

**Portable USB** 

# CD-RW/DVD-ROM Drive

**Owner's Manual** 

To enjoy fully all the features and functions of your product, please read this owner's manual carefully and completely.









GCC-5241P

CAUTION: The laser used in the CD-RW/DVD-ROM drive can damage your eyes.

Do not attempt to open the cover.

To reduce the risk of electric shock, do not remove cover (or back).

No user-serviceable parts inside.

Refer servicing to qualified service personnel.

Use of controls or performance of procedures other than those specified herein may result in hazardous radiation exposure.

WARNING: To reduce the risk of fire or electric shock, do not expose this appliance to

rain or moisture

The power source voltage of the AC adapter is listed on the nameplate.

Plug the AC adapter only into an outlet with proper voltage.

#### **Industry Canada requirement**

This class B digital apparatus meets all requirements of the Canadian Interference-Causing Equipment Regulations.

Cet appareil numérique de la classe B respecte toutes les exigences du Règlement sur le matériel brouilleur du Canada.

#### FCC COMPLIANCE STATEMENT

**Note**: 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 or more 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 Authorized Service Center for help.
- FCC WARNING

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

 This CD-RW/DVD-ROM Drive is for use only with UL listed personal computers that have installation instructions detailing user-installation of card cage accessory. This product is manufactured to comply with the radio interference requirements of EEC DIRECTIVE 89/336/EEC, 93/68/EEC and 73/23/EEC.

CAUTION - INVISIBLE LASER RADIATION WHEN OPEN AVOID EXPOSURE TO BEAM.

CLASS 1 LASER PRODUCT
KLASSE 1 LASER PRODUKT
LUOKAN 1 LASER LAITE
KLASS 1 LASER APPARAT

This unit uses the following disc types with the marks:

This unit uses CD-ROM discs with the following mark.

When you use this unit as a CD player, use compact discs with the following mark.

This unit uses CD-R discs with the following mark.

This unit uses CD-RW discs with the following mark.

This unit uses High Speed CD-RW discs with the following mark

**WARNING:** Only Drives bearing the logo "Compact Disc ReWritable High Speed" can write or erase High Speed CD-RW media.

High Speed CD-RW media may be recognized by the same "Compact Disc ReWritable High Speed" logo on the disc label or packaging material, or by the fact that it lists recording speeds of "4X to 10X, or "Up to 10X".

Attempted writes to High Speed CD-RW Media using CD-RW Drives not bearing the logo "Compact Disc ReWritable High Speed" may result in data loss.





Features2
System requirements
Package items
Important precautions
Location and function of controls
Installation
Hardware Installation
Software Installation for device driver
Removing the USB converter cable
Operation
Loading and ejecting a disc8
Playing a music CD
Playing DVD video and MPEG2 movie video
Appendix
Troubleshooting
Specifications

- Microsoft<sup>®</sup> and Windows<sup>®</sup> are trademarks registered in the United States and other countries by the Microsoft Corporation.
- The company names and product names written in this manual are trademarks or registered trademarks of the respective companies.



Thank you for purchasing the Portable CD-RW/DVD-ROM drive. Connecting this drive to your computer will allow you to write and read data to/from a CD-R, CD-RW disc, and read data from other discs, such as DVD-ROM, CD-ROM, etc.

## **Features**

- Portable Slim CD-RW/DVD-ROM drive with Universal Serial Bus (USB)
   2.0 interface
- · Hot Plug and Play compatible
- 24X Writing(CD-R), 10X Rewriting(CD-RW), 24X Reading(CD-ROM) and 8X Reading(DVD-ROM)
- · Operates on the AC adapter
- Buffer Under Run error protection technology
- · Emergency eject support
- Top loading system with power eject

# **System requirements**

Make sure that your computer meets the requirements for connection of the drive. You will need the following to operate this drive:

- IBM-compatible PC, Pentium 350MHz or higher
- Operating Systems : Microsoft Windows 98 Second Edition (Windows 98 SE)

Windows 2000

Windows Millennium Edition (Windows Me)

Windows XP

- 64 Mbytes of RAM or more
- Installation requires 1GBytes of free hard disk drive space
- Computer with available USB port
- 3.5" floppy disk drive (Used for installing driver software with Windows 98 SE)

# Caution

System meeting the following requirements is needed in order to use USB 2.0 operation with this drive.

Computer that is equipped with a USB 2.0 – compliant USB connector or PCI adapter card, and on which the USB 2.0 EHCI (Enhanced Host Controller Interface) driver software 1) has been installed.

1) The USB 2.0 EHCl driver software is supplied with currently available PCl adapter cards that conform to USB 2.0. Further, Microsoft has released the USB 2.0 EHCl driver software for Windows XP, therefore it is also possible to use this driver software with Windows XP. If you want to know in detail, please contact your USB 2.0 adapter dealer or consult your PC manufacturer, or consult the Microsoft Corporation Web site.

