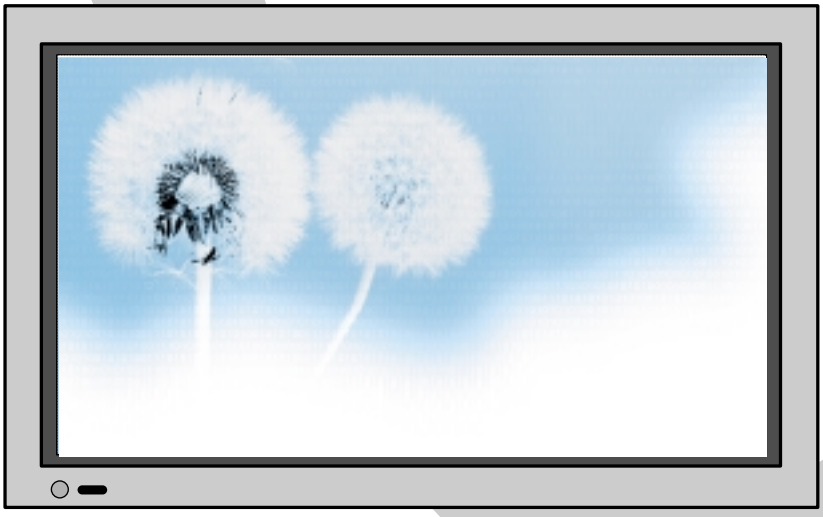
DAEWOO ELECTRONICS

PLASMA DISPLAY

USER'S MANUAL

DSP-4224LVS
DSP-5014LXS



Proper use guarantees product life.

Before using the product, be advised that you read this owner's manual well and try to operate it.

- Product Warranty is included -

Features

• 50” XGA, 42” VGA wide Plasma Panel

• DVD Direct Connection / Outstanding Picture Quality Digital Broadcasts Receive

DVD can be directly connected to the unit so that you can view clear digital images. You can enjoy even higher quality images. by connecting digital broadcasting receiver with which digital broadcasts can be viewed.

• PC Direct Connection

PC can be connected to the PDP without a separate device, and can be used as a monitor so that the effect of presentation gets maximized, making it more popular in various events and exhibitions.

• 160º Wide-Angle Viewing Area

• Flat Panel with No Distortion and Color Blurring

Since Plasma Monitor has no problems such as distortion, blurring, flickering unlike existing CRT type, you can enjoy Home Theater with super speaker.

• Various Video Control

- 11 Languages OSD - 20 Step screen zooming function - Full-screen still function
- Various aspect ratio (16:9, Panorama, Normal, Enlarge LB, Enlarge LBS)

• Worldwide : NTSC, PAL, SECAM / Free Volt (100-240V 50/60Hz)

• DVI (Digital Visual Interface) Connection

When connection to PC, you can receive DVI digital signal as well as former analog signal by using DVI input and D-Sub input. Furthermore, using the DVI Input, you can receive directly a digital signal of the computer, consequently pictures on the screen are much more clear and fresh.

This Owner’s Manual presents safety precautions and how to use the product.
After reading it thoroughly, use the product safely.
Keep this manual where the user can see it easily.

Failure to comply with warnings and cautions for the safe use of electric appliances may cause fire or human injury.

FCC RF INTERFERENCE 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 experienced radio, TV technical for help.
- Only shielded interface cable should be used.

Finally, any changes or modifications to the equipment by the user not expressly approved by the grantee or manufacturer could void the users authority to operate such equipment,

Safety Precautions

Power

Always obey all safety messages.

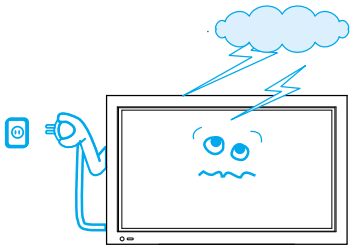
- All the safety and operating instructions should be read before the product is operated. If anything strange happens, unplug this product from the wall outlet.
- Do not disassemble or replace any parts of the monitor. Refer to a qualified service personnel for repair.

