



## Philips CD-Interactive MultiMedia Controller

Based on Philips industry-leading Compact Disc technology, this MultiMedia Controller is an excellent solution for interactive dialogue at Point-of-Sale and Point-of-Information kiosks, as well as for training and education.

This MultiMedia Controller connects to any standard TV receiver and audio system. With its extremely easy installation and operation via a simple pointing device constitutes a leading multimedia platform.

This MultiMedia Controller is a stand-alone CD-i player, which can

be hooked up to control one or two professional DVD players combining DVD's stunning Audio/Video qualities with CD-i's interactivity.

The serial communication supports the high modem speeds to allow for FTP data transfer from an Internet site.

The enhanced parallel interface allows for connection of a printer or the connection of an Iomega ZIP 100 drive.

- Plays CD-i, CD-Audio, Video-CD and Photo-CD discs.
- Digital Video decoder (MPEG) for full playback of Dolby®

Pro-Logic surround sound discs (movies, music videos and games).

- Serial lines for control of external devices or communication via modem.
- Enhanced Parallel Port to connect an external ZIP drive providing Non Volatile storage capacity of 100 Mbyte or to connect a standard printer.
- A unique system to implement custom specific requirements such as disc protection, disc lock-out, access control and start-up messages.
- Suitable for 19" rack mounting (optional mounting brackets).



# PHILIPS

*Let's make things better.*



# An advanced Philips CD-i MultiMedia

The true MultiMedia functionality of this system makes it the ideal system for real-time interactive presentations in commercial and institutional environments.

And for the great majority of applications such as POS/POI kiosks, individual or group training and education. This MultiMedia Controller has all the functionality necessary to do the job.

With its included Digital Video functionality, it runs all CD-i applications including those with full-screen, full motion, interactive video. In conformance with Compact Disc compatibility standards, it will also play Video-CD's and CD-Audio discs for information and background entertainment.

"Personal Preference" settings and the special custom feature provisions allows the system to be defined to suit individual business requirements.

The interfaces allow this system to be fully controlled via wired or Infra Red pointing devices or with a modem to get long distance data transfer via the Public Switched Telephone Network.



Even with all these facilities, this MultiMedia Controller is easy to operate, with the infra-red controller you simply "point-and-click" to select from the options presented interactively on the TV screen. This combination of dynamic remote control action and logically presented visual feedback is as fascinating for users as it is functional.

The Remote Control contains a miniature pressure-pad for one handed precision operation. It will move the cursor in any direction and at any required speed to any point on the TV screen. It makes even the most sophisticated operations perfectly simple to handle.

## The world wide standard for interactive MultiMedia applications

This MultiMedia controller meets the various standards supported world wide by all the major suppliers of consumer electronic products. With the MultiMedia Controller viewers become active participants interacting instantaneously (in real time) with sophisticated audio-visual programs - at a level not achieved by any other medium.

Programs are optically recorded and digitally stored on the universally accepted 5-inch optical disc format.

The wide variety of disc titles is increasing all the time as more and more companies use this system as their product of choice for educational, point-of-information, point-of-sale and background music/video applications.

## Surprisingly easy to use

With the combination of the MultiMedia Controller and the visual feedback of interactive information from the TV screen the only action required is to point-and-click; the system does the rest.

Besides the Remote Control this system also accepts inputs directly from wired pointing devices such as Touch Screen, Trackerball and Mouse.



With these various options operation can be made very flexible and simple.

The standard interface enabled various companies to develop all kinds of specialties such as approach detectors, keyboards, graphic tablets, lightpens and other devices.



# Controller for Information, marketing and control

## The system

A system consists of the titles (discs) to be played, and the MultiMedia Controller with a Remote Control in combination with a normal TV receiver.

## Customizing your player with the options screens

Another important aspect of the system is that it allows you to customize player performance using the Options screens.

From the Options menu-screen you have four choices:

- General options, which provides "Preference" settings for Autoplay On/Off and four Volume levels.
- Audio options offers "Preference" settings for Auto shuffle On/Off, Auto FTS On/Off, Repeat of Disc/FTS or Track and Scan time of 5, 10 or 20 seconds.
- Time and date options lets you set the time in 12 or 24 hours format and the date in day-month-year or month-day-year format and display them on the play control screens.
- Memory screen automatically lists files of Title data as well as Favorite Track Selection accumulated in the players non volatile memory (NV-RAM).

The information stored can be sorted into alphabetic, size or date order.

Also indicated is the percentage of the total memory space used enabling you to decide when to delete old files.

Once you have made your personal preferences the shell ensures that the player automatically adopts them when starting up.

