English Help

Deutsch Hilfe

Aide en Français

Ayuda en Español

Getting Started

Congratulations on your purchase of the GoBook VR-2 computer! Your new GoBook VR-2 features the most innovative advances in portable computing technology. It combines state-of-the-art ergonomics with sophisticated architecture to provide you with a personal computer that is compact, powerful, and easy to use.

Designed for a wide range of general, business, and personal productivity applications, the semi-rugged, wireless ready GoBook VR-2 is an ideal choice wherever you need a computer; in the office, at home, and on the road.

Your GoBook VR-2 is both expandable and portable, supporting the features you expect in a desktop computer but with the mobility of a laptop.

This online document, *GoBook VR-2 Help*, contains all the information you need to set up and use your GoBook VR-2. For information on printing, navigating or otherwise using *GoBook VR-2 Help,* see the How to Use This Help System topics. If you have suggestions for how we may improve this document, please see Documentation Feedback.

Unpacking Your System

Inside your packaging you will find:

Standard Parts

Standard Features

Optional Features

Optional Parts and Accessories

Where to Look For Information

About Your Computer

About Windows

The First Time. . .

Before using your computer, install the battery and then attach the computer to AC power.

Installing the Battery:

1. Line up the battery connectors.

2. Press gently on the battery until it clicks into place.

3. Slide the battery locks toward the outside of the computer to lock the battery and ensure they latch completely.
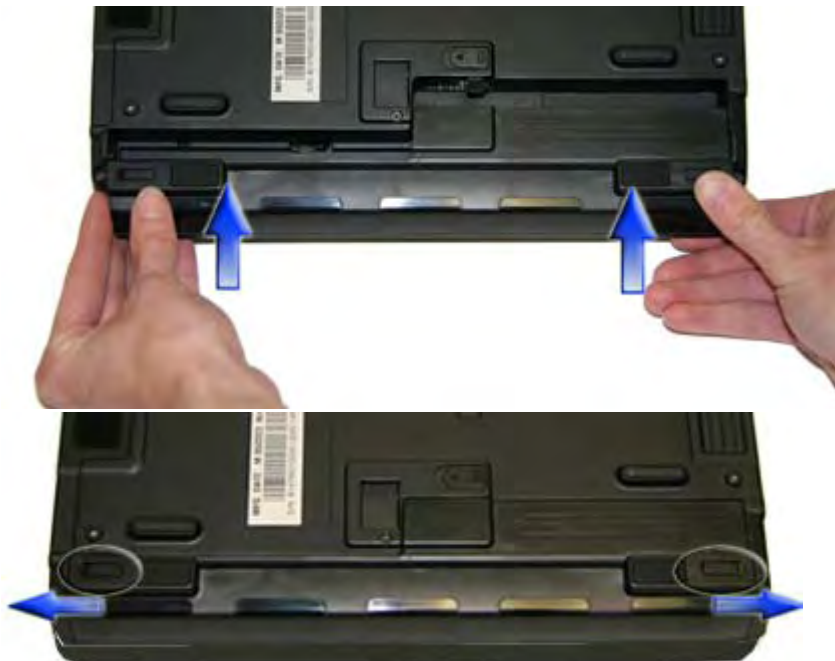
Attaching AC Power:

1. Connect the AC adapter power cord to the AC adapter.

2. Connect the AC adapter to the DC power port on the back of your computer.

3. Connect the AC adapter power cord to a properly grounded AC outlet.

    NOTE It is recommended you use a quality surge protector.
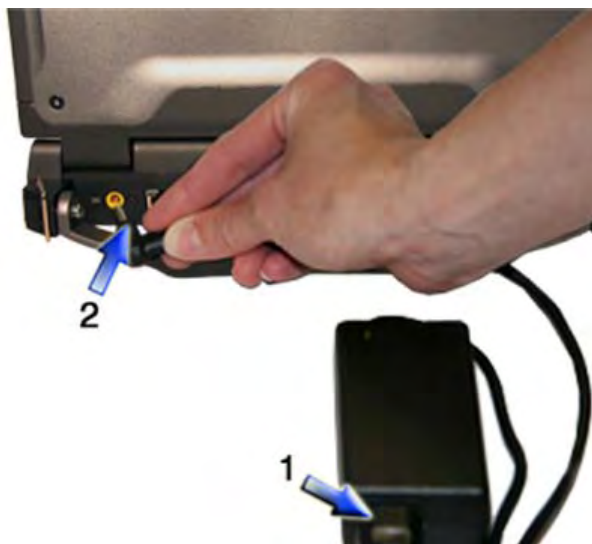
Begin Using the Computer

1. Open the display to a comfortable viewing angle.

2. Press the power switch to turn on the power.

The POST (power-on self-test) routine executes and Windows begins loading.

NOTE When using a battery pack for the first time, it is recommended that you calibrate the battery so the gas gauge accurately displays battery capacity.

Turning off Your Computer

Turning off the computer properly is important to maintaining your computer. Select **Start**, **Shut Down** and follow the instructions on the screen.

If you are going to be away from the computer for a short period, there are ways to conserve power without shutting down the system. See Managing Power and Battery Tips for details.

NOTE If you are unable to shut down your computer normally, follow the instructions in Troubleshooting.

NOTE If you are using an office or vehicle dock, please refer to Undocking the VR-2 in the Optional Equipment and Accessories section.

CAUTION Shutting off the computer improperly may result in data loss.

Startup Problems?

If your computer does not startup properly, try these solutions.

- Connect the AC adapter to charge the battery if it is not charged.
  NOTE If the AC adapter is connected and functioning properly, the Power LED on the AC adapter should be lit as well as the External Power LED ⫐ on the GoBook VR-2.

- If the AC adapter is connected but the unit will still not turn on, make sure the electrical outlet you are using works.

- Check to make sure the battery is installed and charged properly.

- If the battery does not begin charging, remove the battery, connect the AC adapter, and turn on the computer by pressing the **Power Button**. Reinstall the battery. The Battery LED ▭ is a steady green while the battery is charging.

The Troubleshooting section lists additional solutions you can try.

Safety

Read these instructions carefully and save them. Following these guidelines will help prevent damage to your computer and help protect your personal safety.

- Follow all warnings and instructions marked on the product and noted in this documentation, including the Notices and Compliance section

- Follow all warnings and instructions noted in *Windows Help and Support*, found on the **Start Menu**

- The first time you use your computer, we recommend that you carefully read the section on Power Management to familiarize yourself with basic battery information and ensure optimum performance

- **WARNING!** There is danger of explosion if the battery is incorrectly replaced. Replace only with the same or equivalent type recommended by the manufacturer. Dispose of used batteries according to the manufacturer's instructions

- **WARNING!** Batteries may explode if not handled properly. Do not disassemble or dispose of them in fire. Keep them away from children and dispose of used batteries promptly

- Unplug the computer from the power outlet before cleaning. Use a damp cloth for cleaning. Do not use aerosols, solvents, or strong detergents

- **CAUTION** The computer may be damaged if exposed to contaminants. Shield the unit from all contaminants such as liquids, rain, snow, and dust

- Slots and openings in the computer case are for ventilation purposes. Do not block or cover these openings or the system could overheat

- Do not place the product on a soft surface such as a bed, sofa, or rug where the ventilation slots and openings may be blocked

- Do not place this product near or over a radiator or heat register

- Do not place this product in a built-in installation unless proper ventilation is provided

- Do not operate the computer at temperatures above 140°F (60°C) or below -4°F (-20C)

- Do not store the computer at temperatures above 140°F (60°C) or below -67°F (-55°C)

- Do not step on or place anything on the power cord

- If you use the computer with an extension cord, ensure that the total ampere ratings of all the devices sharing the extension do not exceed the rating of the extension cord or the rating of the wall outlet

- Do not push foreign objects into the computer through any of the slots or openings. Dangerous voltages are present, which could cause electric shock, fire, or damage sensitive components

- The computer's keyboard is designed to withstand spills. If a spill occurs, power off the computer and wipe it down before continuing to use the computer

- For best results, use a power strip with a built-in surge protector. Do not use inferior extension cords as this may result in damage to your computer

- Do not attempt to service this product yourself, as opening or removing covers may expose you to dangerous voltage points or other risks. Refer all servicing to qualified service personnel

- Unplug this product from the wall outlet and refer servicing to qualified service personnel under the following conditions:

  - When the power cord or plug is damaged or frayed

  - If liquid has been spilled into the product

  - If the product has been exposed to rain or water

  - If the product does not operate normally when the operating instructions are followed. Adjust only those controls that are covered by the operating instructions since improper adjustment of other controls may result in damage and will often require extensive work by a qualified technician to restore the product to normal condition

  - If the product has been dropped or the cabinet has been damaged

- If the product exhibits a distinct change in performance, indicating a need for service

- Do not upgrade or service this computer without prior authorization from the manufacturer. Damage caused by servicing that is not authorized may void your warranty

- Before performing any manufacturer authorized service or upgrade, first follow these instructions:

  - Prevent damage from static electricity by following ESD precautions

  - Place the computer on a clean, flat surface

  - Turn off the computer and disconnect the power supply

  - Undock the computer if it is in a docking device (such as an office dock or vehicle dock)

  - Disconnect any attached peripherals

  - Disconnect any attached network, telephone or telecommunication line

  - Remove any PC Cards, EXPRESS Cards, Smart Cards, CDs, DVDs or any other media in your computer's slots or bays

  - Remove the battery (See Battery Removal)

  - Remove the hard drive (See Hard Disk Drive Removal)

Tips for New Owners

- **Take responsibility for backup**
  Back up files often. Users who need to manage large amounts of data may wish to use backup devices

- **Don't leave passwords anywhere on your notebook or carrying case**

- **Be careful when placing your notebook on an airport security conveyor belt**
  In most airports, security conveyor belts are safe for computers. If you are not sure, ask the security staff. You should keep a close eye on your computer

- **Tape your business card to the notebook and accessories**
  In the workplace, notebooks and accessories may often look exactly alike, leading to equipment mix-ups. Prevent such mix-ups by placing your name on your equipment

- **Install antivirus software**

- **Consider using a lock**
  For added security, consider purchasing a Kensington lock to put into the Security Slot on the left side of your computer. Use the Kensington lock to secure the computer to a desk or table

- **Develop ergonomic work habits**
  The science of ergonomics studies the relationship between health and a suitable work environment. For more information on ergonomics, contact your nearest computer bookstore, or local library. The Internet also has information on this and other related subjects
  NOTE Using a computer for extended periods of time with a poor workstation setup and incorrect work habits can cause health problems

Getting Familiar with Your Computer

Before you begin using your GoBook VR-2, read this section to familiarize yourself with its main features and components.
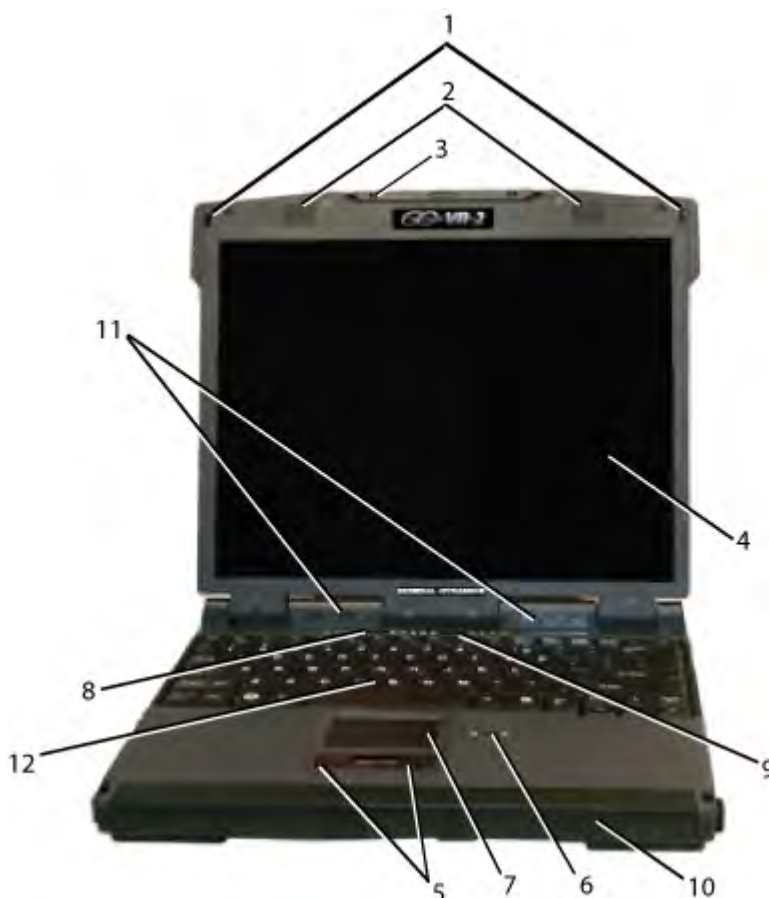
Tour of Your Computer

This section shows all views of your computer with a summary of key features.

GoBook VR-2 Help

Front View

Hover the mouse over each number on the picture to see a description

#	Feature	Description
1	Display Latches	Two display latches hold the display when closed.
2	Speakers	Integrated Stereo speakers for audio output
3	Pen / Stylus Slot	A custom touch screen pen (stylus) is supplied with each unit equipped with the optional touch screen and is stored in a slot located on the left side of the display
4	Display	13.3-inch, Enhanced XGA, outdoor-viewable, color display with an optional integrated touch screen
5	Touchpad Buttons	Use like the buttons on a mouse

6	Fingerprint Scanner	The optional swipe style fingerprint scanner can be used for all standard security needs
7	Touchpad	Use for navigation
8	Power Button	Turns computer on or off
9	Application Launch Button	Programmable button
10	Battery	Removable Lithium-Ion battery
11	Keyboard Task Lights	Two task lights located in the display hinges directly below the display illuminate the keyboard to permit typing in a dimly lit or darkened environment.
12	Keyboard	Standard keyboard with embedded numeric keypad

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Top View

Hover the mouse over each number on the picture to see a description
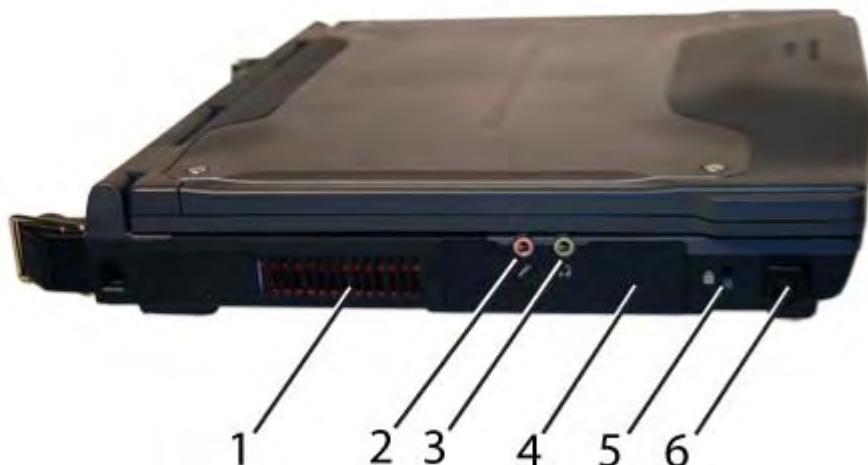

#	Feature	Description
1	CRMA Express Antenna	Antenna for WAN Communications
2	GPS Antenna	Antenna for GPS Receiver

3	WLAN Antennas	Antenna for WLAN Communications

Left Side View

Hover the mouse over each number on the picture to see a description

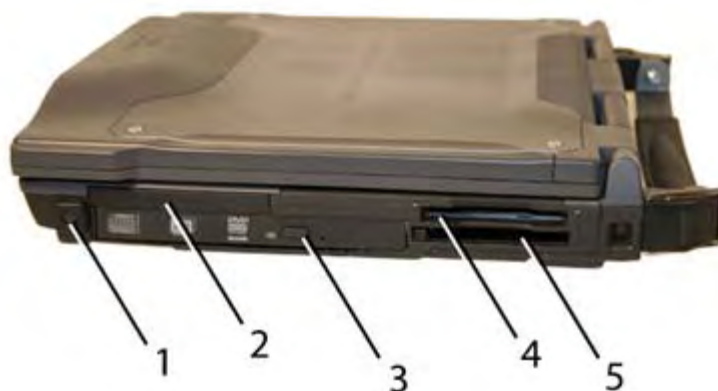| #	Feature	Description
1	Cooling Fan Exhaust	Cooling Fan exhaust area. Do Not Block. This area may become hot as air vents from the computer
2	Microphone Jack	Connect a microphone to this jack to record audio
3	Audio Out Jack	Connect external speakers or a stereo headset to this jack to listen to multimedia
4	Removable Hard Disk	The removable Hard Disk Drive is located on the left side of the unit. The latch that secures the Hard Dick Drive is located on the bottom of the unit. NOTE: make sure the unit is powered off before removing the Hard Disk Drive to prevent data corruption
5	Security Slot	The Security Slot can be used with a standard laptop-locking device, such as a Kensington Lock. You can connect the GoBook VR-2 to a large object with the lock to prevent theft of your GoBook VR-2. See the documentation that comes with your lock for more information
6	Front Handle Mount	The front soft handle mount, located on both sides of the unit, is used with the optional soft handle