⚠WARNING

You can be dead or seriously injured if you do not follow instructions.

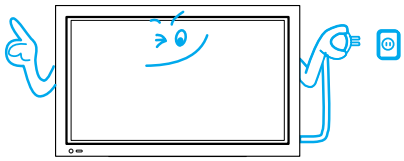
During a lightning storm, or when it is left unattended and unused for a long period of time, unplug it from the wall outlet.

It can result in fire.



When unplugging your monitor, always grip plug firmly and pull straight out from the receptacle.

It can result in fire or electric shock due to damaged power cord.

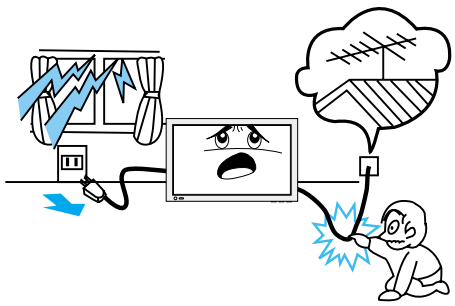


This product must be properly grounded.

- Improper grounding may cause malfunction or electric shock.
- When proper grounding is not possible, install circuit breaker.
- Do not ground to gas pipe, water pipe, lightning rod, and telephone line.

During a lightning storm, unplug the monitor from the wall outlet, and do not touch the antenna.

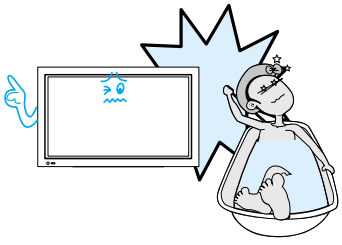
It can cause fire or electric shock.



Installation

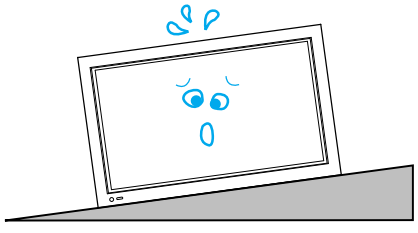
Do not use this product in the neighborhood of a bath or shower.

It can result in electric shock or fire.



Do not place this monitor on an unstable cart, stand, or table

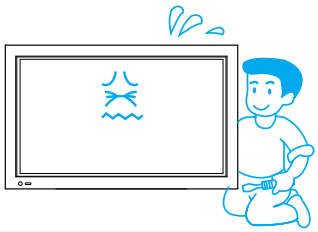
It may cause the product and cart to overturn, damaging equipment or causing possible injury.



While Using Monitor

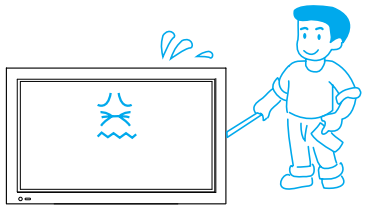
Do not open cover (or back) because high voltage is present within the monitor's enclosure.

It may cause electric shock.



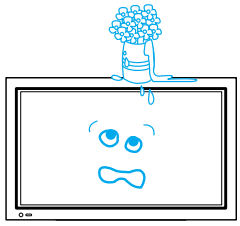
Never push objects of any kind into this product through openings at the back of monitor.

It may cause fire or electric shock.



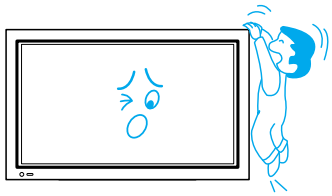
No objects filled with liquids, such as vases, shall be placed on the monitor.

Spilled liquids may cause electric shock or fire.



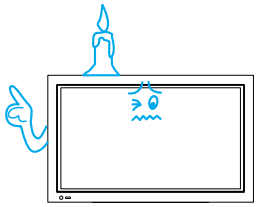
Do not allow children to play or hang on the monitor.

These actions may tip it over, causing personal injury.