## Protected mode

For unattended and public use the player can be put into protected mode, this disables the open tray function to prevent unauthorized disc exchange. It also restricts access to modify the "preferences" and remove intermediate results, this combination with its autostart function makes the system the best choice for POI/POS systems.

## Customizing features

As the products appear more and more in specialized environments we are faced with customer specific requirements. Our experience has resulted in a system which allows for such custom modification.

Software to adapt the behavior of the player to customer requirements can now be made available in an organized way. Such modifications could include:

- Delayed start-up to accommodate pointing devices and peripherals with a long boot time (e.g. Touch Screens)

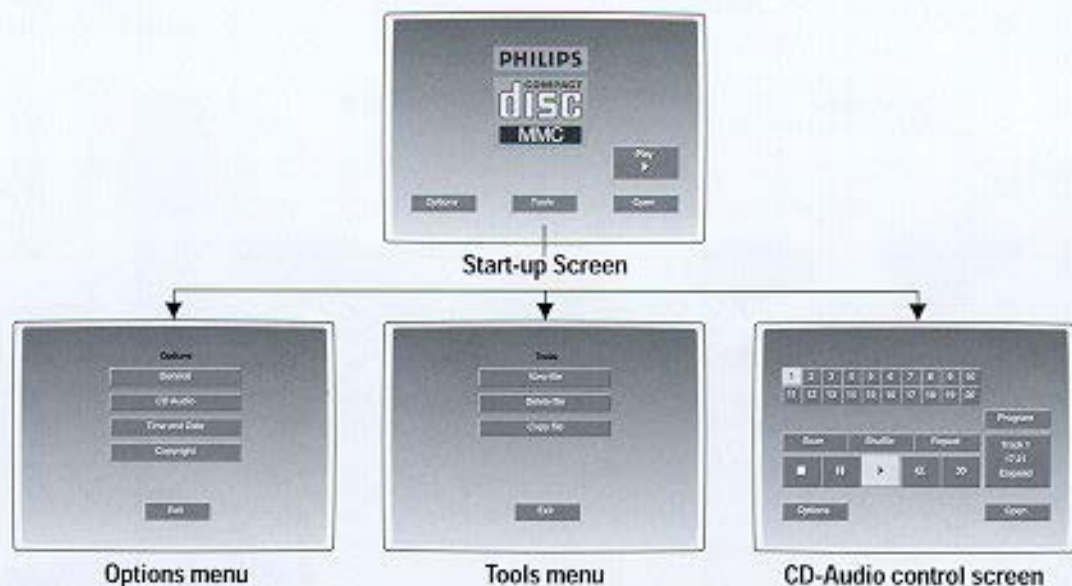
- Lock functions to disable playing CD-DA discs or to restrict the discs which can be played.
- For security reasons companies might want to make discs which will only play on authorized players.
- Disable Option access for unattended use or disable IR pointing devices for multiple player environments.
- Company name or special message during start-up.
- Special drivers to support new peripherals.

## Communication:

Using the serial interface of the system, communication with other systems is possible e.g. a wire connection to a personal computer, high speed modem over the telephone line to special system or a standard internet site for electronic mail exchange or file transfer.

## Storage:

The product features an Extended Parallel Port allowing the connection of an external ZIP 100 drive. Such a ZIP drive offers 100Mb non volatile storage capacity on a removable magnetic medium. Data exchange with PC equipment becomes very easy.



Execution of multimedia applications from the external ZIP 100 drive is supported.

The same parallel port used for connection of a wide range of standard printertypes allows written confirmation of the transaction or delivery of printer information to the user.

### Control

Via the Serial interface the player can control external A/V devices such as professional DVD-Video players. These players can be used to reproduce the highest video qualities with sensational multidimensional sound or to have a large collections of A/V material randomly available.

It is a perfect match for sophisticated Karaoke systems or operated music systems for discotheque and other entertainment places.

Special effects units can be controlled which adds a complete new dimension is added to MultiMedia messages. Imagine the effects that can be obtained with scent generators on a point of sale system!