# Package items

Make sure that you have all of the following components and accessories in the package:

Item	Quantity
A. CD-RW/DVD-ROM drive	1
B. USB2.0 converter cable	1
C. AC Power Adapter	1
D. Writing Software (Nero Express)	1
E. DVD Player Software (Power DVD)	1
F. Support software (FD)	1
G. Quick Start Guide for Writing software	1
H. Software Quick Start manual	1
I. Manual for drive (This manual)	1

# Important precautions

Follow these precautions when handling the drive or discs.

#### **Precautions**

Please take notice that the manufacturer of this equipment does not offer any warranty against data loss due to inappropriate installation or handling or direct or indirect damages. Please take notice that the manufacturer will bear no responsibility for direct or indirect damages caused by the use of this product or its malfunction. Please take notice that the manufacturer will bear no responsibility for damage to data caused by this product. Please backup(copy) all important data as protection against data loss.

#### Installation

Avoid placing the drive in a location subject to:

- high humidity high temperature excessive dust
- mechanical vibration direct sunlight

#### Operation

Don't move the drive suddenly from a cold place to warm one.

Condensation may occur, causing abnormal operation.

Make sure to remove the disc before moving the drive. The disc may be damaged, causing data loss.

Be careful to prevent foreign objects, such as liquids or metal, from entering the drive. In case a foreign object enters the drive, please consult the dealer where the drive was purchased

Don't interrupt the electric power while the drive is operating.

While drive is operating, don't move the drive with disc, or don't give a shock to the drive, since it becomes the cause which damages disc.

#### **AC Adapter**

Don't plug in or remove the AC adapter using wet hands.

Don't damage the AC adapter by scratching, modifying, or bending its prongs. Use only supplied AC adapter.

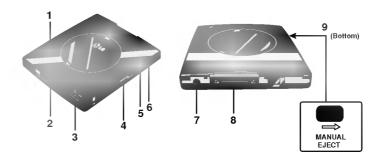
Don't disassemble the AC adapter.

#### The guarantee of operation of the connection via USB hub is not offered.

When connecting with USB1.1 interface, picture and sound may be disrupted while watching DVD Video. For smoother playback of DVDs, it is necessary to connect the drive to a high-speed USB 2.0 connector. When connecting with USB1.1 interface CD writing speed becomes about 4x and reading speed become about 6X max due to the limitation of the interface.

# Location and function of controls

This drive should be used only in its current hardware and software configuration.



- 1. Top Cover
- 2. **Power Busy Indicator** The indicator lights a steady green when the power to the drive is on, and the Indicator blinks when the disc is being set, or when the drive is accessing data.
- 3. **Eject Button** Press this button to open the top cover. The button works only when power is applied to the drive. (The AC adapter must be plugged in.)
- 4. Power Switch Use this switch to turn the drive on and off.
- 5. **Headphone Volume Control** Adjusts your headphone sound level.
- 6. Headphone Jack This jack is used for analog audio playback only.
- 7. **DC In Jack** Connect the AC Adapter cable.
- 8. **Interface Connector** This Interface connector is used to connect to the USB 2.0 converter cable.
- 9. **Manual Eject Lever (Bottom side)** When the power supply of the drive is off, push this lever in the direction of the arrow to open the top cover.



# **Hardware Installation**

#### Connecting to computer



Make sure you have a personal computer with an available USB port before connecting the drive to your personal computer.

Please refer to the Software Quick Start manual for the method of setup, and the procedure of connection.

Connect the drive to the computer as shown in figure to the left.

- Power for all devices should be turned off before attaching the cables.
   Connect the USB converter cable into the interface connector at the rear of the portable CD-RW/DVD-ROM drive.
- 2. Insert the USB converter cable into the PC's USB port firmly.
- Connect the AC adapter plug to the DC IN jack at the rear of the drive.
   Attach the AC adapter to the AC outlet.



- Discharge static electricity:
  - Static electricity could destroy this drive or components in a computer. Therefore, before installing the drive, touch a metal object to discharge any static electricity that may have charged your body or clothes. In addition, avoid wearing clothes that are likely to generate static electricity, such as wool sweater.
- Please do not turn off the drive while the drive is recognized by the computer.
   If you turn off the drive, normal operation of the computer will not be possible.
- Please do not connect the AC adapter and USB 2.0 converter cable by any means other than specified above.
- In order to prevent the top cover opening accidentally during operation, this drive has an
  electric ejection mechanism. For this reason, when the power supply is off, or unplugged,
  and someone pushes the eject button, the top cover does not open.
- There may be one second or more of delay until the top cover opens, after pushing the eject button.

# <u>Software Installation for device driver</u>

The drive includes device driver software that tells the drive how to operate from your PC.