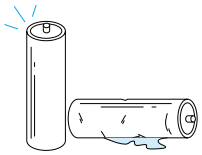
Do not place candle or lighted cigarette on the monitor.

If these fall into the inside of the monitor, it may cause fire or explosion.



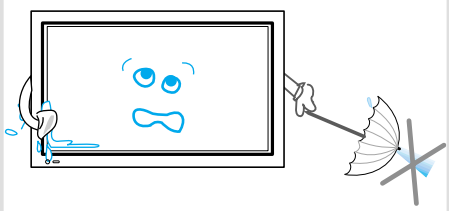
Do not disassemble batteries, and do not allow children to swallow them.

Heavy metal may contaminate environment, and can be harmful or detrimental to human health. (When children swallow the batteries, go to hospital and consult with a doctor.)



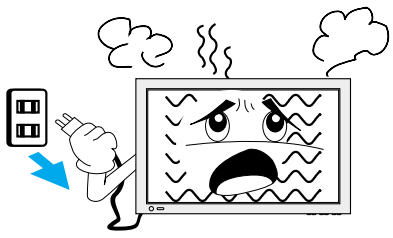
Do not spray water to the monitor or wipe with damp cloth.

It may cause electric shock or fire.



Unplug the monitor from the wall outlet when smoke or strange smell occurs, then refer servicing to a service personnel.

In the case of continuous use, it may cause fire or electric shock.



Safety Precautions

Power

Always obey all safety messages.

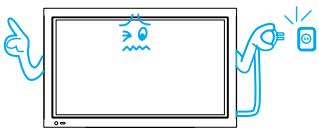
- All the safety and operating instructions should be read before the product is operated.

⚠ CAUTION

You can be injured, or this product or any other your property can be damaged if you don't follow instructions.

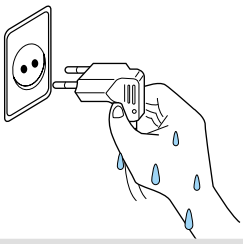
When moving your monitor, remove the power plug, antenna, and cables, and be sure to move it by more than two people..

Failure to follow this instruction can result in electric shock or personal injury.



Do not touch the power plug with wet hands when plugging or unplugging.

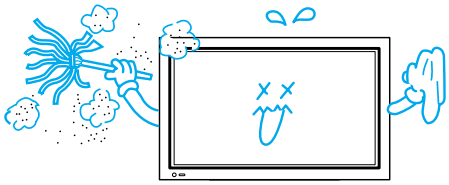
It can result in a risk of electric shock.



Installation

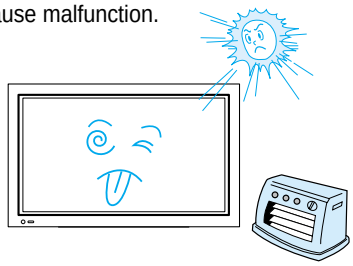
Do not install where there is oil, smog, moist, and dust

It may cause malfunction.



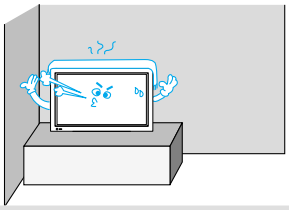
Do not install the product where it will be exposed to the direct sunlight, and the product should not be near heat sources such as radiators, stoves, etc.

It may cause malfunction.



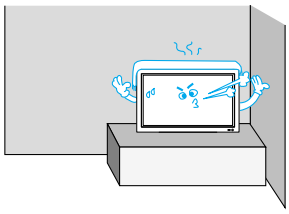
For proper ventilation, separate the product from the wall, and keep a distance of more than 4".

Due to the increase of temperature inside the Monitor, it may cause fire.



Do not place the monitor where ventilation is not ensured.

Due to the increase of temperature inside the Monitor, it may cause fire.

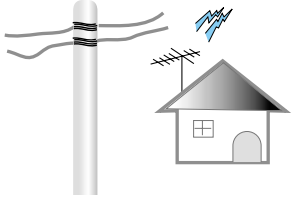


If you wish to install this product on the wall or ceiling, refer to the professional.