Right Side View

Hover the mouse over each number on the picture to see a description

#	Feature	Description
1	Front Handle Mount	The front soft handle mount, located on both sides of the unit, is used with the optional soft handle
2	CRMA Express	CRMA Express Radio bay
3	Optical Disk Drive	CD-RW, DVD/CD-RW, or DVD-RW/CD-RW
4	Smart Card Reader or EXPRESS Card Slot	Smart Card Reader or EXPRESS Card
5	PC Card Slot	Use this slot for PC Card devices

Back Edge View

Hover the mouse over each number on the picture to see a description
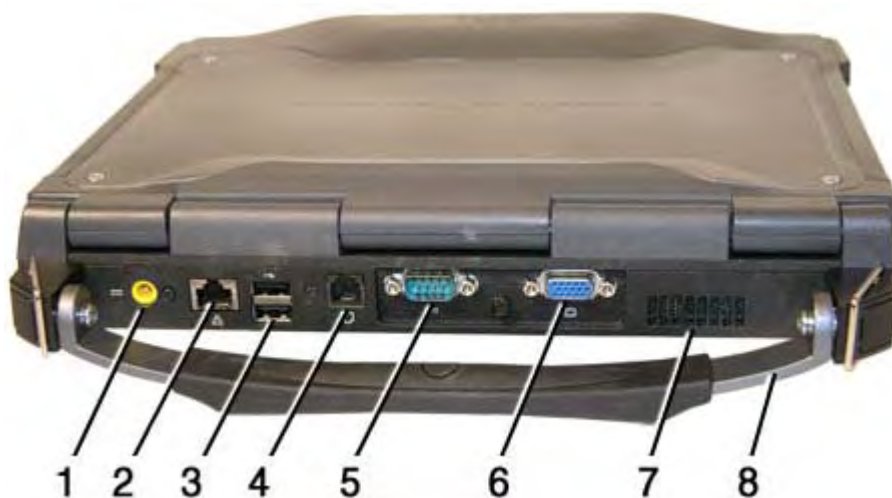
#	Feature	Description
1	DC-in Jack	Connects to an AC adapter
2	Network Jack (RJ45/LAN)	Connects to an Ethernet-based network. Connection speed is 10/100/1000 Mbps
3	Two 2.0 USB Ports	Connects to USB devices (e.g., USB digital camera)
4	Modem Jack (RJ11)	Connects a phone line to the internal fax/data modem. It can transmit data

		using the 56 Kbps V.90 or V.92 protocol, and send and receive faxes at 14.4 Kbps. **NOTE** In some countries, local regulations may not permit the use of the fax/modem designed for this system. In this case, you may use a PCMCIA modem
5	Serial Port	Connects your computer to serial devices such a fax/modem or a serial mouse. This port is identified as COM3 and is UART 16550A compatible
6	External Monitor Port	Connects to a display monitor (up to 2048x1536 resolution)
7	Cooling Fan Intake	Air intake for fan. Do NOT block this area
8	Hard Handle (optional)	Carrying handle

Bottom View

Hover the mouse over each number on the picture to see a description

#	Feature	Description
1	Docking Connector	84-pin cradle connector that mates with the Vehicle Dock, Office Dock, and Mini-Dock
2	Memory compartment	User expandable memory slot
3	Hard Disk Lock	Slide this to lock or unlock the hard disk drive
4	Hard Disk Drive	Removable hard disk drive for data storage
5	Battery Locks	Slide these locks toward the outer edges of the computer to lock the battery
6	Pen/Stylus Slot	A custom touch screen pen (stylus) is supplied with each unit equipped with the optional touch screen and is stored in a slot located on the left side of the display
7	Battery	Lithium-Ion Smart Battery
8	Battery Release Latch	Slide this latch to the left to remove the battery. **NOTE** You must first unlock the battery

Keyboard Basics

The GoBook VR-2 features:

- Full size keys on a 85-key keyboard

- Twelve function keys

- Application launch button (programmable button)

- Embedded numeric keypad

- USB port that enables you to connect an external keyboard

Keyboard ergonomics

Located below the keyboard, the wide palm rest is ergonomically designed to provide you with a very comfortable place to rest your hands while you type.

Primary Keys

Key	Description
Alt	The **Alt** (alternate) key is used with other keys to perform special tasks. On some operating systems pressing **Ctrl**+**Alt**+**Del** twice soft reboots the computer
Backspace	The **Backspace** key, sometimes represented on the keyboard as a left arrow, moves the cursor one position to the left. The character to the left of the cursor is erased
Caps Lock	Pressing the **Caps Lock** key one time locks keys **A** through **Z** in the UPPER CASE position. Pressing the **Caps Lock** key again returns the letters to lower case. While in the upper case mode, pressing the **Shift** key results in lowercase characters when entered. You still have to use the **Shift** key to display characters located on the upper portion of the keyboard. For example, press **Shift**+**8** to type an asterisk (*), even when the **Caps Lock** key is activated The **Caps Lock** LED 🔒 lights when the keyboard is in Caps Lock mode
Ctrl	The **Ctrl** (control) key works with other keys to perform a variety of functions
Enter	The **Enter** key signals the computer that you have completed your entry. This is your way of telling the computer to process the information that you have entered
Esc	The **Esc** (escape) key allows you to exit a pop-up window or message box
PrtSc	In Windows, pressing the **PrtSc** (print screen) key or **ALT**+**PrtSc** key copies the current screen or window to the clipboard so you can paste it into documents
Shift	The **Shift** key changes the keys **A** through **Z** to the UPPER CASE position. When you press an alphabetic key, the character appears as a capital letter. When you press **Shift** with other keys, the characters on the upper part of the keys appear. For example, pressing **Shift**+**7** displays an ampersand (&)
Fn	Some special Fn (function) keys have been established to perform important tasks when pressed and held with the **Fn** key. These keys are described later in this document. The **Fn** key legend is color keyed to other special keys on the keyboard
SPACEBAR	Use the **SPACEBAR** to enter a space and move the cursor one character to the right
Tab	The **Tab** key moves the cursor to the next tab stop or field. Tab stops are defined by your operating system or application program. Press the **Tab** key to move from one field or text box to another

Arrow Keys

The arrow keys are defined by the software application.

The **UP ARROW** key usually moves the cursor up one line. In some cases, you can use the up arrow to make selections from menus and scrollable list boxes.

The **DOWN ARROW** key usually moves the cursor down one line. In Windows, you can use the down arrow to make selections from menus and scrollable list boxes.

The **RIGHT ARROW** key usually moves the cursor one character position to the right.

The **LEFT ARROW** key usually moves the cursor one character position to the left.

Function Keys and Key Combinations

When using function keys, press and hold the **Fn** key before pressing the other key in the key combination.

Function Key	Function	Icon	Description
Fn+F1	Screen blank		Turns off the display screen backlight and turns off the external monitor, if attached. Press any key to turn it back on.
Fn+F2	Display toggle		Switches the display output between the display screen, external monitor (if connected) and both the display screen and external monitor **NOTE** When a DVD or VCD is playing, this hotkey is disabled.
Fn+F3	Standby		Puts the computer in standby mode, which can be defined with **Power Saver**.
Fn+F4	Task lights Brightness Down		Dims the keyboard task lights
Fn+F5	Task lights Brightness Up		Increases the brightness of the keyboard task lights
Fn+F6	Brightness Down		Decreases the screen brightness
Fn+F7	Brightness Up		Increases the screen brightness
Fn+F8	Audio Volume Down		Decreases the audio volume
Fn+F9	Audio Volume Up		Increases the audio volume
Fn+F10	Speaker on/off		Turns the speakers on and off; mutes the sound
Fn+F11	Num Lock	**Num Lk**	Enters Numlock mode. Use the embedded numeric keypad for quick number entry. Other keys function as normal.
Fn+F12	Scroll Lock	**Scr Lk**	Scroll Lock

Fn+PgUp	Home	**Home**	Functions as the "Home" key
Fn+PgDn	End	**End**	Functions as the "End" key
Fn+ Right Ctrl	Touchpad on/off		Toggles the touchpad on and off
Fn+ Left Shift	Keyboard Task Lights		Toggles the keyboard task lights on and off
Fn+Caps Lock	Wireless Radio On/Off Switch		Also known as "Airplane Mode". Toggles the power on and off to all radio devices. The radio devices include GPS, Bluetooth, WLAN,and WWAN radios. **NOTE** If radio wakeup is enabled, radio power will turn back on before the system suspends.

Numeric Keypad

The embedded numeric keypad consists of sixteen keys that make number intensive input more convenient. It is indicated by small characters located on the lower right corner of the key. Press **FN+F11 (NumLk)** to enable or disable the numeric keypad.

Standard Key	Key with Num Lock On
7	7
8	8
9	9
0	*
U	4
I	5
O	6
P	-
J	1
K	2
L	3
;	+
M	0
.	.
/	/
Enter	Carriage Return

Lock Keys

The keyboard has three lock keys which you can toggle on and off.

Lock Key	Description
Caps Lock	When Caps Lock is on, all alphabetic characters typed are in uppercase
Num Lk (Fn-F11)	When Num Lock is on, the embedded keypad is in numeric mode. The keys function as a calculator (complete with the arithmetic operators +, -, *, and /). Use this mode when you need to do a lot of numeric data entry. Alternately, connect an external keypad. See External keyboard

Scr Lk **(Fn-F12)**	Enters Scroll Lock mode. Scroll Lock varies between applications. It does not work with some applications

Windows Keys

The keyboard has two keys that perform Windows-specific functions.

Key	Icon	Description
Windows Logo Key	⊞	Start button. Combinations with this key perform special functions. Below are a few examples: ⊞ + **TAB** (Activates next Taskbar button) ⊞ + **E** (Opens My Computer) ⊞ + **M** (Minimizes all Windows) **SHIFT** + ⊞ + **M** (Restores Minimized Windows) ⊞ + **R** (Displays Run dialog box) Refer to Keyboard Shortcuts in Windows Help and Support for a complete list of Windows key combinations
Application Key	▤	Opens the application's context menu (same as right-click)

Application Launch Button

The Application launch button is the right button above the keyboard. Use an application manager to program this button's function.

Keyboard Task Lights

Your GoBook VR-2 is equipped with two task lights located in the display hinges directly below the display. The purpose of these task lights, or 'headlights', is to illuminate the keyboard to permit typing in a dimly lit or darkened environment.
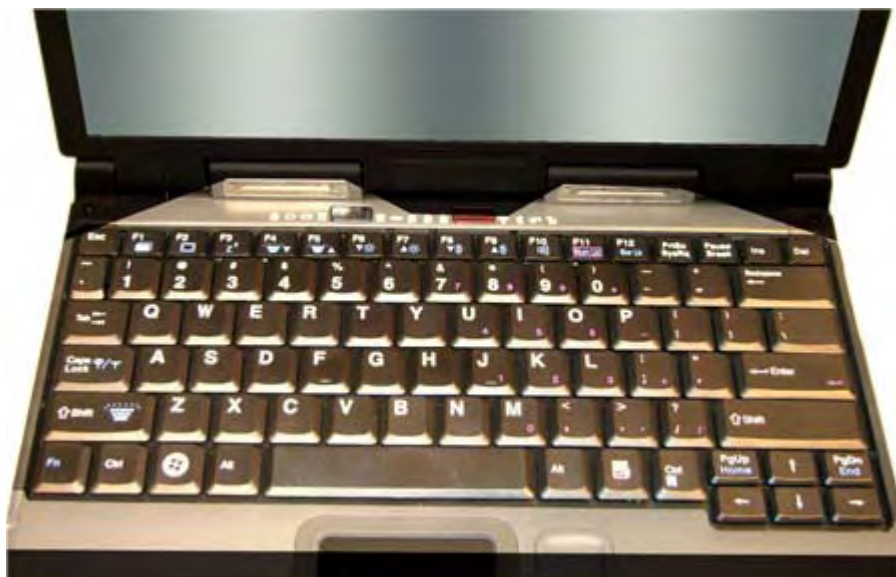
To Use the Headlights (task lights)

1.   Press **Fn**+**Shift** to toggle the lights on or off.

NOTE If the light does not come on, try adjusting the headlights by pressing **Fn**+**F5** to turn the brightness up.

2.   Press **Fn**+**F4** to dim the headlights

3.   Press **Fn**+**F5** to brighten the headlights

LED Status Indicators

Thirteen easy-to-read LEDs (Light Emitting Diodes) under the display screen indicate activity status for common functions

Hover the mouse over each LED and Symbol on the picture to see a description

.

#	Icon	Function	LED	Description
1		Power	Steady Green	Computer is on and operating
			Blinking Green	Computer has suspended to RAM
2		External Power	Steady Green	Power is on and external power is applied from the AC Adapter connected to a wall outlet, a vehicle-mounted dock, a vehicle power adapter, or an office dock
3		Battery Power	Steady Green	Battery is charging
			Blinking Green	Battery is low **NOTES** If the computer is not plugged into external power within a few minutes, it will go into a Suspend Power Mode If the computer is radio-equipped and is in the middle of communication, it will suspend power to the radio when the battery is low. The computer must then be plugged into external power to continue radio communication
			No Light	The battery is fully charged or a main battery pack is not fully inserted
4		Touchpad	Steady Green	Touchpad is activated
			No Light	Touchpad is disabled
5		Hard Disk Drive	Blinking Green	Computer is reading from, or writing to the built-in hard disk
6		Optical Disk Drive	Blinking Green	Computer is reading information from the Optical Disk Drive
7		Num Lock	Steady Green	Keyboard is in Num Lock mode
			Steady	Keyboard is in Caps Lock mode

8		Caps Lock	Green	
9		Scroll Lock	Steady Green	Keyboard is in Scroll Lock mode
10		WLAN Communication	Steady Green	Wireless LAN radio is on
11		Bluetooth Communication	Steady Green	Bluetooth radio is on
12		GPS Communication	Steady Green	GPS radio is on
13		WWAN Communication	Steady Green	WWAN radio is on

NOTE Some of the features associated with these LEDs are options and may not be included in your computer's configuration.

Touchpad

The built-in touchpad is a pointing device that senses movement on its surface. This means the cursor responds as you move your finger over of the touchpad. It also provides all the features of a two-button mouse.

How to Use the Touchpad

1. First, place your fingers on the keyboard in the normal typing position. The touchpad is easily accessible by moving either your left or right thumb off the space bar and onto the touchpad.

2. Gently move your thumb across the pressure-sensitive touchpad in the direction you want the cursor to move. The pad detects the change in pressure and moves the cursor in the corresponding direction.

3. You can also make selections by double-tapping. This function corresponds to double-clicking with a mouse. Once the cursor has been moved to the object you want to select, lightly double-tap the pressure sensitive touchpad. This double-tapping on the touchpad selects the desired item and prompts the software to perform the related operation.

Adjust the touchpad settings by selecting **Settings, Control Panel, Mouse, Buttons**. These settings allow you to change the orientation from right-handed to left-handed, and fine-tune the pointer movement and timing of clicks.

Touchpad Precautions

The touchpad is a pressure-sensitive device. If not properly cared for, it can be easily damaged. Please take note of the following precautions:

- Make sure the touchpad does not into come into contact with dirt, liquids or grease

- Do not touch the touchpad if your fingers are dirty

- Do not rest heavy objects on the touchpad or the touchpad buttons

- Keep your fingers dry and clean when using the touchpad and keep the touchpad dry and clean

- The touchpad is sensitive to finger movements. It responds best to light touches. Tapping too hard will not increase the touchpad's responsiveness

Touchpad Buttons

The buttons located directly below the touchpad are the same in function as those on a two-buttoned mouse. Pressing these buttons makes selections, drags objects, or performs a variety of other functions depending on the software.

To Select an Object

1. First move the pointer over the object you want to select

2. Press the left button one time. The functions of these buttons are software specific.

Double-Clicking

Double-clicking is a common technique for selecting objects or launching programs from icons. Once you have moved the pointer over the object you wish to select, rapidly press the left button two times. This action is commonly referred to as "double-clicking" an object.

Dragging

- Move the pointer to the desired location then press down the left button. While still holding down the left button, move the pointer to the desired location. Release the button

- Move the pointer to the desired location. Tap the touchpad twice quickly as if you were double-clicking; however, do not remove your finger after the second tap. Move the cursor to the desired location. Lift your finger to finish dragging

Display

The GoBook VR-2 features a 13.3-inch, XGA, outdoor-viewable, color display with an optional integrated touch screen. The Colorvue™ Transmissive display technology uses a built-in backlight for easy reading in most ambient light conditions. The backlight remains on whenever the display is on. The transmissive display enhancement provides improved outdoor visibility and even works well in sunlight.

Calibrating the Touch Screen

Your computer has the Hi Bright 500NIT touch screen, allowing you to start programs and input data using the approved pen (stylus) that comes with the computer.

1. Remove the stylus pen from its slot on the top of the display.

2. Select **Start, All Programs, Touchkit, Configure Utility**.

3. Select **4 pts Cal**.

4. Touch and hold the tip of the pen to the center of each blinking symbol as they appear on the screen until calibration is complete.

