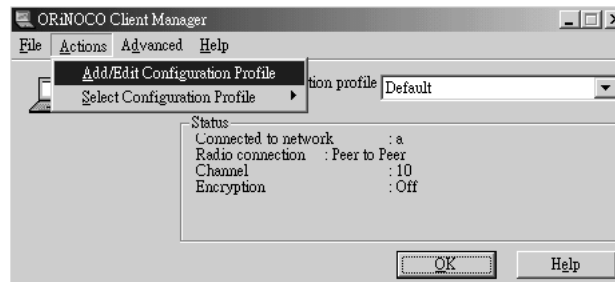
7 In the Add/Edit Configuration Profile dailog box, select **Peer-to-Peer Group.** Then click on **Edit Profile** to access the Edit Configuration dialog box..
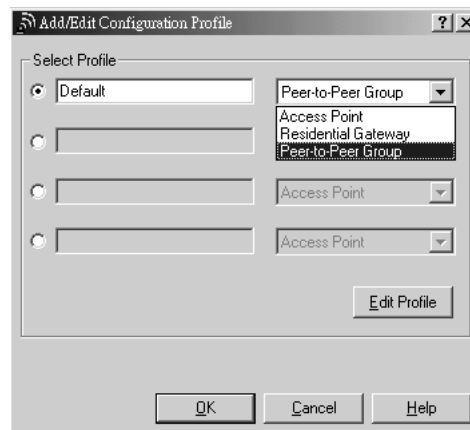
8 The Network Name should be the same for all of the computers that are connected to the same Peer-to-Peer Group. Click on **OK** to confirm the setting.

12
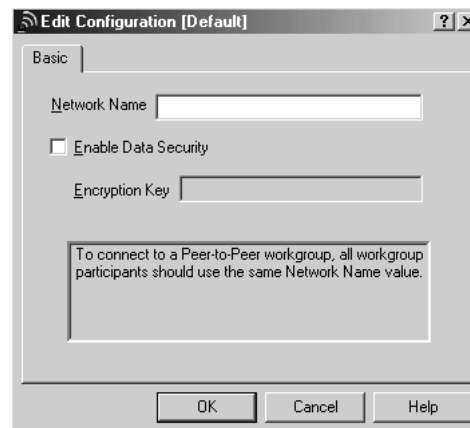
Card Specifications

Physical Specifications

Form Factor	MINI PCI Card	
Dimensions	(LxWxH)	59.75x 50.95 x 4.5 mm
Weight	15 gram (PC Card)	
Temperature & Humidity		
Operation	5° to 35° C	maximum humidity 95%
Transit	-20° to 70° C	15 to 95% (no condensation allowed)
Storage	-10° to 60° C	10 to 90% (no condensation allowed)
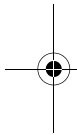
Note: Although the PC Card may still operate in the range of -20° to 70° C, operation outside the range of 0° to 55° C may no longer be according to specifications.
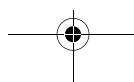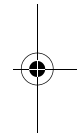
Power Characteristics

Doze Mode	30mA
Receive Mode	230 mA
Transmit Mode	330 mA
Power Supply	3.3 V ± 0.2 V

Networking Characteristics

Data Rate	High	11 Mb/s
	Medium	5.5 Mb/s
	Standard	2 Mb/s
	Low	1 Mb/s
	The cards use an automatic Transmit Rate Select mechanism.	

Radio Characteristics

Radio Characteristics of the MPCI-101 WILELESS LAN CARD may vary:

• According to the country where the product was purchased.

• According to the type of product that was purchased.

Wireless communication is often subject to local radio regulations. Although the MPCI-101 WILELESS LAN CARD has been designed for operation in the license-free 2.4 GHz band, local radio regulations may impose a number of limitations to the use of wireless communication equipment.

To comply with such regulations, MPCI-101 WILELESS LAN CARD is marketed with dedicated channel-sets with a number of factory-programmed channels identified by the following acronyms:

• ETS for countries that adhere to the regulations as defined by the European Telecommunications Standards Institute (ETSI),

• FCC for countries that adhere to the regulations as defined by the

14
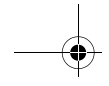
US Federal Communications Commission (FCC),

- FR for France, and
- JP for Japan.
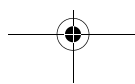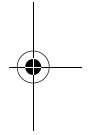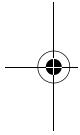
Radio Characteristic Specifications

R-F Frequency Band	2.4 GHz (2400-2500 MHz)			
Number of selectable sub-channels	North America (FCC)	11		
	Europe (ETS)	11		
	France (FR)	2		
	Japan (JP)	11		
	Other Countries:	11		
Modulation Technique	Direct Sequence Spread Spectrum CCK for High & Medium Transmit Rate DQPSK for Standard Transmit Rate DBPSK for Low Transmit Rate			
Spreading	11-chip Barker Sequence			
Bit Error Rate (BER)	Better than 10^{-5}			
Nominal Output Power	15 dBm			
Range (100 bytes User Data) / Transmit Rate	High Speed 11 Mb/s	Medium Speed 5.5 Mb/s	Standard Speed 2 Mb/s	Low Speed 1 Mb/s
Open Office Environment	160 m (525 ft.)	270 m (885 ft.)	400 m (1300 ft.)	550 m (1750 ft.)
Semi-Open Office Environment	50 m (165 ft.)	70 m (230 ft.)	90 m (300 ft.)	115 m (375 ft.)
Closed Office	25 m (80 ft.)	35 m (115 ft.)	40 m (130 ft.)	50 m (165 ft.)
Receiver Sensitivity	-83 dBm	-87 dBm	-91 dBm	-94 dBm

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Delay Spread (at FER of <1%)	65 ns	225 ns	400 ns	500 ns

Supported Frequency Sub-bands

Subject to the radio regulations that apply in your country, your MPCI-101 WILELESS LAN CARD may support a different set of 2.4 GHz channels (see table below).

Consult your Authorized Acer Sales office for information about the radio regulations that apply in your country

MPCI-101 IEEE 802.11 Channels Sets

Frequency Range	2400-2500 MHz[a]			
Channels ID	FCC	ETSI	France	Japan
1	2412	2412	-	2412
2	2417	2417	-	2417
3	**2422**	**2422**	-	2422
4	2427	2427	-	2427
5	2432	2432	-	2432
6	2437	2437	-	2437
7	2442	2442	-	2442
8	2447	2447	-	2447
9	2452	2452	-	2452
10	2457	2457	2457	2457
11	2462	2462	**2462**	2462

a. Numbers printed in bold are the factory-set default channels.