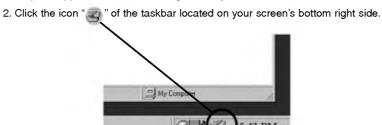
Install the device driver using the supplied "Support Software" Floppy Disc in your PC.

Refer to the Software Quick Start manual for directions.

# Removing the USB converter cable

The drive supports the plug and play(not swap) function of Windows, and can be removed and inserted by performing the following operation.

1. Stop the application software being currently used.



- 3. Click "Safely Remove HL-DT-ST RW/DVD GCC-5241P-Drive[x:]".
- 4. Click "Ok" and then remove the USB converter cable.

Don't remove the USB converter cable when the Power busy indicator on the drive blinks, or during computer startup.



# Loading and ejecting a disc

Remember - AC adapter must be connected.

### Loading a disc

- 1. Push the Eject Button to open the Top cover.
- Load a disc. (Label facing up.)
   Push down on the center of the disc until the
   disc clicks into place. Otherwise the disc may
   spin off the spindle and be damaged.
   Please do not press too hard. Also, be careful
   not to touch the lens on the pick-up mechanism.
- 3. Close the top cover.





When loading a disc, press the disc's inner edge against the side of the springloaded spindle bumper inside the disc compartment. Make sure that the disc is not sitting on top of the bumper before closing the top cover.

## Ejecting a disc

Power must be applied to the drive.

- Push the eject button to open the top cover.
   The top cover will open slightly.
   Carefully open the lid to the straight-up position.
- Removing the disc. Hold one finger against the edge of the disc from the side of the drive, and press another finger against the spindle in the center of the drive to remove the disc.
- 3. Close the top cover after removing the disc.





Make sure the disc has stopped turning before trying to eject the disc. Don't open the top cover when the power busy indicator blinks. Opening the cover while the power busy indicator blinks will stop any operation with the computer.

# Playing a music CD

### Listening to sound

When connected to a computer, you can play audio CD's through your computer's audio system after setting Digital Audio mode.

Check your Windows or "Windows Media Player" manual for detail.

You can also attach a pair of headphones for personal listening of audio CD's. Attach headphones with a standard 1/8" stereo plug into the headphone jack on the right side of the drive.

# Playing DVD video and MPEG2 movie video

The drive must be connected to a computer, and basic installation already done. Install the supplied application software 'Power DVD' in your PC. Inserting the provided disc will automatically start installation. Follow the wizard. After installation, remove the Power DVD disc and put it away for safekeeping. Inserting a DVD Video disc into the drive will automatically start playing the disc.

#### NOTES

• DVD video region code:

Each region around the world has a different region number on the DVD video movies being sold in a region.

The region code can be changed to other regions up to 5 times by using the software decoder (Power DVD).

If you change the region code 5 times, the drive will lock onto the last (5th change) region code, and cannot change the drive to another region code.

This limitation is a requirement as licensees of DVD drive technology.

 When connecting with USB1.1 interface, due to it's slow transfer time, picture and sound may be disrupted when trying to view a DVD movie.



# **Troubleshooting guide**

If the drive does not operate normally, check the following. Since the defect may be caused by a device other than this drive, also check the devices that make up your system, the settings of application software being used, etc.

If the suggested solutions still cannot restore the drive to normal, do not attempt to repair yourself. Consult your dealer.

Problem	Possible Causes	Corrective Action
Cannot play a DVD or CD in the drive or certain types of	The disc is not installed correctly.	Reinstall the disc correctly.
discs cannot be read in the	2. The disc is dirty.	2. Clean the disc surface.
drive.	3. The pick-up lens is dirty.	3. Clean the pick-up lens.
	<ol><li>The disc is scratched or warped.</li></ol>	4. Change the disc.
	5. The disc uses a region code that cannot be played on the drive.	5. Refer to your system manual for help.
Top cover cannot be opened	AC Plug is not connected to AC outlet.	Connect the AC plug tightly.
	DC Plug is not connected to the DC jack.	Connect the DC Plug tightly.
	3. Power Switch is not turned on.	3. Turn the Power Switch on and try again.
Drive is not recognized by the system.	The USB 2.0 converter cable is not properly connected.     Power Switch is not turned on.	1.Make sure USB 2.0 converter cable is connected properly and re-install the device driver.     2. Turn the Power Switch on and try again.
No sound (CD)	The headphone cable is not connected.     Volume is too low or sound is muted with software.	Securely connect it to the headphone jack on this drive.     Adjust the volume.     Release muting with software.

Problem	Possible Causes	Corrective Action
Drive will not play media or certain types of CD or DVD media	1. The disc doesn't match your system. Is the media disc the correct format for the type of system that you are using.  2. Virus possibility.	1. Check the disc format. (on a PC an ISO 9660 IBM compatible PC format as opposed to Apple/Mac HFS disc or UNIX disc formats will not function)  2. Has the Windows DVD-ROM software driver program been corrupted by a virus? Run a Virus Scan program and repair if possible.