5. Select **OK** to save and exit.

Adjusting Display Brightness

Function keys can increase or decrease the display brightness.Press **Fn** + **F6** ▼☼ to decrease display brightness

- Press **Fn** + **F7** ▲☼ to increase display brightness

Adjusting Display Resolution

1. Right click on the desktop.

2. Select **Properties** and then select the **Settings** tab. The dialog box indicates the monitor screen resolution.

3. Use the slide bar to adjust the resolution. Normally, you should use the resolution suggested for the display or monitor.

NOTE Using a lower resolution than the screen was designed for will reduce the area of the display. You can stretch low resolution displays to full screen size by enabling Screen Expansion on the Main Menu of the BIOS Setup Utility. However, the stretching may cause distortion, especially to fonts.

Higher resolution modes may be used, as long as the monitor supports them.

Auto Dim Feature

To save the battery power, your computer automatically dims the display when the computer is not attached to external power.

NOTE You may still use the display brightness function keys (**Fn+F6**▼☼ and **Fn+F7**▲☼) to adjust display brightness.

See Managing Power for more information on power management features.

Simultaneous Display

The computer's crisp display and multimedia capabilities are great for viewing movies or giving presentations. If you prefer, you can also connect an external monitor. This computer supports simultaneous LCD and external display output via the external monitor port located on the back edge of the computer. You can also connect other output display devices such as LCD projection panels for large-audience presentations. See Attaching an External Monitor or Video Device for more information.

FEATURE When using an external monitor you can extend your desktop. This allows you to open and view one program on the external monitor while viewing a different program on your laptop's display. To set this up:

1. Right click on the desktop.

2. Select **Properties** to open the **Display Properties** Dialogue box.

3. Select the **Settings** tab.

4. Click on the "2" in the Monitors section.

5. Check "**Extend my Windows desktop onto this monitor**".

6. Select **Apply** and **OK** to save and exit.

7. Now you can drag the programs you want to view onto the external monitor.

Opening and Closing the Display

To open the display lid, slide the display lid latch to the right and lift up the lid, then tilt it to a comfortable viewing position.

To close the display lid, fold it down gently until the display lid latch clicks into place.

CAUTION To avoid damaging the display, do not slam it when you close it. Also, do not place any object on top of the computer when the display is closed.

Lid Switch

Your computer has a lid switch that automatically suspends your computer when you close the display and resumes it when you open the display.

To change the power management settings for the lid switch, perform the following:

1. On the System Tray area of the Taskbar, right-click the **Power Saver** icon (or).

2. From the menu, select **Configure Power Settings**.

3. Select the **Advanced** button.

4. Select what you want to happen when you close the display lid:

    o Do nothing

    o Sleep

    o Hibernate

5. Check the **Wakeup box** if you want the computer to resume when you open the display lid.

Cursor Visibility

To improve the visibility of the mouse cursor, you should:

- Enable the "Pointer Trails" feature to add trailing cursors

- Use a slow or medium speed/sensitivity level

You can combine a higher level of acceleration with a slow or medium speed/sensitivity level. This allows you to move the mouse cursor quickly by increasing your finger pressure, while still providing a finer degree of control when you apply minimum pressure.

NOTE To change the speed of the mouse, from the **Start Menu** select **Settings, Control Panel**, and then choose **Mouse** to make adjustments.

Memory

The GoBook VR-2's memory capacity is 512 to 4096MB with one user accessible memory socket supporting a 512MB to 2048MB memory module. Please consult your dealer if you need to add more memory.

Refer to the Memory Upgrade section for information about replacing the memory module.

Audio

Your computer includes 16-bit high-fidelity stereo audio output and an integrated microphone. The speakers are located above the display. The microphone is under the display.

You can attach external audio devices via the audio out jack on the left side of the computer.

Adjusting the Volume

- To increase volume, press **Fn+F9**▲))

- To decrease volume, press **Fn+F8**▼))

You can also adjust the volume with the Windows volume control applet located on the taskbar. However, the volume control function keys override the Windows volume control applet. If your volume is too low or too high after setting the volume in the applet, adjust the volume with the function keys.

The PC Card Slot

The computer has a built-in CardBus PC Card slot on the right side of the computer that can accommodate one Type II PC Card. It accepts credit-card sized cards that enhance the usability and expandability of the computer. The PC Card slot can be used as an interface between your computer and a variety of communications devices, such as network adapters, SCSI adapters, or fax/modems. They can also be used to provide additional data storage capacity. Please consult your dealer for PC Card options available that you can purchase for your computer.

NOTE Refer to your card's instructions on how to install and use the card and its functions.

Inserting a Card

1. The top side of a PC Card is usually identified with a label. Insert the card into the slot with the top up and the edge with pinhole contacts going in first. You will feel some resistance as the card slides into the back of the slot.

2. PC Cards require drivers, or a program that allows the operating system to use a specific device. Many drivers are included with Windows, but if not, you will be prompted to install the driver included with your card.

3. The computer will beep twice to indicate successful installation. A single beep means that there was a problem recognizing the card.

NOTE Please read the instructions included with individual PC Cards. Some cards may be inserted with power on, while others require that the computer be turned off.

Ejecting a Card

1. First, exit the application using the card.

2. Left-click on the Safely Remove Hardware icon on the taskbar and stop the card operation.

3. Press the slot eject button once to pop it out; then press it again to eject the PC Card.

Smart Card or EXPRESS Card Slot (option)

Your computer comes with a Smart Card Reader or EXPRESS Card slot (option). This slot is located directly above the PC Card Slot on the Right Side of the computer.

To insert a card

Insert a card with the label side up into the slot until it clicks into place. The card now appears on My Computer as a removable storage device that you can copy files to and from.

To remove a card

1. Make sure no operation (such as file copying or deletion) is using the card.

2. Press the card further into the slot to release the card. You will hear a click.

3. Remove the card.

Ports and Connectors

Ports and Connectors	Connection	Location
RJ-11	Phone line/modem (internet and fax)	Back Edge
RJ-45	Ethernet	Back Edge
DC-in	AC Adapter (power)	Back Edge
2 USB 2.0	USB Peripherals such as a mouse, printer or optical disk drive	Back Edge
External Monitor	External Monitor	Back Edge
Audio In	Microphone	Left Side
Audio Out	Speakers or headphones	Left Side
PC Card Slot	Type II PC Cards	Right Side
Smart Card Reader or **EXPRESS Card Slot**	Smart Cards or EXPRESS Cards	Right Side
Security Slot	Computer lock such as a Kensington lock	Left Side

Media Storage

Your computer comes with the following media storage:

- High-capacity Enhanced-IDE removable hard disk drive

- Internal CDROM, DVD-ROM/CD-RW combo, or DVD-RW/CD-RW drive

- One Type II PC Card slot (option)

- One Express Card/54 slot **OR** One Smart Card slot (option)

The Hard Disk Drive

Your GoBook VR-2 features a removable hard disk to provide high-capacity storage and fast access. Windows and most programs are stored here. Your GoBook VR-2 identifies the hard disk drive as drive C.

See the BIOS Setup Utility to password protect your removable hard disk drive.

Removing the Hard Disk Drive

1. Turn off the computer and turn it over so you are looking at the bottom.

2. Using a Philips head screwdriver, remove the screw next to the hard disk drive lock.
   NOTE If you prefer quick hard disk drive removal, do not reinstall this screw. It is an additional locking feature.

3. Slide and hold the hard disk drive lock toward the back of the computer to unlock the drive .

4. Gently pull the drive out of the computer.
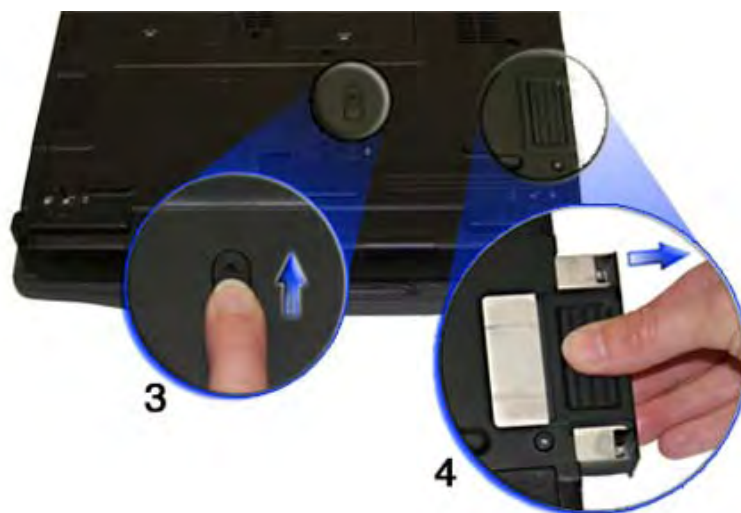
The Optical Disk Drive (option)

Your computer comes with a pre-installed CDROM,DVD-ROM/CD-RW , or DVD-RW/CD-RW combo drive. This drive allows you to read data from DVDs and CDs, including audio or video CDs. If you have a RW drive you can, and burn your data onto a CD recordable disc. If you have the DVD-RW/CD-RW drive, you can also burn data onto a recordable DVD disc. Please refer to the recording software online help for more information.

Your notebook identifies the drive with the letter following the hard drive letter. If your hard drive is C, then the optical disk drive will be D.

Inserting a Disk

1. Press the button on the front of the drive to open the disk tray and pull the tray open.

2. Place the disk on the tray, label side up.

3. Place the disk on the central spindle and press gently until the disk clicks into place.

4. Slide back the tray until it clicks shut.

Removing a DVD or CD

1. Make sure the computer is not accessing the DVD drive.

2. Press the eject button and pull the tray all the way out.

3. Pick up the disk by the edges and remove it from the tray. Push the tray into the computer until it closes fully.

CAUTION When the computer is reading from a DVD or CD, the Optical Disk Drive LED will flash on. Do not attempt to remove a disk while this light is active.

Precautions for Handling DVDs and CDs

Keep these precautions in mind when handling DVDs and CDs.

- Always hold the disk by the edges; avoid touching the surface of the disk

- Use a clean, dry, cloth to remove dust, smudges, or fingerprints. Wipe from the center outward

- Do not write on the surface of the disk

- Extremes in temperature may damage disks. Store disks in a cool dry place

- Do not use benzene, thinners, or cleaners with detergent. Only use cleaning kits designed for DVDs or CDs

- Do not bend or drop the disks

- Do not place objects on top of disks

CAUTION Do not insert any foreign objects into the disk tray. Do not force the tray to open or close manually. When not in use, keep the tray closed to prevent dust or dirt from entering the drive unit. If you experience difficulty when removing a disk, stretch a paper clip (or use a pin or a thin metal rod) and insert it into the emergency eject hole located on the front panel (see picture).

The disk tray should eject immediately. This procedure can also be used to remove a disk from the drive when the notebook is powered off.

PC Card Slot

See the PC Card Slot section for information.

EXPRESS Card or Smart Card Slot

See the EXPRESS Card and Smart Card Slot Section for information.

Computer Security

Your computer includes several different security features to help prevent theft and protect data. These include a security slot, multiple levels of password protection, an optional fingerprint scanner, an optional Smart Card slot and stealth mode.

Security Slot

A security slot located on the left side of the computer lets you connect a
Kensington compatible computer security lock. You can connect the computer to an immovable object to prevent theft. Insert the lock into the notch and turn the key to secure the lock. Some keyless models are also available. See the documentation that comes with your lock for more information.

Passwords

Passwords protect your computer from unauthorized access. When set, no one can access the computer without entering the correct password.

There are three types of passwords you can set:

- **Supervisor Password** secures your computer against unauthorized entry to critical parameters in the BIOS Utility

- **User Password** secures your computer against unauthorized use, and allows limited access to the BIOS Utility

- **Hard Disk Password** protects your data by preventing unauthorized access to your hard disk, even if the hard disk is physically removed from the computer and installed in another computer

NOTE   Do not forget your Setup and Hard Disk password! If you forget your password, please get in touch with your dealer or an authorized service center.

Fingerprint Scanner (Option)

The optional swipe style fingerprint scanner can be used for all standard security uses. The optional fingerprint scanner provides a greater level of security and convenience for your GoBook VR-2 and your private data. Use the fingerprint scanner instead of passwords for the following:

- during computer login

- during login at secure websites or when opening password protected applications

- to provide encryption security for individual files

Fingerprint Scanner Software

Before using the fingerprint scanner, you must first install compatible software. There are various software packages available

CAUTION Before installing any third party software, ensure it is approved for use with this computer.

NOTE When accessing some secure websites, you may need to specify you are using the scanner instead of a password. Refer to the fingerprint scanner software documentation for setup information.

Stealth Mode

Your computer has a stealth mode feature for users who may need to use it where light or sound could be dangerous or disruptive, such as a military user. Enabling stealth mode allows you to disable sound and light features such as system beeps, the fan, and the display backlight. Refer to the BIOS Setup Utility section for information about how to configure the stealth mode feature.

Smart Card Reader (Option)

If your computer has the Smart Card Reader option, you can use smart card technology for added security.

Trusted Platform Module (TPM)

Enable or disable TPM in the System BIOS. TPM provides a platform root of trust which uniquely identifies a particular platform and provides various crypto capabilities including hardware-protected storage.

Making Connections

Your computer is equipped with a full array of ports, connectors and bays, offering advanced communications technology. This section describes how to connect peripherals and hardware options that help you maximize your computer's features. Before connecting peripherals, first read the manual included with the peripheral for connection and operation instructions. You can purchase most of these and other options directly from authorized dealers.

If you are a mobile worker, you may want to purchase one of the GoBook VR-2's docking solutions such as the Vehicle Dock or Office Dock. These docks provide drop-in convenience, port expansion, and automatic battery recharging, enabling you to leverage your computer's features without having to attach and reattach cables and connectors when you move your computer from office to vehicle.

Attaching Power

Your GoBook VR-2 can be powered by battery, by attaching an AC Adapter or Vehicle Adapter to the DC power port, or by connecting the computer to a powered Vehicle Dock, or Office Dock. This page explains how to attach power to the DC power port.

NOTE When external power is properly applied, the External Power LED 🔌 lights.

Using the AC Adapter

1. Connect the AC adapter power cord to the AC adapter.

2. Connect the AC adapter to the DC-in jack on the back of your computer.

3. Connect the AC adapter power cord to a properly grounded AC outlet.

    NOTE It is recommended you use a quality surge protector.

Using the Vehicle Adapter (optional)

1. Insert the vehicle adapter's power cord into the DC-in jack on the back of the computer.

2. Insert the cigarette lighter adapter into the vehicle's cigarette lighter socket, turning it slightly to make a good connection.

CAUTION The vehicle adapter is not intended to be used continuously. It is intended to provide a convenient, temporary power source for powering and charging this computer while in transit in a vehicle. For permanent installations, it is recommended that the (fused) vehicle charger adapter be wired directly to the vehicle power supply. For additional information with regard to permanent installation of the Vehicle Adapter, contact your sales representative.

3. The power light illuminates to indicate that current is reaching the vehicle adapter. When you connect the vehicle adapter, it automatically begins charging the computer's battery. At moderate temperatures, around 21°C (70ºF), the battery should charge from empty to 90% in less than three hours if the unit is suspended or off. It should take less than four hours if the unit is in use. However, under extremely cold or hot temperatures, it will take longer to charge the battery (up to 16 hours).
    CAUTION Avoid exposing batteries to extremely hot or cold temperatures for long periods. To prevent possible damage to the battery, the GoBook VR-2 does not allow the battery to charge if the internal temperature of the battery gets too low (< 5°C or < 41°F) or too high (> 50°C or > 122°F).

Attaching an External Monitor or Video Device

The notebook has a VGA monitor port to connect your computer to an external monitor. You may use an external monitor simultaneously with your notebook's display, instead of your notebook's display, or as an extension of your notebook's display. To attach an external monitor, perform the following:

1. Locate the external monitor port on the back of your notebook.

2. Connect the video signal cable from the external monitor (or the VGA adapter) to this port.

3. Connect the power cable from the external monitor to a power outlet and turn on the monitor.

Read the monitor manual for additional instructions.

Using Simultaneous Display

Your computer takes advantage of Windows dual-display capability, allowing you to use your computer for presentation purposes. To use simultaneous display, connect an external display device to the external monitor port.

You can then toggle the display output location by pressing **Fn**+**F2** ▢. It will output to your computer's display, the attached external display, or both displays simultaneously. Keep pressing **Fn**+**F2** until you have the output option you want.

Using Extended Display

When using an external monitor you can extend your desktop. This allows you to open and view one program on the external monitor while viewing a different program on your laptop's display.

1. Right click on the desktop.

2. Select **Properties** to open the **Display Properties** Dialogue box.

3. Select the **Settings** tab.

4. Click on the "2" in the Monitors section.

5. Check "**Extend my Windows desktop onto this monitor**".

6. Select **Apply** and **OK** to save and exit.

7. Now you can drag the programs you want to view onto the external monitor.

Attaching USB Devices

Your computer comes with two Universal Serial Bus (USB) 2.0 ports on the back of the computer. This enables you to attach various devices such as a keyboard, mouse, scanners, or printer. USB devices can be chained together on a single cable.

Ethernet (LAN)

With the built-in Ethernet LAN, you can make LAN connections with 10/100/1000 Mbps connection speed. To use the network feature, connect an Ethernet cable from the network jack on the rear of the computer to a network jack or hub on your network.