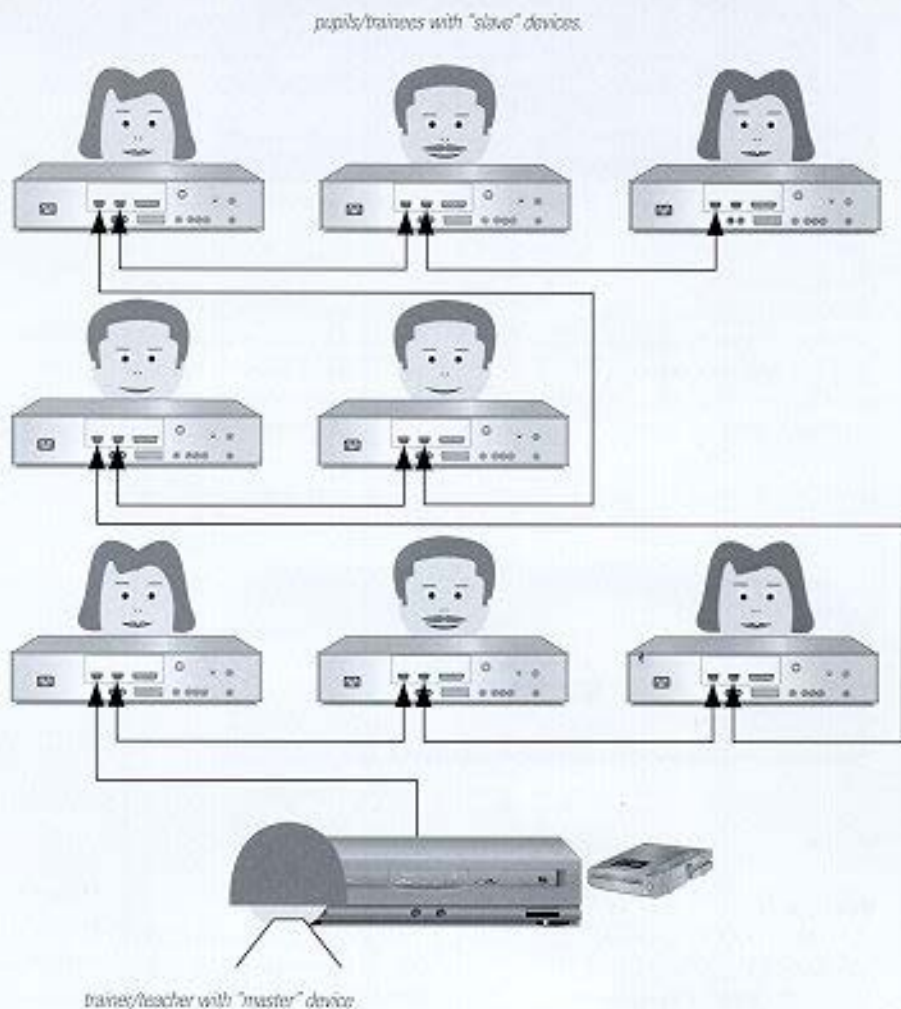
### Groupworking set-up

The example shows a typical set-up in which the "master" device can control e.g. the level at which a particular application program (CD-i title) on all "slave" devices is to start. The trainer/teacher simply inserts his programmed floppy and by selecting "Copy to External" in one of the tools screens, the information is downloaded into the NV-RAM's of all players.

### Use-counters

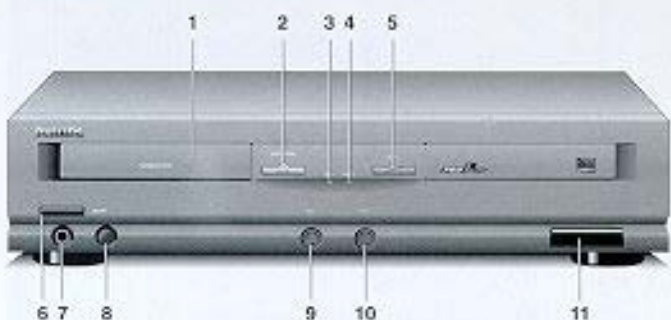
To be able to obtain information about the frequency of use and the way it is used the following data is collected by the system via separate counters:

- \* Power-on hours
- \* Active-use hours
- \* Disc exchanges



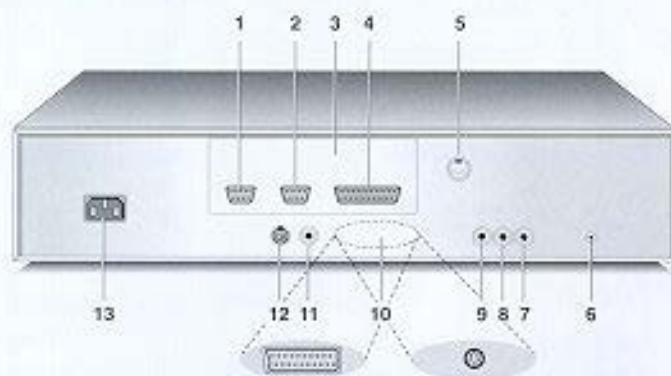


## Controls and connections CDI 670



### Front panel

- |                                  |   |
|----------------------------------|---|
| 1. Disc loading tray             | 7. Headphone socket                               |
| 2. Open/Close button             | 8. Headphone volume control                       |
| 3. Busy indicator (green)        | 9. Pointing device input 1                        |
| 4. 'On/Stand-by' indicator (red) | 10. Pointing device input 2                       |
| 5. Play button                   | 11. IR-receiver eye with 'Active' indicator (red) |
| 6. ON/OFF button                 |   |