# **Specifications**

Dimensions (WxHxD)	133x21x155mm			
Weight	350g			
Interface	USB 2.0			
Data Transfer Rate (at USB2.0)				
Read	CD-ROM	3,600 KB/s (24x) Max.		
	CD-R	3,600 KB/s (24x) Max.		
	CD-RW	2,250 KB/s (20x) Max.		
	DVD-ROM	11.0 MB/s (8x) Max.		
	DVD-R	5.54 MB/s (4x) Max.		
	DVD-RW	5.54 MB/s (4x) Max.		
	DVD+RW	5.54 MB/s (4x) Max.		
Write	CD-R	4xCLV,10xCLV,16x (10x/16x) ZCLV		
		24x (10x/16x/24x) ZCLV		
	CD-RW	4xCLV, 10xCLV		
L		(High Speed CD-RW : 4xCLV, 10xCLV)		
adaptor card used. When conn	ecting with USB1.1	to the performance capabilities of the PC and PCI interface, writing speed becomes about 4x and		
reading speed become about 6	X max for the char	acteristic of the interface.		
Access Time (Average)	CD 110ms, D\	/D 120ms		
Buffer Size	2MB			
Compatible Media				
Read Only	CD-DA (audio CD), VIDEO CD, CD-I,			
	CD-ROM (Mode 1, Mode 2),			
	CD-ROM XA (Mode2 Form 2),			
	Photo CD (Multisession), CD Extra,			
	CD-R/RW, CD-TEXT,			
	DVD-ROM (Single layer 4.7GB, Dual layer 8.5GB),			
	DVD-R (4.7GB), DVD-RW (4.7GB), DVD+RW (4.7GB)			
Read/ Write	CD-R, CD-RW			
Writing Methods	Disc-at-once, Track-at once, Multi-session, Packet Write			
Power Requirement	AC Adapter	AC Adapter		
Input		100-240VAC, 50/60 Hz		
Output	5V 2A	5V 2A		
Operating Environment				
Temperature	5 to 35 degC			
Humidity	20 to 80 %			
Storage Environment				
Temperature	-20 to 55 degC			
Humidity	15% to 85% RH			

- For the sake of periodic improvements, specifications and appearance are subject to change without notice.
  We have taken all possible measures to assure the quality of our products, but we cannot be responsible for the consequences if defect occurs.

### Copyright © 2002 **(b LG**

LG Electronics U.S.A. Inc. 1000 Sylvan Ave. Englewood Cliffs NJ 07632 U.S.A. or http://www.lgeus.com

LG Electronics Canada Inc. 235 Superior Blvd, Mississauga Ontario, Canada

LG Electronics Deutschland GMBH Jakob-Kaiser-Straße 12, D-47877 Willich, Germany

LG Electronics U. K. Ltd. LG House, 264 Bath Road, Slough Berkshire SL1 4DT United Kingdom

Goldstar France S.A.R.L Paris Nord II 22, Avenue des Nations-B.P.50372 VILLEPINTE 95945 ROISSY CDG CEDEXLG France

LG Electronics Italia S.P.A. Centro Direzione "IL Quadrate" Via Modigliani, 20090 Segrate (MI) Italy

LG Electronics España Complejo Europa Empressaries (Edif.Bruselas) Ctra. N-VI 28230 Las Rozas Madrid Spain

LG Electronics Australia Pty Ltd. 23, pike st Rydalmere NSW 2116 or http://www.lge.com.au

#### Caution!

The disc rotates at high speed in the drive unit.
Use of worn, damaged, or non-standard CD-ROM discs can only adversely affect the drive and cause the disc to shatter or crush while in use.

Disc crush can only occur when you use a damaged CD-ROM disc in the drive. It is an extremely rare occurrence, but there are steps which can be taken to prevent it

Always check your discs before inserting them into the drive.

- Take care not to use worn, cracked, damaged, warped or poor quality CD-ROMs, as this may cause damage to your drive.
- 2. Check the clear plastic on the center of the disc, cracks here are the main cause of disc crush.
- Do not play CD-ROMs which are a non-standard (I.e. non-circular)shape, such as heart shaped discs, or discs in the shape of a business card.

How can you keep your discs from becoming damaged?

- 1. When not in use, remove discs from the drive.
- Keep discs in the packaging supplied with them and out of direct sunlight and away from heat

Excessive vibration or a sudden jolt to the drive during operation may cause a malfunction.

Avoid exposing the drive to sudden changes in temperature as it may cause condensation to collect inside the drive.



Website; http://www.lge.com

http://www.LGEservice.com