Fax/data modem

You can use the fax/modem to connect to the Internet to send and receive data using the 56 Kbps V.90 protocol. When used with fax software, it can be used as a fax at 14.4 Kbps. In some countries, local regulations may not permit the use of the fax/modem designed for this system. In this case, you may use a PC Card modem. To use the fax/data modem port, connect a phone cable from the modem port to a telephone jack.

CAUTION Plug your modem into an analog telephone jack only. Most homes use analog lines. Do not use digital lines, such as the PBX and ISDN systems found in many offices. Digital lines may damage your modem.

Attaching Audio Devices

Audio devices are easy to connect with the audio ports accessible from the left side of the computer. You can plug an external microphone (or an audio line-in device) into the line-in jack. Amplified speakers or headphones connect to the line-out jack.

External keyboard or pointing device

This computer has a keyboard with full-sized keys and an embedded numeric keypad. If you feel more comfortable using a desktop keyboard, you can connect a USB external keyboard to one of the USB ports. You can also connect a USB mouse or other pointing device to one of the USB ports.

Wireless Communication

Your GoBook VR-2 supports up to four integrated radios for superior wireless communication (One radio per category listed below).

- [Wireless Local Area Network (WLAN)](#)

- [Wireless Wide Area Network (WWAN)](#) with [CRMA Express](#)

- [Global Positioning System (GPS)](#)

- [Bluetooth](#)

Since each customer's radio configuration is unique, please read the radio help installed on your desktop and refer to the manufacturer documentation to setup and use your radio(s).

Press **Fn+Caps Lock** to toggle the power on and off to all radio devices.

NOTE The radios do NOT function in suspend mode.

WLAN

Your computer comes with integrated Wireless Local Area Network (WLAN) capability.

About WLAN

WLAN provides all the features and benefits of traditional LAN technologies, such as Ethernet, without the limitations of wires or cables. It enables mobility and flexibility without compromising connectivity for today's mobile user.

CRMA Express WWAN (option)

If you ordered the CRMA Express module option, your computer may support one or more of these Wireless Wide Area Network (WWAN) radios:

- EDGE/GPRS/GSM

- CDMA/1xEV-DO/1xRTT

- UMTS/GPRS/GSM

- HSDPA

- EVDO Rev A

CRMA Express upgradeable and when WWAN radio technology changes. You can change with it, giving you greater wireless access when you need it.

About EDGE/GPRS/GSM Network

The Enhanced Data Rates for Global Evolution (EDGE) network allows users to transfer data with average speeds of between 70 and 130 Kbps (kilobits per second) with burst speeds up to 200 Kbps. It is more than three times the speed of GPRS. The EDGE network can help you perform at higher levels of productivity by providing real-time wireless access to critical business systems and applications.

About CDMA/1xEV-DO/1xRTT Network

1xEV-DO

Evolution Data Only or Evolution Data Optimized (EV-DO) is a 3G wireless technology with average user download speeds ranging from 400 to 700 Kbps with peak rates up to 2.0 Mbps. When you spend a lot of time away from your desk, the faster speeds from EV-DO can lead to greater productivity. It's more than just fast email retrieval. Get fast and secure access to your information and applications with EV-DO.

1XRTT - Single Carrier (1x) Radio Transmission Technology

1xRTT is a pre-3G wireless technology based on the CDMA platform. It has the capability to provide ISDN like speeds of up to 144 Kbps with typical speeds in the 50-70 Kbps. 1xRTT is also referred to as CDMA2000.

About UMTS/GPRS/GSM Network

Universal Mobile Telecommunications System (UMTS), also referred to as wideband code division multiple access (W–CDMA), is one of the most significant advances in the evolution of telecommunications into 3G networks.

UMTS is a worldwide standard for wide-area wireless data communication based on Global Systems for Mobile communications (GSM™). UMTS provides broadband mobile access to business systems and applications that can help improve mobile users' productivity.

UMTS provides broadband speeds with average data speeds of 220-320 Kbps and bursts up to 384 Kbps on some networks. Its theoretical limit is 2 Mbps. It delivers four-to-six times the speed of dial-up Internet access and eight times the speed of GPRS wireless data service. UMTS allows mobile users to respond to urgent emails and access the Internet.

HSDPA

High-Speed Downlink Packet Access or High-Speed Downlink Protocol Access is a 3G GSM Mobile protocol in the HSPA family, which provides a roadmap for UMTS-based networks to increase their data transfer speeds and capacity. Current HSDPA deployments/cards/modules now support 1.8 Mbit/s, 3.6 Mbit/s, 7.2 Mbit/s and 14.4 Mbit/s in downlink.

EVDO Rev. A

EVDO Revision A (1x Evolution-Data Optimized) is a wireless radio broadband data standard that offers data rates up to 2.4 mbps, Revision A integrates most of the faster data technology from 1xEV-DV Revision D, and improves latency. These enhancements allow features such a VoIP and video calling.

GPS (option)

About GPS

The Global Positioning System (GPS) is a worldwide radio-navigation system formed from a constellation of 24 satellites and their ground stations. GPS uses these satellites as reference points to calculate positions accurate within one meter.

Bluetooth (option)

About Bluetooth

Bluetooth is a short range, wireless radio. When Bluetooth-capable devices come within range of one another, an electronic conversation automatically takes place to determine whether they have data to share or whether one needs to control the other. Then, the devices hop frequencies in unison so they stay in touch with one another and avoid interference with other devices. Bluetooth devices send out very weak signals of 1 milliwatt. By comparison, the most powerful cell phones can transmit a signal of 3 watts. This limits their range to about ten meters. Even with the low power, the walls in your house won't stop a Bluetooth signal, making the standard useful for controlling several devices in different rooms.

Antennas

The GoBook VR-2 has several embedded antenna options to support wireless communications.

#	Antenna
1	CRMA Express Antenna
2	GPS Antenna
3	WLAN Antennas
4	Bluetooth / Diversity Antenna

Improving Radio Coverage

Wireless connectivity between your GoBook VR-2 and wireless network access points is essential. Maintaining this wireless connectivity over a wide area is fundamental to the usefulness of the network. This makes the scope and reliability of radio coverage a primary concern. Therefore, one of the most important features of the wireless network is the degree of radio coverage provided. Coverage can be influenced by terrain, buildings or even a crowded room. Here are some tips to help you improve radio coverage, depending on your location.

In any Location

1. Performance can vary significantly at different times of the day.

2. Weather can affect performance.

On the Street

1. Try all sides of a building to see which side provides the strongest radio signal.

2. Move from under trees. Pine needles absorb radio signals more than leaves.

3. Move away from overhead electrical wires.

4. Radio signals reflect off other buildings. Even in the signal shadow, the signal could be reflected back by another building.

5. Try not to hold the unit. If possible, place it in vehicle, on a cabinet or desk.

6. If holding the unit, turn the unit in 90-degree increments to avoid shielding it with your body.

7. The signal is 1-2 feet across; therefore, moving several feet in any direction may give different results.

Inside a Building

1. Move toward windows.

2. Signals do not penetrate ground; therefore, there will probably be no signal in basements.

3. Reflective coatings on windows reflect radio signals. Try the side of the building that is least likely to have coated windows.

4. Closed metal blinds can reflect radio signals.

5. Dropped ceilings sometimes hide an accumulation of electrical cable.

Electromagnetic Interference (EMI)

1. Electromagnetic Interference (EMI) is generated by switching circuitry closets or Un-interruptable Power Source (UPS) systems found near computer rooms and can block the radio signal.

2. Look for significant sources of electromagnetic radiation. The problem may emanate from a source between location and the radio base station.

When to use Landline Communication

If these tips do not improve radio signal strength, switch to landline communication. Switching to landline communication is faster than searching for and trying to improve the radio signal.

Operating with Battery Power

The computer operates on AC or battery power. This section contains the information you need to know to operate the computer on battery power. It also includes information on how your computer manages and saves power.

Battery pack

The battery pack has the following characteristics:

- Employs current battery technology standards

  The computer uses a "smart" Lithium-Ion battery to consistently provide the long battery life best suited for

mobile users

- A temperature sensor and memory device that stores information about the battery, such as how much charge is left and how many times it has been recharged

- Battery-low warning

  When the battery charge level becomes low, the battery alarm beeps or displays a warning on your screen. This tells you that the battery power is critically low (and you should save your work). You can correct this situation by recharging the battery pack.

Whenever possible, use the AC adapter. The battery will come in handy when you travel or do not have access to AC power. It is advisable to have an extra fully-charged battery pack available as backup.

Using a battery pack for the first time

Before using a battery pack for the first time:

1. Connect the AC adapter to the computer, then to a power source.

2. Calibrate the battery to set the gas gauge to accurately reflect battery capacity.
   You only need to do this once with a new battery or with a battery that's been stored without being used for a long time. If the computer is to be stored for more than two weeks, we recommend you remove the battery pack.

Battery and Temperature

The battery is most efficient at room temperature. It operates in a wide temperature range but the battery capacity is affected by higher or lower temperatures.

Temperature	Approximate Capacity
0°C	80%
20°C	100%
45°C	100%

WARNING Do not expose battery packs to temperatures below 0ºC (32ºF) or above 46ºC (115ºF). This may adversely affect the battery pack.

Installing and removing the battery pack

CAUTION! Before removing the battery pack, make sure that you have an AC adapter connected to the computer; otherwise, turn off the computer.

 To install a battery pack:

1. Line up the battery connectors.

2. Press gently on the battery until it clicks into place.

3. Slide the battery locks toward the outside of the computer to lock the battery and ensure they latch completely 🔒.

To remove the battery pack:

1. Plug in AC power and turn off the computer.

2. Slide the battery locks toward the inside of the computer to unlock the battery 🔓.

3. Slide and hold the battery release latch.
4. Gently slide the battery out of the computer.

Battery Calibration

Over time, as the battery is repeatedly drained and recharged, battery performance will decrease. The first time you use the battery, you should calibrate it. Occasionally, the battery needs to be recalibrated for maximum performance. The calibration process empties and charges the battery. This allows the Windows battery gauge to accurately monitor battery status.

It is recommended you calibrate your battery:

- The first time you use your computer

- After it has been stored for awhile

- If the gas gauge has become inaccurate.

- Every three months for optimum performance

Windows Battery Calibration

To run the Battery Calibration program select **Start, All Programs**, and **Mobile Computer Tools**. Next, select **Battery Calibration**. After starting calibration, the Battery Calibration application requires no further input from the user. The calibration consists of four steps:

1. Partial Discharge - the battery is drained to a level below 90 %.

2. Charge - the battery is fully charged to 100 %.

3. Discharge and calibrate:
   First, the battery is discharged all the way down to zero. Now the battery is 'calibrated' but not charged. You may stop the process after this point and let the battery charge outside of the Battery Calibration application.

4. Charge - if the Battery Calibration continues running, the battery will fully charge to 100%.
   Battery Calibration will take from 5 to 10 hours, depending on how much power the battery may already contain.

NOTE The unit will not go into suspend mode while Battery Calibration is running.

CAUTION Do not disconnect AC power while Battery Calibration is running. If AC remains disconnected for more than two minutes, the application will terminate.

CAUTION Do not remove the battery while Battery Calibration is running. Doing so will cause the application to terminate immediately.

Battery Charging

To charge the battery, install the battery pack and plug the AC adapter into the computer and an electrical outlet. You can use your computer while charging the battery. However, this will increase the charging time.

NOTE We suggest that you charge the battery pack before retiring for the day and let it charge overnight before traveling. This ensures a fully charged battery for use the next day.

While the battery is charging, the Battery Power LED ▭ will be active after 6-12 seconds and will stay lit until the battery is fully charged. When the battery is fully charged, the Battery Power LED will turn off.

If your computer is turned off, a fully discharged battery will take about 3 hours to recharge. If your computer is turned on and is not in suspend mode, it will take about 3-6 hours to recharge the battery. Refer to the following table:

	Charging	Discharging
System On	3-6 hours depending on temperature and processes running	3.5 hours
System Off	3 hours	

Suspend to RAM		72 hours
Suspend to Disk		7 days

NOTE A fully charged Li-Ion battery can run the Notebook for approximately 3.5 hours of normal use. (According to an industry standard bench marking tool). Use of external devices, the optical disk drive and wireless radio causes increased battery consumption. Refer to the Battery Tips section for ideas to conserve battery power.

When to Replace the Battery

Over time, the battery's capacity gradually decreases. We recommend that you replace your battery when you notice that it begins to store significantly less charge. See Battery Installation and Removal for more information.

Heat Considerations

The computer's processor has been specially designed to consume as little power as possible, and generates very little heat. However, working in a hot environment, or working for long periods may raise the temperature. The GoBook VR-2 takes the following steps to lower temperature:

1. The cooling fan turns on automatically. You may feel air coming from a vent at the left side of the computer when this happens.

2. If the temperature continues to rise, processor activity will be reduced. You may notice a slight loss of performance when this happens.

WARNING If the CPU temperature exceeds 95°C, the system will shutdown to prevent the heat from damaging the computer's infrastructure. When the computer cools to a normal temperature you can restart the system. The higher the temperature, the longer the period the computer will need to cool down.

Monitoring Battery Power

To see how much power the battery has left, move the cursor to the **Power Saver** icon (or) in the System Tray area of the Taskbar. The status will show as a pop-up when you mouse-over the icon.

Low Battery Alarms

How your computer responds to a low battery condition can be set by going to **Start, Settings, Control Panel, Power Options, Alarms**.

Two different power alarms can be enabled or disabled: the **Low Battery Alarm**, and the **Critical Battery Alarm**. Use the slide bar to set the power level at which the alarms are activated. Select the **Action** button to choose whether the alarm sounds, displays a message, or both.

CAUTION When battery power is low, the alarm beeps or displays a warning on your screen. Take immediate action, such as saving files or connecting to the AC adapter , or data may be lost.

When the computer alerts you that the battery is low, immediately do one of the following:

- Connect the AC power adapter

- Save your work and then select **Shut Down** from the **Start menu**

Turn off the computer and replace the discharged battery with a charged battery (See Battery Charging).

NOTE Do not restart the computer until you have connected to an AC adapter or replaced the discharged battery with a charged battery.

Refer to Battery Tips for more informwation about how you can conserve battery power. Refer to Managing Power for information about how you can setup your computer to effectively manage power for your unique use patterns.

Managing Power

Your computer has power management capability so you can reduce the amount of energy used, especially during periods of inactivity. Effective use of power management options can greatly conserve and extend your battery life. The power management unit monitors system activity, such as hard drive, keyboard, mouse, or any devices attached to a port. If it does not detect activity for a period of time, the computer stops some or all of these devices in order to conserve energy.

Your computer employs a power management scheme that supports ACPI (Advanced Configuration and Power Interface), allowing for maximum power conservation and maximum performance at the same time. Windows handles all power-saving chores for your computer.

For more information search for Power Options in Microsoft (R) Help and Support.

Power Saver

Your computer includes a utility, the **Power Saver**, that builds upon the operating system's power management capabilities. It is recommended that you use Power Saver rather than the Power Management utility located under the Control Panel. Power Saver provides additional ways of saving battery power.

When on external power, Power Saver provides two profiles: Faster Charge and Normal. When on battery, it provides another two profiles: Max Life and Normal. You can easily toggle between the Max Life and Normal battery profiles by pressing **Ctrl**+**Space**.

There is also an option to keep the computer awake, while at the same time, saving battery power.

To Set the Power Saver Mode

1. On the System Tray area of the Taskbar, right-click the **Power Saver** icon (see table).

2. Select the desired power profile. **NOTE** You can easily see which profile you are currently using by the color of the **Power Saver** icon (see table).

To Configure Power Saver Settings

1. On the System Tray area of the Taskbar, right-click the **Power Saver** icon.

2. From the menu, select **Configure Power Settings**.

Power Saver Icons			
Icon	Description	Icon	Description
	The computer is on battery power and set to use the Max Life battery profile.		The computer is on external power and set to use the Faster Charge plugged in profile.
	The computer is on battery power and set to use the Normal battery profile.		The computer is on external power and set to use the Normal plugged in profile.
	The computer is on battery power and set to Stay Awake. This setting: • overrides any settings that cause the		The computer is on external power and set to Stay Awake. This setting: • overrides settings that cause the

3. Change settings as desired.

		computer to inactivity suspend, hibernate or turn off the display.		computer to inactivity suspend, hibernate or turn off the display.
		• may shorten your battery life and should only be used temporarily.		• is automatically reset if the computer is shut down or restarted.
		• is automatically reset if the computer is shut down or restarted.		

Low-Power States

Your computer can enter three different low-power states to conserve power: **Standby, Hibernate** and **Power Off**. These states can be entered manually, or after a period of inactivity. You can configure the **Power Saver** utility to define how and when each of these occur.

Standby

Most devices in the system are powered off, but the contents of system memory are retained. Standby is sometimes referred to as Suspend to RAM. When the computer returns from standby mode, the desktop appears with the same files and programs open as when the computer was suspended. Resume time is very quick.

Hibernate

Hibernate, or Suspend to Disk, is similar to Standby, except that the current state of the computer is copied to the hard disk in a special file. After this occurs, all devices in the computer are turned off. When the computer returns from hibernation, the desktop appears with the same files and programs open as when the computer was suspended. Hibernation saves more power than Standby, but takes slightly longer to resume.

Power Off

All applications are closed and the system is shutdown.

Entering Low-Power States

There are various ways to initiate these low-power states.