### Rear panel

- |  |                                 |
|--|---------------------------------|
| 1. Port #1: RS232 serial port                | 9. Audio R-channel connector    |
| 2. Port #2: RS232 serial port                | 10. A/V Euroconnector*          |
| 3. Cover plate for extensions                | 10. Y/C (S-Video) connector*    |
| 4. Port #3: enhanced parallel port           | 11. Digital output connector    |
| 5. Port #4: AT-keyboard connector            | 12. Serial I/O port             |
| 6. +5V/Audio out (for optional RF Modulator) | 13. Power connector (AC socket) |
| 7. CVBS/Video connector                      |                                 |
| 8. Audio L-channel connector                 |                                 |



### Remote control

- |  |
|--|
| 1. Infrared remote transmitter                         |
| 2. Action button                                       |
| 3. Thumbpad  |
| 4. Action buttons (for right or left handed operation) |
| 5. Volume up button                                    |
| 6. Volume down button                                  |
| 7. CD-i/TV button***                                   |
| 8. Next track**  |
| 9. Previous track**                                    |
| 10. Sliding Cover                                      |
| 11. Standby***   |
| 12. Stop button**                                      |
| 13. Pause button**                                     |
| 14. Play button**                                      |

\* Available on some models only

\*\* Only functional for CD-Audio and some CD-i applications

\*\*\* Not functional on some CD-i player models

## TECHNICAL SPECIFICATIONS CDI670

### PLAY-BACK SYSTEM

CD-i
CD-DA
Video-CD
Photo-CD
CD-Bridge

### OPTICAL READOUT SYSTEM

Laser type	Semiconductor AlGaAs
Numerical aperture	0.546
Wavelength	780 nm

TV STANDARD	EUROPE	USA
	(PAL) <sup>1)</sup>	(NTSC) <sup>2)</sup>
Number of lines	625	525
Vertical resolution	280/560	240/480
Horizontal resolution	384/768	384/768

### REMOTE CONTROL

System	RC6
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### CONNECTIONS

Input 1, 2	Mini DIN, 8p
Serial I/O	Mini DIN, 8p
Serial ports (#1, #2)	RS232, DB9 male
Parallel Port (#3)	Centronics, DB25 female
Keyboard Port (#4)	DIN, 5p
DC/Audio output	+5V, 50 mA (Mini-Jack)
Digital output (cinch)	0.5Vpp into 75 Ohm <sup>3)</sup>
CVBS output (cinch)	1.0Vpp into 75 Ohm
Audio L+R (cinch)	2Vrms into 10 kOhm
Headphone	6.3 mm jack, 8-2000 Ohm, 30 mW @ 32 Ohm
RGB output	Euroconnector <sup>3)</sup>
Y/C output	Mini Din <sup>3)</sup>

- 1) For CD-DA only  
 2) Europe versions only  
 3) USA version only  
 4) Might not be available in all territories

### CONTROLS

Power on/off
Play
Open/Close

### POWER SUPPLY

Voltage	100-240V
Frequency	50-60 Hz
Power consumption	20 W approx.

### CABINET

Material	PS front panel Metal case
Dimensions (wxd) (h)	435 x 85 x 290 mm (17 1/8 x 4 1/8 x 11")
Weight	4.0 kg approx.

### MEMORY

32kB NV-RAM
2Mb RAM (system)

### PACKAGE CONTENTS EUROPE<sup>3)</sup> USA<sup>3)</sup>

Player	•	•
AC cable	•	•
IR remote control (+batteries)	•	•
Euroconnector cable	•	
Stereo Audio cable		•
Video cable		•
User manual	•	•
Technical manual	•	•

### OPTIONAL ACCESSORIES<sup>4)</sup>

Roller Controller	22ER9012
Trackerball	22ER9013
RF modulator	22ER9071
Touch screen	22ER916x
IOMEGA ZIP 100	

### Optional Accessories



Roller Controller  
22ER9012



Trackerball  
22ER9013



RF modulator  
22ER9071



Touch screen  
22ER916x



IOMEGA ZIP 100

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