• From the **Power Saver** utility, you can configure the Power Button, Sleep Button (**FN**+**F3**) and Lid Switch to initiate any of the above low-power states.

• From the **Start Menu**, select **Shut Down** to display a dialog that allows you to manually enter any of these low-power states.

• The **Power Saver** utility allows you to specify a period of inactivity before the computer enters standby or hibernate mode.

Battery Tips

Tip 1. Avoid excessive heat and cold

- Your battery will last longer during the day if it is used, charged and stored between 50°F and 86°F (10°C and 30°C)

- Charge the battery nightly where the temperature will remain around 68°F (20°C). Your battery may not last as long through the day if you charge it at higher or lower temperatures

- Allow unrestricted airflow while the computer is connected to external power. Make sure that the fan inlet and outlet are unobstructed

- Avoid exposing batteries to hot or cold temperatures for long periods

How your battery behaves in warm conditions

How your battery behaves in cold conditions

Tip 2. Prevent wasted power

- Manually turn off or suspend your computer whenever you are not using it

- Reduce the screen brightness. Decrease brightness by pressing **FN+F6**. Increase it by pressing **FN+F7**
  NOTE You can select a maximum brightness setting in the **Power Saver** utility

- Use the AC adapter or vehicle adapter whenever possible

- Use the **Power Saver** utility to configure your computer for optimal power savings
  NOTE It is recommended that you use **Power Saver** rather than the Power Management utility located under the Control Panel. **Power Saver** provides additional ways to save battery power.

    To Adjust Power Saver Settings

    1. On the System Tray area of the Taskbar, right-click the Power Saver icon (or).

    2. From the menu, select **Configure Power Settings**. This opens the Power Saver utility, enabling you to configure your computer for optimal power savings. See Managing Power for more information.

- When running on battery power, use the Power Saver utility to make sure your system suspends automatically after a few minutes of inactivity. PC Cards, radios, custom applications, or modified system settings may affect this

- Remove PC Cards or disable them in **Power Saver**. Unplug peripherals when you are not using them. They may draw power from the system even when not in use

- Avoid operating the fax/modem, or audio and video applications when using battery power. Operating a fax/modem, video, or audio equipment increases the computer's power requirements

- Don't use screen savers as they draw excessive current, especially "3D" screen savers

- Turn off the Wireless LAN when not using it. Turning on the Wireless LAN increases the computer's power requirements

- Avoid or minimize using applications that keep the CPU busy a large percentage of the time. The following will help you determine if your system is running such applications:

Identifying power wasting programs

What to do if applications are keeping the CPU busy

Tip 3. Calibrate your battery

- Over time, the accuracy of the Windows battery gas gauge may be affected by repeated charging and discharging of the battery. Calibrating the battery every three or four months helps to keep the gas gauge accurate. For information on calibrating the battery, refer to Battery Calibration

Tip 4. Get a good charge

- Your computer will charge more quickly if it is turned off or suspended

- In warmer or cooler temperatures, your battery can take much longer to fully charge

- If your battery is charged in a cold (less than 41°F/5°C) or very warm (greater than 122°F/50°C) environment, it is possible that the Battery Charge LED will indicate that the charge has stopped; however, this does not necessarily mean that your battery is fully charged

Tip 5. Prevent data loss

Follow these guidelines to prevent data loss when removing your battery or storing your computer:

- You will lose data if you remove the battery while the computer is operating or suspended. To prevent this, shutdown your computer or put it into hibernate (suspend-to-disk) mode before removing your battery

- If you plan to store your computer for more than a few days, shutdown your computer or put it into hibernate mode. Remove the battery before storing the computer

Tip 6. Clean terminals

- Dirty terminals can be a cause of charging problems. Clean battery terminals with a cotton swab dipped in isopropyl alcohol. Make sure that the alcohol has evaporated before reinstalling the battery

Tip 7. Storing batteries

- Store the battery within the recommended temperature range: 10°C to 30°C (50°F to 86°F)

- Unused or stored batteries can lose power over time. When you install a battery that has not been used for awhile, connect external power to the computer and fully charge your battery

- Battery calibration may increase the capacity of a battery stored for a period of time. For information on calibrating the battery, refer to Battery Calibration

- It is recommended that the battery is recharged every six months while in storage

Customizing Your BIOS Settings

This section explains how to use the BIOS Setup Utility to modify the BIOS settings. The Setup Utility displays and

allows modification of the computer's components and allows you to configure devices that are connected to it. This information is used to test and initialize components during boot up and to make sure everything runs properly when the system is operating.

Your computer is already properly configured and optimized with a set of default values so you do not need to run this utility. In certain circumstances, the system may generate an error message that asks you to make changes to the BIOS settings using the Setup Utility. This happens if the system finds an error during the POST (Power On Self Test) that it carries out at start-up. Please first refer to Troubleshooting if a problem arises.

If you are not sure how to configure the BIOS settings we suggest that you select "Load Optimal Defaults" on the Exit Menu screen, then exit saving changes. This loads optimized default settings for normal use.

The most commonly used Setup functions are:

- Setting the date and time

- Setting a password

- Boot order setup

- Stealth mode setup

Using the Setup Utility

The Setup Utility allows you to configure your computer's basic settings. When you turn your computer on, the system reads this information to initialize the hardware so that it can operate correctly. You can use the Setup Utility to change your computer's start-up configuration. For example, you can change your system's security settings.

Starting the Setup Utility

You can only start the Setup Utility after the computer has been turned on or rebooted. To execute a controlled reboot, select **Start, Shutdown, Restart**. Shortly after the computer restarts, you will see the following text at the bottom of the screen: "Press F2 to enter Setup."

Press the **F2** key when you see this prompt.

NOTES

The BIOS password settings affect this option. If a user or supervisor password has been previously entered, you will be asked for a password.

The touch screen is not active in the Setup Utility.

Navigation

Hover the mouse over each numbered call out and each menu bar item on the picture to see a description.
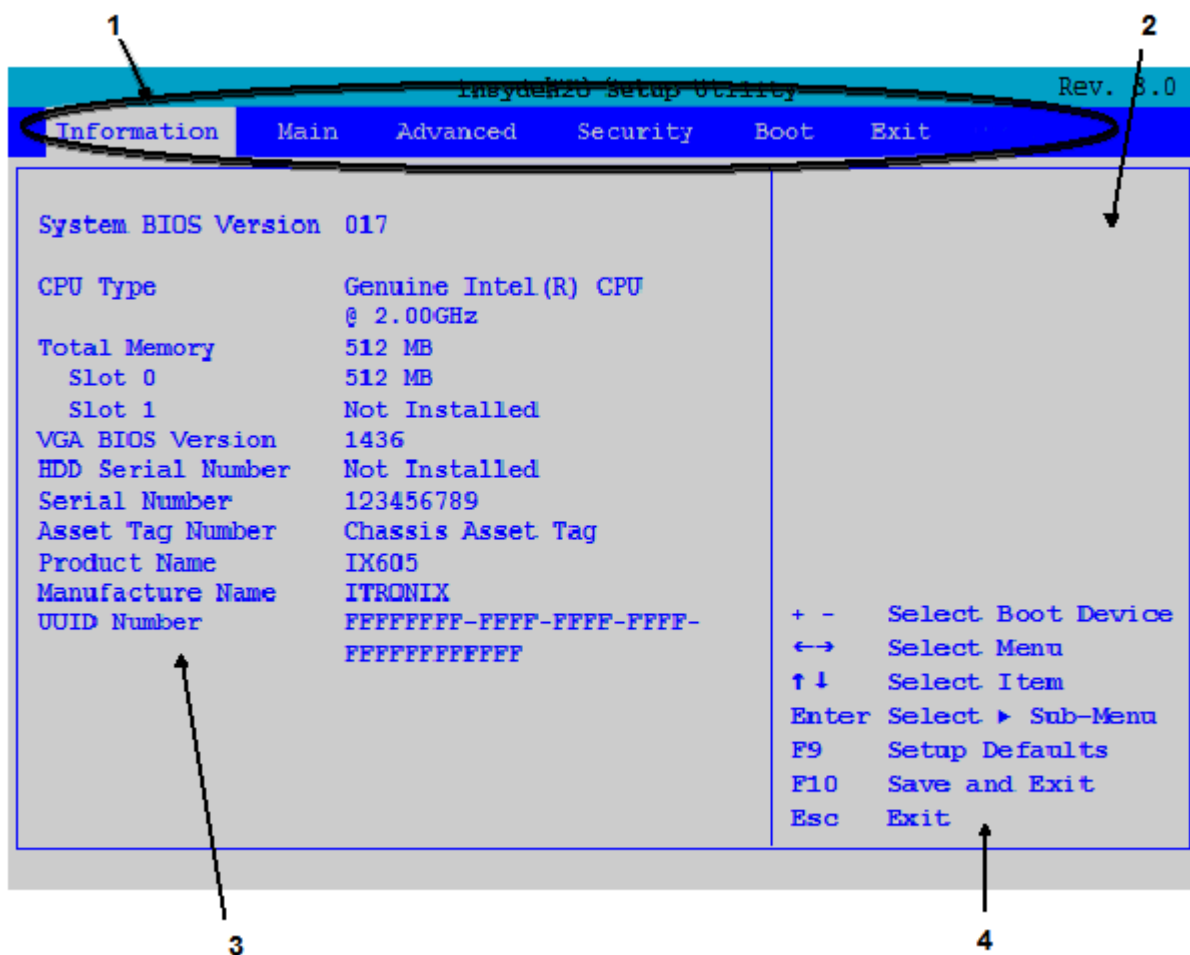
The Menu Bar

The Setup Utility has six menu options in the Menu Bar (1) at the top of the window. Press the left or right arrow keys to cycle through these menu screens.

Menu	Description
Information	Displays a summary of the computer's hardware information
Main	Contains basic settings about your computer such as date, time, and other general options
Advanced	Allows you to view and configure your drives, and I/O (input/ output) ports, and stealth mode settings
Security	Lets you set passwords for protecting your computer
Boot	Allows you to set the order in which the system boots up
Exit	Includes options to save or discard your changes, and to exit the BIOS Utility

The Field Help Window

The Field Help Window (2) is on the right side of each menu. It displays the help text for the currently selected field. This text updates as you move the cursor from field to field.

Viewing or Changing Field Settings

The Navigation Help instructions (4) also on the right side of each menu displays the keys used to move through and change the Settings and Information fields (3) on the left side of the menu.

- Press the up and down arrow keys to cycle through fields on each menu

- Press **Esc** to exit any sub-menu

- Press **Enter** to make a selection or go into a sub-menu

NOTE You can change the value of a field if it is enclosed in <brackets>. Navigation keys for a menu are shown at the bottom of the screen. Please refer to the help information that displays in the Field Help Window as you select a field.

CAUTION Certain fields are highly technical. Do not make changes to a field if you do not understand its function. For optimum settings, press **F9** to load setup defaults; then press **F10** to save the changes and exit the Setup Utility.

NOTE Don't forget your password. If you forget your password, you may have to return your notebook computer to your dealer to reset it.

The Information Menu

This page displays information about your computer from what kind of CPU and how much memory the computer has, to pertinent numbers such as the product number and serial number:

```
                    InsydeH2O Setup Utility              Rev. 3.0
   Information    Main    Advanced    Security    Boot    Exit

   System BIOS Version  017

   CPU Type             Genuine Intel(R) CPU
                        @ 2.00GHz
   Total Memory         512 MB
      Slot 0            512 MB
      Slot 1            Not Installed
   VGA BIOS Version     1436
   HDD Serial Number    Not Installed
   Serial Number        123456789
   Asset Tag Number     Chassis Asset Tag
   Product Name         IX605
   Manufacture Name     ITRONIX
   UUID Number          FFFFFFFF-FFFF-FFFF-FFFF-    + -    Select Boot Device
                        FFFFFFFFFFFF                ←→    Select Menu
                                                    ↑↓    Select Item
                                                    Enter Select ▶ Sub-Menu
                                                    F9    Setup Defaults
                                                    F10   Save and Exit
                                                    Esc   Exit
```

Field	Description
System BIOS Version	Displays the current system BIOS version
CPU Type	Displays the CPU information
Total Memory	Displays the current system memory
Slot 0

Slot 1 | Displays the current amount of memory in each memory card slot |
| VGA BIOS Version | Displays the current VGA BIOS version |
| HDD Serial | Displays the primary master HDD serial number |

Number	If there is no primary master HDD, "Not Installed" displays
Serial Number	Displays the System Serial Number (30 characters)
Asset Tag Number	Displays the Asset Tag Number (32 characters)
Product Name	Displays the Product Name (up to 15 characters). This is "IX605"
Manufacturer Name	Displays the Manufacturer Name (up to 15 characters).
UUID	Display the UUID (16 Byte Hex-Digital)

The Main Menu

```
                        InsydeH2O Setup Utility                    Rev. 3.0

   Information    Main    Advanced    Security    Boot    Exit

  System Time:          [16:19:45]
  System Date:          [03/30/2007]             This is the help for the
                                                 hour field.  Valid range
  Screen Expansion:    <Enabled>                 is from 0 to 23.
                                                 INCREASE/REDUCE : +/-
  Network Boot:        <Enabled>

  F12 Multi-Boot Menu: <Enabled>




                                                 + -     Select Boot Device
                                                 ←→      Select Menu
                                                 ↑↓      Select Item
                                                 Enter Select ▶ Sub-Menu
                                                 F9      Setup Defaults
                                                 F10     Save and Exit
                                                 Esc     Exit
```
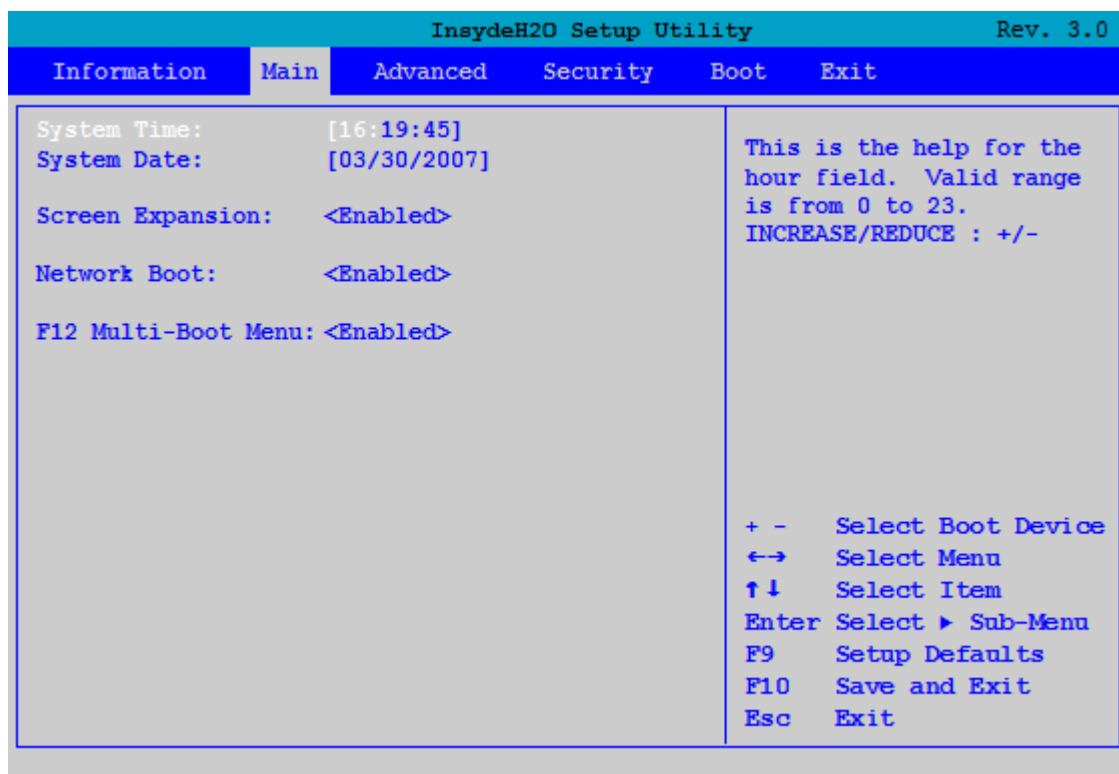
Field	Setting	Function
System Time	HH:MM:SS	Sets the system time in 24 hour format. The value takes effect immediately
System Date	MM/DD/YYYY	Sets the system date. The date can be set from January 1, 2000 to December 31, 2099. The value takes effect immediately
Screen Expansion	**Enabled** Disabled	When enabled, the computer will allow a low resolution image to fill the display
Network Boot	Enabled **Disabled**	When enabled, the system can boot from the network. This setting requires a reboot to take effect NOTE The LAN must be selected as the first boot item on the Boot Menu for the computer to boot directly from the network during

		power on
F12 Multi-Boot Menu	**Enabled** Disabled	When enabled, the message "F12 to enter Multi Boot Menu" displays during POST

The Advanced Menu

```
                        InsydeH2O Setup Utility              Rev. 3.0

   Information     Main     Advanced     Security     Boot     Exit

  ▶ Stealth Mode Configuration                  Stealth Mode
  ▶ I/O Device Configuration                    Configuration
  ▶ IDE Configuration

    Legacy USB Support:            <Enabled>
    WLAN:                          <On>
    WWAN:                          <On>
    Bluetooth:                     <On>
    GPS:                           <On>
    WWAN Radio Wakeup:             <Disabled>
    Boot On AC Power Detect:       <Disabled>
    Thermal Protection:            <Enabled>
    HDD Heater:                    <Enabled>
    UMA Share Memory:              <68MB>
    LED KB Timeout Setting:        <10Min>         + -    Select Boot Device
    Lid Opened:                    <Resume>        ←→    Select Menu
    CPU VT Support:                <Disabled>      ↑↓    Select Item
                                                   Enter Select ▶ Sub-Menu
                                                   F9    Setup Defaults
                                                   F10   Save and Exit
                                                   Esc   Exit
```

Field	Setting	Function
Stealth Mode Configuration	sub-menu	Configuring the stealth mode feature enables you to turn off sound and light such as the fan, beeps, and the backlight. This allows you to use the computer in an environment where sound and light could be dangerous or disruptive
I/O Device Configuration	sub-menu	Configure I/O Devices (serial and parallel ports)
IDE Configuration	sub-menu	Selects the IDE controller and hard disk drive type installed in your system
Legacy USB Support	Disabled **Enabled**	When enabled, the system can support legacy USB devices
WLAN	Off **On**	Wireless LAN devices are powered on or off when the system reboots
WWAN	Off **On**	Wireless WAN devices are powered on or off when the system reboots
Bluetooth	Off	Bluetooth devices are powered on or off when the system reboots

	On	
GPS	Off On	GPS devices are powered on or off when the system reboots
WWAN Radio Wakeup	**Disabled** Enabled	This option determines the WWAN radio power when the system is suspended. When disabled, radio power is turned off before system enters standby state. When enabled, the radio power remains on when the system is in standby
Boot On AC Power Detect	**Disabled** Enabled	If enabled, the system detects when AC power is connected and boots up or resumes automatically
Thermal Protection	Disabled **Enabled**	If enabled, the system can NOT boot up in temperatures between 0 and -20 C°. If disabled, the system can boot up outside this temperature range **CAUTION** disabling thermal protection may result in damage to the unit and void the warranty agreement
HDD Heater	Disabled **Enabled**	If enabled, the system is warmed by an HDD Heater
UMA Share Memory	**64MB** 128MB	The size of the main memory that is allocated to support the Internal Graphics device in VGA graphics mode
LED Keyboard Timeout Setting	5Min **10Min** 15Min 20Min 30Min 40Min 50Min 60Min 80Min 100Min 120Min 240Min	Choose the interval at which the timeout counter is reset for PS2 key and/or mouse activities. The Keyboard task lights will turn off after the set period of inactivity
Lid Opened	Nothing **Resume**	If set to "Nothing" there is no action taken when the Lid is opened If set to "Resume", the system will resume from a suspended state when the lid is opened
CPU VT Support	**Disabled** Enabled	If enabled, performance is increased for server systems. Note: System Security may be affected if this setting is enabled.

Stealth Mode Configuration

Stealth mode is a feature that allows the computer to be used in an environment where sound and light could be dangerous or disruptive. If stealth mode is disabled, the LEDs, fan, system beeps, audio, and display brightness operate normally.

NOTE An off setting indicates stealth mode is in effect for that option. For example, if stealth mode is enabled and the LED option is set to "off", the LEDs will NOT illuminate to indicate activity.

```
                        InsydeH2O Setup Utility              Rev. 3.0
              Advanced

  Stealth Mode Configuration                  If "Disabled", the
                                              sub-options in Stealth
  Stealth Mode:           <Disabled>          Mode are grayed.The
    LED                   <Off>               LEDs,Fan,system
    Fan                   <Off>               beeps,audio and display
    Audio                 <Off>               brightness operate
    Backlight Brightness  <Off>               normally.
    Wireless Radios       <Off>


                                              + -    Select Boot Device
                                              ←→     Select Menu
                                              ↑↓     Select Item
                                              Enter Select ▶ Sub-Menu
                                              F9     Setup Defaults
                                              F10    Save and Exit
                                              Esc    Exit
```
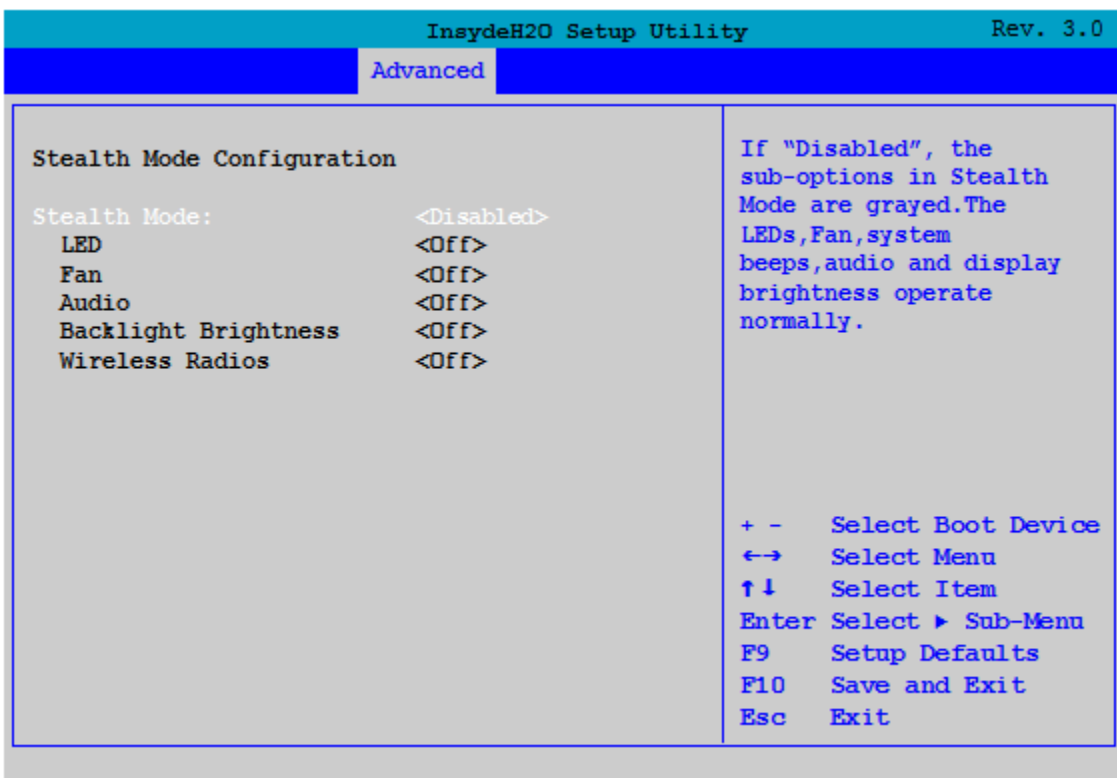
Field	Setting	Function
Stealth Mode	**Disabled** Enabled	Enable or disable stealth mode. If disabled, the computer functions normally and the options listed below are not accessible.
LED	**Off**	LEDs are disabled
	On	LEDs function normally
Fan	**Off**	The fan is disabled. Heat management is then controlled solely through throttling.
	On	The fan functions normally
Audio	**Off**	Volume is set to 0 across suspend/resume and boot. Use the existing audio function keys to restore volume.
	On	Audio is preserved across suspend/resume and boot. The default volume level is set to mid-

		range.
Back-light Brightness	**Off**	Brightness is set to 0 across suspend, resume and boot. **Fn+F1** restores brightness to the value it was set to before suspend. Additionally, **Fn+F7** increases display brightness gradually. **Fn+F6** decreases brightness gradually.
	On	Display brightness is preserved across suspend/resume and boot. It is restored to default when the brightness level is set at 0. The default level is mid-range.
Wireless Radios	**Off**	All wireless devices are set to off during a suspend/resume or boot. The radio on/off button can be used to manually turn the radios on or off.
	On	The radio on/off button functions normally and radio device power states are held though suspend/resume and boot.

I/O Device Configuration

This configuration option allows you to assign Serial and Parallel port settings.

```
                        InsydeH2O Setup Utility              Rev. 3.0
                   Advanced

  I/O Device Configuration                   Configure Serial port A
                                             Using options :
  Serial Port A:         <Enabled>           [Disable] No
    Base I/O Address     <3F8>               Configuration [Enable]
    Interrupt:           <IRQ4>              User Configuration
                                             [Auto EFI/OS chooses
  Serial Port B:         <Enabled>           configuration
    Base I/O Address     <2F8>
    Interrupt:           <IRQ3>

  Parallel Port:         <Enabled>


                                             + -    Select Boot Device
                                             ←→     Select Menu
                                             ↑↓     Select Item
                                             Enter  Select ► Sub-Menu
                                             F9     Setup Defaults
                                             F10    Save and Exit
                                             Esc    Exit
```

Field	Setting	Function

Serial Port A		**Enabled** Disabled	User can configure this serial port when set to enabled.
	Base I/O address:	2E8 2F8 3E8 **3F8**	Sets the base I/O address for this serial port.
	Interrupt:	IRQ3 **IRQ4**	Sets the interrupt request of this serial port.
Serial Port B		**Enabled** **Disabled**	User can configure this serial port when set to enabled..
	Base I/O address:	2E8 **2F8** 3E8 3F8	Sets the base I/O address for this serial port.
	Interrupt:	**IRQ3** **IRQ4**	Sets the interrupt request of this serial port.
Parallel Port:		**Enabled** Disabled	User can configure this parallel Port when set to enabled.

IDE Configuration
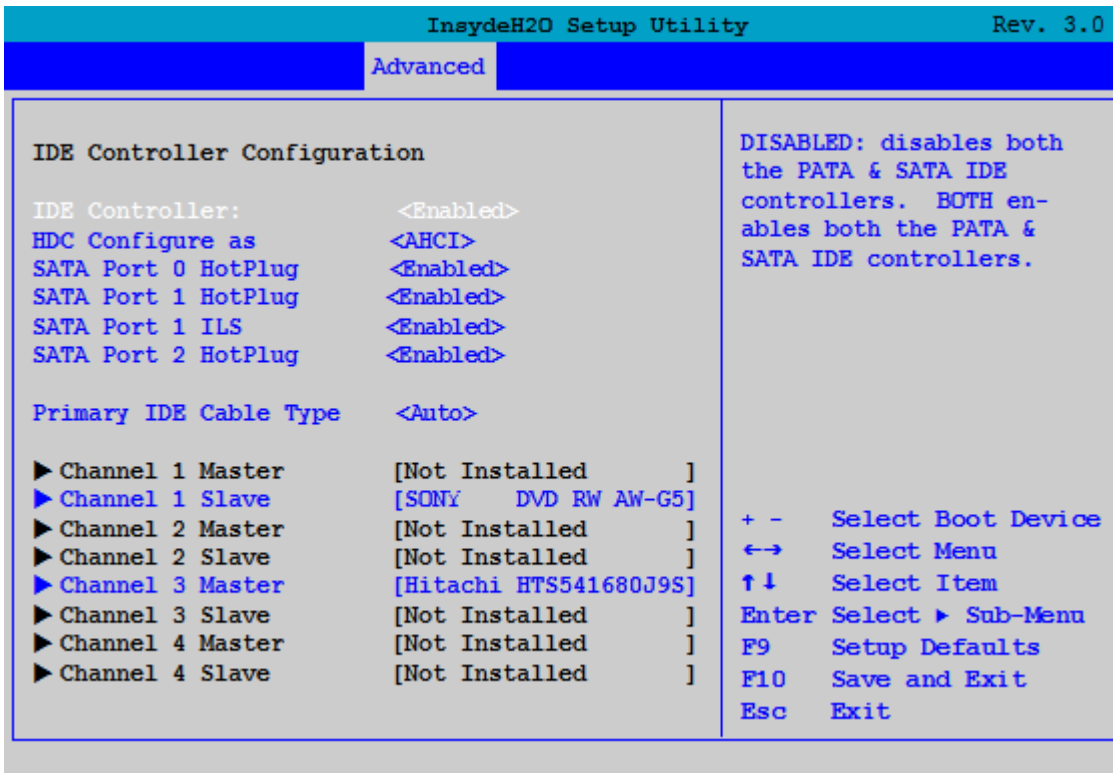
CAUTION Changes to the Primary Master setup may render the Hard Disk Drive unusable and result in data loss.

Field	Setting	Function

IDE Controller	**Enabled** Disabled	If enabled, both the PATA and SATA IDE Controllers are enabled. If disabled, both the PATA and SATA IDE controllers are disabled.
HDC Configure as	PATA Only SATA Only IDE Combined IDE Non-Combined **AHCI**	Sets the Harddisk Controller Configuration Type.
SATA Port 0 Hotplug	**Enabled** Disabled	If enabled, the SATA Port 0 Hotplug is enabled.
SATA Port 1 Hotplug	**Enabled** Disabled	If enabled, the SATA Port 1 Hotplug is enabled.
SATA Port 1 ILS	**Enabled** Disabled	If enabled, the SATA Port 1 InterLock Switch is enabled.
SATA Port 2 Hotplug	**Enabled** Disabled	If enabled, the SATA Port 2 Hotplug is enabled.
Primary IDE Cable Type	**Auto** 40 Pins 80 Pins	Determines the type of IDE Cable used.
Channel 1 Master	**Not Installed**	If a drive is installed, its manufacturer, drive type, and model are displayed. Pressing [Enter] displays additional drive and setting information: Type : <Auto/User Defined> If USER Defined is enabled, the following settings can be changed: 32Bit I/O <Enabled/Disabled> Block Mode: <Enabled/Disabled> Transfer Mode: <Enabled/Disabled> Security Mode:
Channel 1 Slave	**(Drive Model)**	
Channel 2 Master	**Not Installed**	
Channel 2 Slave	**Not Installed**	
Channel 3 Master	**(Drive Model)**	
Channel 3 Slave	**Not Installed**	
Channel 4 Master	**Not Installed**	
Channel 4 Slave	**Not Installed**	

The Security Menu

You can set, change or remove passwords in the Security menu.

```
                      InsydeH2O Setup Utility            Rev. 3.0
    Information    Main    Advanced    Security    Boot    Exit

   Supervisor Password :       Installed          Install or Change the
   User Password      :       Installed          password

   Set Supervisor Password
   Power on Password            <Disabled>
   User Access Level            <Full>
   Set User Password
   Clear User Password
   Set All Hdd Password
   S3 Resume Security           <Disabled>


                                                 + -     Select Boot Device
                                                 ←→     Select Menu
                                                 ↑↓     Select Item
                                                 Enter Select ▶ Sub-Menu
                                                 F9     Setup Defaults
                                                 F10    Save and Exit
                                                 Esc    Exit
```

Note: This is the Security screen as seen when both Supervisor and User passwords are installed.

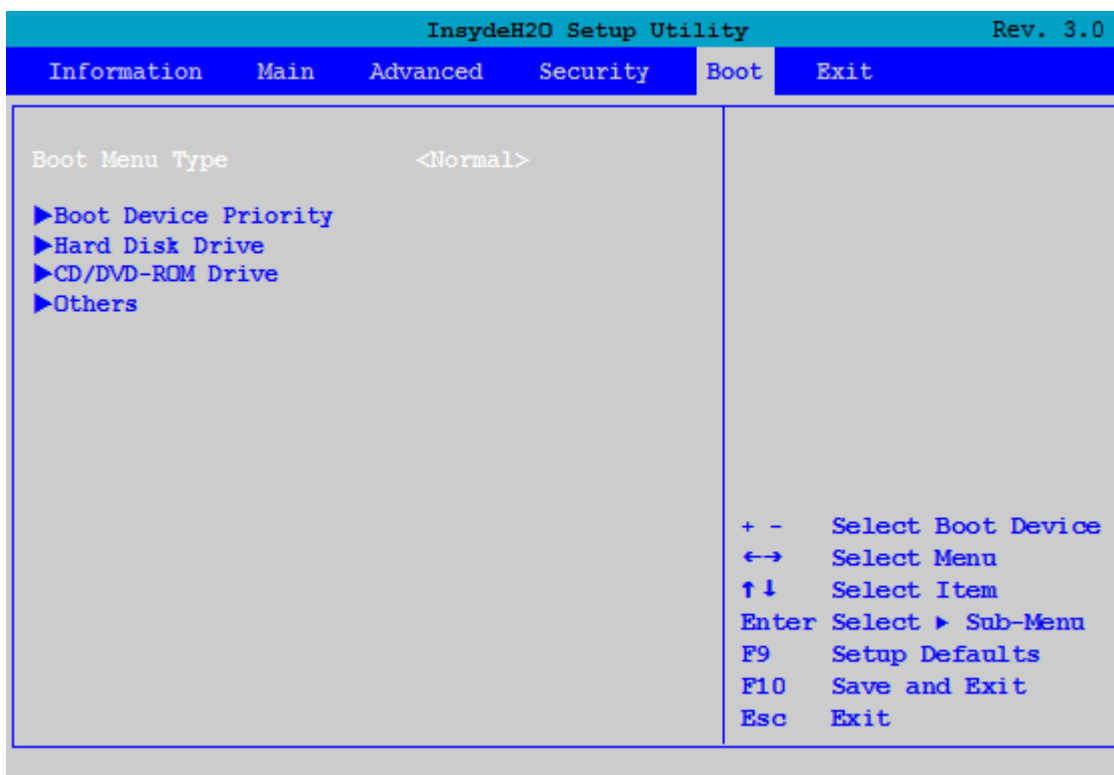| Field	Setting	Function
Set Supervisor Password	Enter New Password	Supervisor Password controls access to the Setup Utility
Power on password*	Enabled **Disabled**	If enabled, system will ask for password on post time. If disabled, system will ask for password when entering setup utility.
User Access Level*	View Only Limited **Full**	If View Only, no system changes may be made by the user. If Limited, some system changes may be made. If Full, the user may make any system changes except Supervisor Password.
Set User Password	Enter New Password	User Password controls access to the system
Clear User Password**	**Yes** No	Removes the User Password.
Set All Hdd Password	Enter New Password	Use the hard disk drive password to prevent unauthorized access to the hard disk
S3 Resume Security	Enabled **Disabled**	If enabled, Resume S3 will check the BIOS and Harddisk security

*   Not displayed if Supervisor Password not installed.

** Not displayed if User Password not installed.

The Boot Menu

Use this menu to set the order of priority for devices from which the system will boot. Your computer automatically detects the available devices. When you select a device, it is disabled in the other boot device fields.

To change the priority order, use the up and down arrow keys to highlight a device. Then press **F5** or **F6** to move the device higher or lower on the priority list.

```
            InsydeH2O Setup Utility                    Rev. 3.0
   Information    Main    Advanced    Security    Boot    Exit

   Boot Menu Type           <Normal>

   ▶Boot Device Priority
   ▶Hard Disk Drive
   ▶CD/DVD-ROM Drive
   ▶Others




                                  + -      Select Boot Device
                                  ←→       Select Menu
                                  ↑↓       Select Item
                                  Enter  Select ▶ Sub-Menu
                                  F9       Setup Defaults
                                  F10    Save and Exit
                                  Esc    Exit
```

Field	Function
Boot Menu Type	**Normal -- Displays the normal menu seen above.** Advance --Displays boot drive order by device name (see Boot Advance Menu below).
Boot Device Priority	Displays boot drive order. First listed drive is the primary boot drive. Use up and down arrow keys to highlight a drive device. User +/- keys to move the device up or down the list.
Hard Disk Drive	Displays manufacturer and serial number of hard drive
CD/DVD-ROM Drive	Displays manufacturer and serial number of CD/DVD-ROM drive
Others	Allows boot from other devices such as: • Network boot capability which allows boot up from a network drive.

	• Internal EFI (Extensible Firmware Interface) shell boot capability which allows boot up from an alternate firmware chip set.

Boot Advance Menu
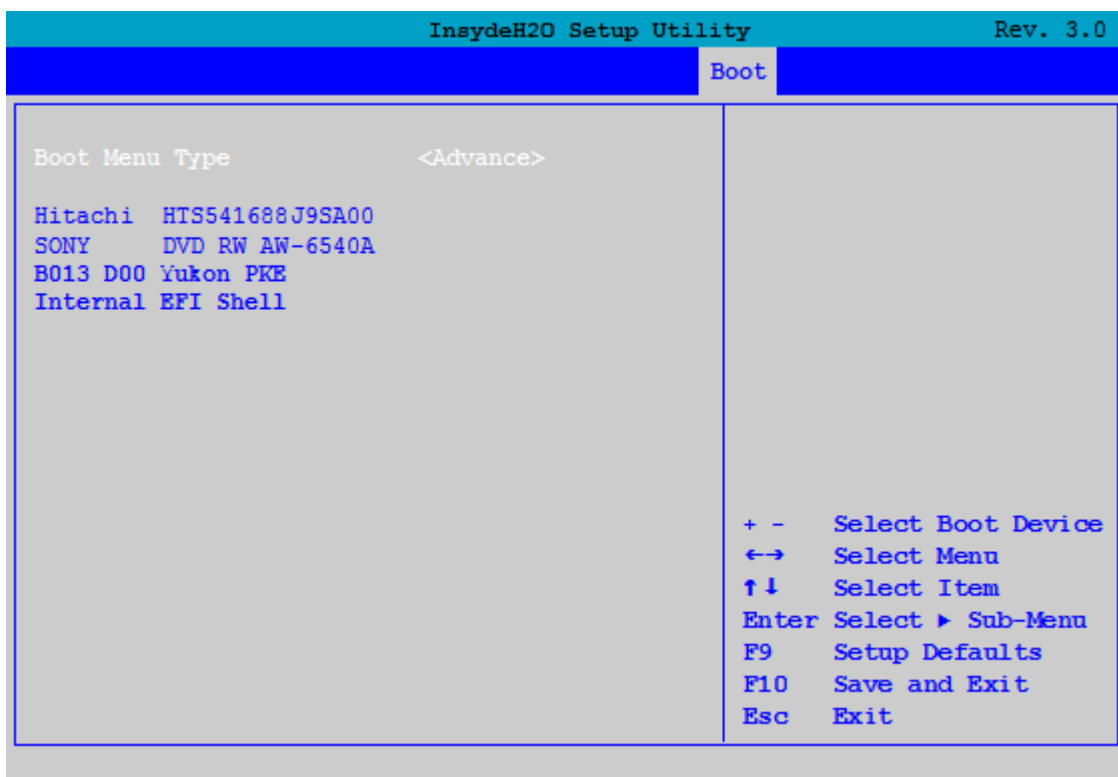
Field	Function
Boot Menu Type	Normal -- Displays the normal boot menu. **Advance** --Displays boot drive order by device name.
(Device Name)	First listed drive is the primary boot drive. Use up and down arrow keys to highlight a drive device. User +/- keys to move the device up or down the list.

The Exit Menu

```
                    InsydeH2O Setup Utility              Rev. 3.0
   Information    Main    Advanced    Security    Boot    Exit

   Exit Saving Changes                    Exit system setup and
   Exit Discarding Changes                save your changes
   Load Optimal Defaults
   Load Custom Defaults
   Save Custom Defaults
   Discard Changes




                                          + -     Select Boot Device
                                          ←→      Select Menu
                                          ↑↓      Select Item
                                          Enter Select ▶ Sub-Menu
                                          F9      Setup Defaults
                                          F10     Save and Exit
                                          Esc     Exit
```
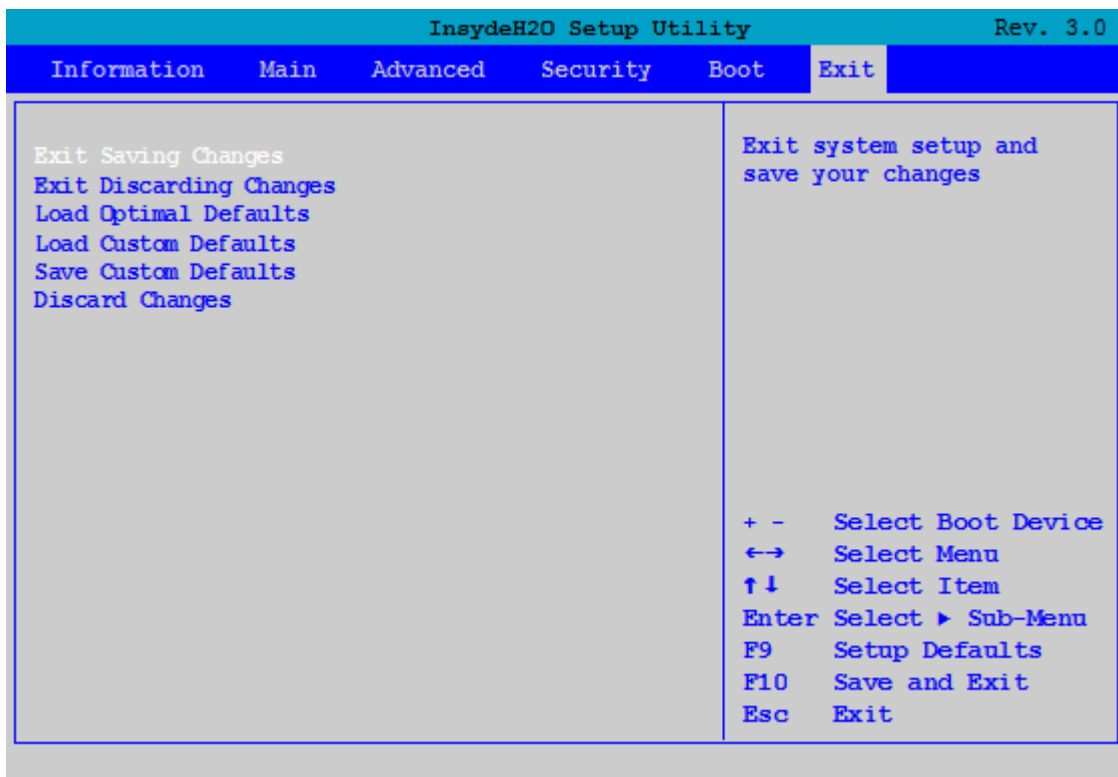
Field	Function
Exit Saving Changes	Exit the Setup Utility and save the changes to CMOS
Exit Discarding Changes	Exit the Setup Utility without saving Setup data to CMOS
Load Optimal Defaults	Load Optimal " factory" default values for all Setup options
Load Custom Defaults	Load custom made default values for all Setup options
Save Custom Defaults	Save Setup data to CMOS but do not exit the Setup Utility
Discard Changes	Load the previously set values from CMOS for all Setup options

Optional Equipment and Accessories

Your computer delivers superior power and performance. However, some users and the applications they use may demand more. This computer allows you to upgrade key components when you need increased performance.

NOTE Contact your authorized dealer if you decide to perform a key component upgrade.

Additionally, the GoBook VR-2 has several equipment and accessory options to further enhance your mobile computing experience. This section highlights some of the most popular accessories used with the GoBook VR-2. Click here for a complete list of optional peripherals and accessories.

CAUTION   When purchasing any additional accessories, purchase only those accessories that are approved for use with your computer. If you use items that are not approved for use with this computer, you may cause your computer to malfunction, or to emit or receive electromagnetic radiation in excess of local regulations. For non-proprietary accessories such as PC Cards or printers, ensure that the accessory functions properly with your computer before making the purchase.

Office Dock

The GoBook VR-2's Office Dock enables you to use it as a desktop computer. Once setup, the dock provides drop-in convenience with no cables to attach or detach from your GoBook VR-2. Simply place the computer in the dock and turn it on. The Office Dock allows you to continue to access all your computer's ports and bays. Additionally, it includes the following ports typical of a business-class desktop computer:

- Four USB 2.0 ports

- IEEE 1394 port (FireWire™)

- RJ-45 10/100/1000 Ethernet port

- S-Video port

- 9-pin legacy serial port

- 25-pin parallel port

- 15-pin external monitor/CRT port

- Two PS/2 ports so you can attach a mouse and a keyboard

- DC-in power port

- Mono microphone interface

- Stereo speaker interface

Once in the dock, the computer's battery is recharged and conditioned automatically whether the computer is active, suspended or even powered off.

Undocking the VR-2

The VR-2 must be undocked prior to removing it from the Office or Vehicle Dock.

To undock your VR-2:

1. Click on **Start** to display the Start Menu. (At the bottom of the Start Menu next to the **Log Off** and **Shutdown** commands will be the **Undock Computer** command.)

2. Click on **Undock Computer**

3. Wait for the system to display "*Windows has finished undocking the system. If you need to remove the system from the Docking Station, please do so now*."

4. Open the Start Menu once more and make sure the **Undock Computer** menu item is no longer displayed before pressing the release button on the Docking Station.

Vehicle Dock

The optional vehicle dock enables you to use and recharge your GoBook VR-2 quickly and efficiently in the your vehicle. Once setup, it provides drop-in convenience with no cables to attach or detach to your GoBook VR-2 when you enter or leave your vehicle. Simply place the computer in the dock and turn it on. Once attached to the Vehicle Dock, the computer's battery is recharged and conditioned automatically wether the computer is active, suspended or even powered off.

Vehicle Dock features:

- Compliance with extensive vehicle environment requirements (including crash test)

- Key lock to help prevent theft

- Four USB 2.0 ports (two in front and two in back)

- IEEE 1394 port (FireWire™)

- Two 9-pin legacy serial ports

- 25-pin parallel port

- 15-pin external monitor/CRT port

- Two PS/2 ports

- DC-in power port

- Ethernet (LAN) port

- Remote power switch feature that is identical in function to the main power button

- Mono microphone interface

- Stereo speaker interface

- Two external antenna SMA connectors for WWAN and WLAN

NOTE Be sure to follow the undocking procedure at the end of the Office Dock section

Surge Protection

A large number of computer and high technology equipment damage is directly related to AC power and telephone line problems. These problems can include surges, spikes, noise, interference, and weather-related problems, which in turn can cause glitches, hang-ups, crashes, performance slow downs, and down time with computer equipment. The market is flooded with hundreds of AC power line surge suppressors advertising high performance surge protection; only a few of them actually provide adequate protection.

This section provides guidelines for selecting a quality surge suppressor to be used with your GoBook VR-2, and it helps identify a few sources for products with acceptable performance.

Selecting the Right Surge Protection

Consider the level of quality you need when selecting a surge suppressor. This depends on factors such as surge environment, the type of equipment to be protected, and the quality of the electrical wiring and service.

Surge Environment

Surge environment refers to the damage potential from electrical surges in a particular geographical area. A high quality suppressor should be used if there is frequent lightning activity in the area and the location service is fed by overhead utility poles.

Type of Equipment to be Protected

If the computer is equipped with a modem, the modem should also be surge protected. Protecting the power line without protecting the modem line provides only partial protection.

Quality of Electrical Wiring and Service

Wiring should be up to current local standards and have verified good AC grounds. It is important that your computer system be plugged into a grounded AC outlet when charging and that all peripherals connected to your system reference the same AC ground.

Selecting the Right Equipment

There are a number of companies that sell quality surge suppressors. When looking for a surge suppressor, consider these things.

- Expect to pay more for a good quality surge suppressor

- The surge suppressor should be a UL 1449, 497, and 1283 listed for surge suppression, modem surge protection, and RFI/EMI noise filtering respectively

- The surge suppressor should have diagnostic LEDs that verify good AC ground, proper wiring, and proper surge operation. On/off switches that light are not recommended since they can produce electrical noise

- The Joule ratings should be a minimum of 480 Joules for the AC surge circuit

- The Joule ratings should be a minimum of 240 Joules for the modem

- The modem surge circuit should present low capacitance to the modem line or it will slow the transmission rate. Capacitance should be specified at less than 50 picofarads

- Quality surge suppressor manufacturers generally offer a lifetime warranty

- Consider obtaining a protected equipment coverage policy which insures the equipment in the event of surge damage

- The devices that will be attached to the computer also need to be surge protected

Memory Upgrade

Adding memory allows the computer to operate faster, handle more tasks simultaneously, and work more smoothly with large files. Users who increase memory demands - by adding additional programs, for example - may notice a slowdown in operating speed, and wish to increase memory. The GoBook VR-2 comes with one user accessible memory socket supporting a 512MB to 1024MB memory module for memory upgrades. Please consult your dealer if you need to add more memory.

CAUTION First read and follow the guidelines in the Safety section.

Replacing a Memory Card

CAUTION Memory modules can be easily damaged by static electricity. Leave the module inside its static-proof bag until it is ready for installation and make sure you are grounded before attempting this procedure.

Removing a Memory Card

1. Turn off the computer and disconnect the AC adapter.

2. Turn the computer upside down and lay it on a flat surface.

3. Remove the battery (see Battery Removal).

4. Carefully remove the two RAM compartment cover screws and remove the RAM compartment cover (1).

5. If a memory card is inserted, use your finger to gently pull the tabbed latches in the direction of the arrows (2). The card will pop up slightly.
    CAUTION Do not use tools to pull the memory card latches. Tools may cause damage.

6. Pull upwards on the card and then slide the card out (3).

Inserting a Memory Card

CAUTION Only use memory cards approved for use in your computer. Failure to do so may void your warranty.

1. Hold the memory card by its edges with the edge-connector side towards the slot.
    CAUTION Do not touch the memory card anywhere except the edges.

2. Hold the card at a shallow angle (about 25 degrees) and insert the edge connector into the connector slot. The

"gold teeth" of the edge connector should no longer be visible when the card is fully inserted. (See image 3 above).

3. Press the card downwards so that it is flat inside the compartment. You may hear an audible click as the latches of the connector lock the card in place.

4. Replace the RAM compartment cover and secure it with the two screws.
   CAUTION If the cover does not close easily, do not force it. The memory card may not be properly installed. Carefully remove and reinstall the card following the steps above.

Your notebook computer will automatically detect the change in RAM capacity when it restarts. You can verify RAM capacity has changed in the Setup Utility or in Windows:

1. **Setup:** Press **F2** during boot-up when you see the "Press F2 to enter Setup" prompt. The information menu shows the base memory and the extended memory.

2. **Windows:** Right click on my computer and select properties to open **System Properties**. The **General** tab lists the memory detected by Windows.

Miscellaneous options

Battery pack

It is a good practice to have a spare battery around, especially when you travel. The Li-ion battery, coupled with the power management features of your computer, supplies you with more power on-the-go. You may also purchase a secondary 9 cell battery pack for longer run time.

AC adapter

The compact AC adapter charges your battery pack and supplies power to your computer. You can order a spare AC adapter so you do not need to carry it from the office to your home or destination.

Vehicle adapter

The vehicle adapter supplies power from the vehicle battery to your computer. It attaches to your computer's DC power port and typically plugs into the cigarette lighter socket in your vehicle.

Other Options and Accessories

Click here for a complete list of optional peripherals and accessories.

Maintenance and Storage

Follow the guidelines in this section to care for your computer.

Computer Maintenance and Storage

You can use your computer under a wide range of environmental conditions. However, to ensure long use and continued high performance, consider the following factors when using your computer:

Taking Care of Your Computer

- Follow all warnings and instructions noted in this documentation and in the Windows Help program

- The first time you use your computer, we recommend that you carefully read the Making Connections section and initialize the battery to ensure optimum battery performance

- Unplug the computer from the power outlet before cleaning. Use a damp cloth for cleaning. Do not use aerosols, solvents, or strong detergents

- Slots and openings in the unit's case are for ventilation purposes. Do not block or cover these openings or the system could overheat. Do not use or store the computer near a source of heat or dust

- If you use the computer with an extension cord, ensure that the total ampere ratings of all the devices sharing the extension do not exceed the rating of the extension cord or the rating of the wall outlet

- Never push foreign objects into the computer through any of the slots or openings. Dangerous voltages are present, which could cause electric shock or fire, or damage sensitive components

- For best results, use a power strip with a built-in surge protector. Do not use inferior extension cords as this may result in damage to your computer

- Set the computer on a flat, stable surface. To prevent damage to the computer's hard disk drive, avoid using the computer where it will be exposed to strong vibration

- Do not place it near sources of heat, such as a radiator

- Do not expose the computer to temperatures below -20ºC (-4ºF) or above 60ºC (140ºF)

- Do not subject the computer to magnetic fields

- Do not expose the computer to rain or moisture

- Do not spill liquid on the computer

- Do not subject the computer to heavy shock and vibration

- Do not expose the computer to dust and dirt

- Do not place objects on top of the computer

- Do not place the computer on uneven surfaces

- Periodically inspect the computer and accessories for wear, damage, loose or missing parts. Identifying and correcting potential problems early can help reduce the need to return the unit for service

Taking care of your AC adapter

- Do not connect the adapter to any other device

- Do not step on the power cord or place anything on top of it. Carefully route the power cord and any cables away from all potential traffic

- When unplugging the power cord, do not pull on the cord itself but pull on the plug

- The total ampere ratings of the equipment plugged in should not exceed the ampere rating of the cord if you are using an extension cord. Also, the total current rating of all equipment plugged into a single wall outlet should not exceed the fuse rating

Servicing

Contact your dealer or see your service technician if any of the following occurs:

- The computer has been dropped or the body has been damaged

- Liquid has been spilled into the product

- The computer does not operate normally

See the Service and Support section for more information.

Battery Maintenance and Storage

Taking care of your battery pack

- Use only batteries of the same kind as replacements. Turn the power off before removing or replacing batteries

- Do not tamper with batteries. Keep them away from children

- Dispose of used batteries according to local regulations. Recycle if at all possible

Maintaining Batteries

Follow these guidelines to maintain performance of Lithium-Ion (Li-on) batteries.

- Avoid exposing batteries to extremely hot or cold temperatures for long periods. To prevent possible damage to the battery, the GoBook VR-2 does not allow the battery to charge if the internal temperature of the battery gets too low (< 5°C or < 41°F) or too high (> 50°C or > 122°F)

- Charge the battery nightly where the temperature will remain around 20°C (68°F)

- Re-calibrate your battery every three months or when your battery performance degrades

Storing Batteries

- Before storing, discharge the battery to 50%

- Store the battery as close to close to 10°C (50F°) as possible

- It is recommended that you cycle a stored battery once every three months

- Unused or stored batteries can lose power over time. When you install a battery that has not been used for awhile, connect external power to the computer and charge the battery

- After storage, battery calibration may increase its capacity

Cleaning Your Computer

Outside Case   Like all tools, the outside of the computer will get dirty with use. To clean the outside case, follow the procedure below.

Disconnect external power and turn off the computer.

Add a small amount of water to a soft cloth and clean the computer case. Do not use paper products because they can scratch the surface.

Wipe off any excess liquid with a soft cloth.

Display   Periodically inspect the display to make sure the brightness function is operating properly and that all pixels are operational. To clean the display assembly, use a soft, dry cloth. In some cases, you can use a small amount of water to remove streaks or smears. Do not use paper products because they can scratch the screen.

External Power Connector   The external power connector may sometimes be exposed to moisture and/or contamination causing an unreliable connection to the external power source.

Clean the connector with a cotton swab dipped in isopropyl alcohol.

RJ-11/ RJ-45 / USB Connectors   If the connector pins get dirty, clean the connector with a cotton swab dipped in isopropyl alcohol.

Troubleshooting

This section is designed to help you determine and fix problems you might encounter while operating the GoBook VR-2. Try the following things in order:

1. First look through the categories in this section for a solution.

2. If you are having a problem with a computer application , use the Help that comes with the application to find a solution.

3. If you still cannot resolve your problem, refer to Service and Support.

WARNING Do not attempt to open and service the computer by yourself. Contact your dealer or an authorized service center for assistance.

Application Troubleshooting

My application locks up, acts strangely, or produces a General Protection Fault (GPF) error or blue screen

- Press **CTRL**+**ALT**+**DEL** to start the Logon Protector, select the Task Manager. Click the Applications tab on the Task Manager and look for the application that is having problems. If the application is hung, the Status column will say "Not Responding" after the task name. Click on the task/application, then click the **End Task** button.

- If you have tried to resolve the problem and your application still does not respond, you may need to restart your computer.

   To restart your computer, select **Start, Shut Down, Restart**. If that does not work, try pressing **CTRL**+**ALT**+**DEL** twice.

   If the computer does not restart, the keyboard may be locked up. Hold the **Power Button** for ten seconds or use the reset on the bottom of the unit.

   CAUTION This will result in a loss of all unsaved data.

- The data on the hard disk could be corrupted. Run SCANDISK.

- Windows may be out of memory or resources. Exit Windows and restart Windows by selecting **Start, Shut Down, Restart**.

Battery Troubleshooting

The battery does not charge

The batteries take much longer than seven hours to charge

The batteries don't last very long

The gas gauge isn't full after charging the battery

The gas gauge reads "full," but the indicator light is still blinking

My battery seems to have less and less capacity

Display Troubleshooting

The display performance is slow

I can't read the display

The underlined, inverse, and hypertext characters are difficult to read on the screen

I changed my display resolution, but I see no difference on the screen

My screen seems to time out too quickly. I have to constantly hit a key or move the mouse in order to bring it back. How can I adjust the screen time-out?

Hard Disk Troubleshooting

The hard disk will not spin up so the computer can't boot up

Keyboard and Mouse Troubleshooting

Something unexpected happens when I press a key

Incorrect characters appear on the screen when I press certain keys

I have difficulty double-clicking the mouse fast enough

Modem Troubleshooting

The modem doesn't work

The modem doesn't dial a number

The modem dials and receives an answer but does not establish a connection

Miscellaneous Troubleshooting

The computer shuts off unexpectedly

The speaker volume is too high or too low

The computer won't turn on

The computer will not come on when the power button is pressed but the power, external power and battery indicators flash in sequence.

The computer won't turn off

The computer enters suspend mode too quickly

The computer doesn't automatically suspend

The system date and time are incorrect

I receive an "out of memory" error message

PC Card Troubleshooting

I can't remove the PC card

Diskette Read Error

The system does not recognize the PC Card CD-ROM when it is inserted into the PC Card socket

The computer locks up when I remove the PC card

FAQs

I've heard that cleaning up and rearranging files on the hard drive will improve the startup speed of my programs. How do I do this?

How do I adjust the volume?

How do I change the battery?

How long will the battery last?

How do I change the display brightness?

How do I clean the display?

How do I calibrate the touch screen?

Service and Support

We are committed to providing you world class support services that ensure the lowest total cost of ownership for your hardware investment. The icareServices program will help you maximize end user productivity and decrease overall system operating cost.

Client Care Center (CCC)

General Dynamics Itronix Corporation Client Care Center – The CCC is an internal central point for telephone warranty support for all GD-Itronix products. Our Technical Service Representatives know your product and provide input and support for problem resolution.

One call to the convenient Client Care Center number (800-638-9270, Opt 2) <<1-800 numbers ARE NOT accessible from Mexico!! allows a single entry point of access to meet all your needs. You may also use the new web portal at www.GD-Itronix.com/CCC. The CCC receives calls from 5am-5pm Pacific Daylight Time, Monday through Friday (except on holidays).

Technical Service Representatives provide the following support services:

- Product troubleshooting

- RMA origination for service return

- RMA status check on product service

- Check status Warranty/Service Kit orders

- Coordinate requests for product upgrades

- Wireless Radio registration

- icareServeNet registration and training

GD-Itronix offers service uplift programs for clients who wish to expand their support coverage beyond the basic warranty. Coverage and details of these programs are available on line at www.gd-itronix.com

Product Support - Downloads

It is easy to get the software updates you need to keep your configuration current and get the most from your product. Click here to get current downloads.

NOTE Downloads are listed by model (GoBook VR-2) and product number (IX605).

Documentation Feedback

We strive to create accurate, convenient and highly useful product documentation for all our products. With this in mind, we'd like to hear from you and encourage your feedback. If you have comments or suggestions about our online Help or other product documentation, click here to send us an email.

Please include the following information when submitting feedback:

- Product name

- Place and date of purchase

- Name of online Help or other document

- Topic title (for online Help) or page number

- Localized document language (such as English, French, German, Spanish)

- Type of feedback (for example, need for clarification, grammatical errors, incorrect information)

- Your suggestion for how to improve the document

Identification

GoBook VR-2 (IX605)

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Itronix is a registered trademark of GD-Itronix Corporation.
GoBook is a registered trademark of GD-Itronix Corporation
Microsoft, MS Windows, and MS-DOS are registered trademarks of Microsoft Corporation.
IBM is a trademark of International Business Machines Corporation.

The following United States Patent Numbers apply to any unit which incorporates a DVD drive - 5,434,678; 5,589,945; 5,913,013; 6,151,444; and 6,208,805.

Compliance Statements

Federal Communication Commission Interference Statement

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

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.

IMPORTANT NOTE

FCC Radiation Exposure Statement

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator and your body.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

Local Restriction of 802.11a/b/g/n Radio Usage

CAUTION Due to the fact that the frequencies used by 802.11a/b/g/n wireless LAN devices may not yet be harmonized in all countries, 802.11a/b/g/n products are designed for use only in specific countries, and are not allowed to be operated in countries other than those of designated use. As a user of these products, you are responsible for ensuring that the products are used only in the countries for which they were intended and for verifying that they are configured with the correct selection of frequency and channel for the country of use. Any deviation from permissible settings and restrictions in the country of use could be an infringement of national law and may be punished as such.

FCC Radio Frequency Interference Requirements

This device is restricted to indoor use due to its operation in the 5.15 to 5.25 GHz frequency range. FCC requires this product to be used indoors for the frequency range 5.15 to 5.25 GHz to reduce the potential for harmful interference to co-channel Mobile Satellite systems. High power radars are allocated as primary users of the 5.25 to 5.35 GHz and 5.65 to 5.85 GHz bands. These radar stations can cause interference with and /or damage this device.

REN

The GoBook VR-2 (IX605) computer complies with Part 68 of the FCC Rules. On the bottom of this equipment is a label that contains, among other information, the FCC registration number and ringer equivalence number (REN) for this equipment. If requested, this information must be provided to the telephone company.

The REN is used to determine the quantity of devices which may be connected to the telephone line. Excessive RENs on the telephone line may result in the devices not ringing in response to an incoming call. In most, but not all areas, the sum of the RENs should not exceed five (5.0). To be certain of the number of devices that may be connected to the line, as determined by the total RENs, contact the telephone company to determine the maximum REN for the calling area.

The GoBook VR-2 (IX605) computer may be connected to the telephone network using the RJ-11 jack provided.

If this equipment causes harm to the telephone network, the telephone company will notify you in advance that temporary discontinuance of service may be required. If advance notice isn't practical, the telephone company will notify the customer as soon as possible. Also, you will be advised of your right to file a complaint with the FCC if you believe it is necessary.

The telephone company may make changes in its facilities, equipment, operations, or procedures that could affect the operation of the equipment. If this happens, the telephone company will provide advance notice in order for you to make the necessary modifications in order to maintain uninterrupted service.

If trouble is experienced with this equipment, please contact the equipment manufacturer for repair and/or warranty information. Do not attempt repairs of this equipment yourself without obtaining manufacturer authorized parts and documentation. If the trouble is causing harm to the telephone network, the telephone company may request you remove the equipment from the network until the problem is resolved.

Compliance Statement for Canada

NOTICE The Industry Canada label identifies certified equipment. This certification means that the equipment meets certain telecommunications network protective, operational and safety requirements as prescribed in the appropriate Terminal Equipment Technical Requirements document(s). The Department does not guarantee the equipment will operate to the user's satisfaction.

Before installing this equipment, users should ensure that it is permissible to be connected to the facilities of the local telecommunications company. The equipment must also be installed using an acceptable method of connection. The customer should be aware that compliance with the above conditions may not prevent degradation of service in some situations.

Repairs to certified equipment should be made by a representative designated by the supplier. Any repairs or alterations made by the user to this equipment, or equipment malfunctions, may give the telecommunications company cause to request the user to disconnect the equipment.

Users should ensure for their own protection that the electrical ground connections of the power utility , telephone lines, and internal metallic water pipe system, if present, are connected together. This precaution may be particularly important in rural areas.

CAUTION! Users should not attempt to make such connections themselves, but should contact the appropriate electric inspection authority, or electrician, as appropriate.

The Ringer Equivalence Numbers (REN) are:

GoBook VR-2 (IX605) non-radio: 0.5B

NOTICE The Ringer Equivalence Number (REN) assigned to each terminal device provides an indication of the maximum number of terminals allowed to be connected to a telephone interface. The termination on an interface may consist of any combination of devices subject only to the requirement that the sum of the Ringer Equivalence Numbers of all the devices does not exceed 5.

The GoBook VR-2 (IX605) computer may be connected to the telephone network using the RJ-11 jack provided.

Fax Branding

The Telephone Consumer Protection Act of 1991 makes it unlawful for any person to use a computer or other electronic device to send any message via a telephone fax machine unless such message clearly contains in a margin at the top or bottom of each transmitted page or on the first page of the transmission, the date and time it is sent and an identification of the business or other entity, or other individual sending the message and the telephone number of the sending machine or such business, other entity, or individual.

In order to program this information into your fax machine, you should complete the following:

This information is entered through the FAX application software you have installed. Consult your FAX software documentation for instructions about entering this information.

Warnings and Cautions

WARNING It is important that only authorized GD-Itronix personnel attempt repairs on GD-Itronix equipment as this might void any maintenance contract with your company. Unauthorized service personnel might be subject to shock hazard on some GD-Itronix equipment if removal of protective covers is attempted.

The product you have purchased is powered by a rechargeable battery. The battery is recyclable and, under various state and local laws, it may be illegal to dispose of this battery into the municipal waste stream. Do not crush the battery or place it in a fire. Check with your local solid-waste officials for details on recycling options or proper disposal.

CAUTION Internal components of the GoBook VR-2 (IX605) computer will be damaged if exposed to contaminants. When dust covers, the PC card door, or the bottom access panel are open on the computer, shield the unit from all contaminants such as liquids, rain, snow, and dust.

Internal radio(s) may have an individual FCC Identifier which are not applicable to this configuration. Only the FCC ID shown on the label located on the bottom of the IX605 Laptop PC is applicable. The IX605 computer must not be co-located or operating in conjunction with any other antenna or transmitter than specified in the filing .

This device may contain a WLAN radio transmitter , a WAN radio transmitter and a PAN radio transmitter. To comply with FCC RF exposure requirements when using the WAN radio transmitter, a minimum separation distance of 20 cm must be maintained between the between the center of the display screen and all users/bystanders. When using the WLAN transmitter, a minimum separation distance of 20 cm must be maintained between the upper right and left edges of the display screen and all users/bystanders. When using the Pan transmitter, a minimum separation distance of 20 cm must be maintained between the lower left edges of the Keyboard and all users/bystanders. The WAN radio and WLAN/PAN transmitter should be turned off before carrying the Laptop PC order to comply with FCC RF exposure requirements.

"The equipment has been approved to [Commission Decision "CTR21"] for pan-European single terminal connection to the Public Switched Telephone Network (PSTN). However, due to differences between individual PSTNs provided in different countries the approval does not, of itself, give an unconditional assurance of successful operation on every PSTN network termination point.

In the event of problems, you should contact your equipment supplier in the first instance.

This product is intended to be supplied by a Listed Power Unit and output rated 19 V dc, 3.42 A.

CAUTION Always disconnect all telephone lines from the wall outlet before servicing or disassembling this equipment.

CAUTION To reduce the risk of fire use only a No. 26 AWG or larger telecommunication line cord.

Safety Information

Enclosed with each IX605 Laptop computer is the radio specific safety information. Do not proceed without reviewing the information provided in that document.

Do not proceed beyond a **WARNING** or **CAUTION** until the indicated conditions are fully understood and met.