Failure to do so may cause damage to product and injury to human.

When using an outside antenna system, do not install it in the vicinity of overhead power lines.

When antenna touches such power lines, it may cause electric shock.

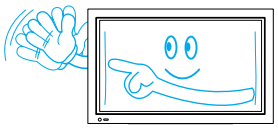


The plasma display panel consists of fine cells. Although the panels are produced with more than 99.9 percent active cells, there may be some cells that do not produce light or remain lit.

During Use

Do not allow a still picture to be displayed for an extended period, as this can cause a permanent ghost image to remain on the Wide Plasma Display.

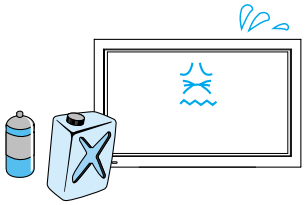
Examples of still pictures include logos, video games, computer images, teletext and images displayed in 4:3 mode.



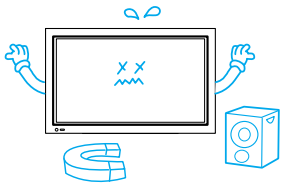
Warranty does not cover any damage caused by image retention.

Do not wipe the monitor using a cloth damped with chemicals (benzene, thinner, etc.).

Monitor appearance may be marred. (Unplug the power plug and wipe with soft cloth.)

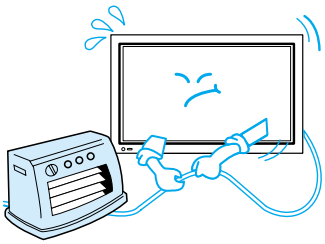


Do not place the monitor near magnetic, speakers, or telephones.



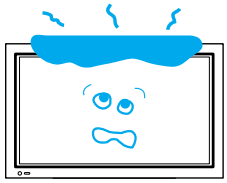
Do not place heavy objects or heat sources on the power cord.

It may damage the power cord, causing fire or electric shock.



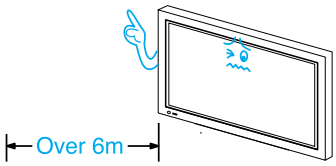
Do not place any object or cover on the monitor.

In an event of improper ventilation, the monitor will be overheated causing fire.



When watching the TV, the distance between the Monitor screen and your eye should be as 5~7 times as the diagonal distance of the Monitor.

Watching the TV for a long time may hurt your eye sight.

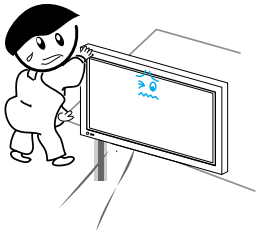


When cleaning of the inside of the monitor is required, consult to the qualified service personnel.

When the monitor is not cleaned for a long period of time, dust in it may cause fire or malfunction.

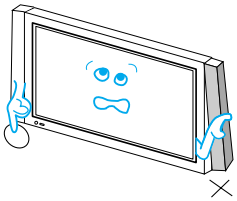
When the monitor is placed on a cart or table, the front side of the Monitor should not project outward.

Unbalance may cause the monitor to drop, resulting in personal injury or equipment malfunction and damage.



Do not grip speakers when moving the monitor attached with speakers.

When moving the monitor while gripping speakers, speakers may be fallen away from the monitor due to its weight, causing personal injury.



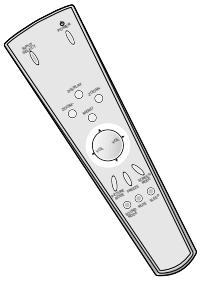
Checking Accessories

Note

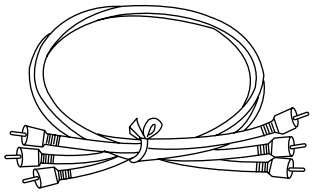
Check to be sure that the following items are packed with your Plasma pannel.

Supplied Accessories

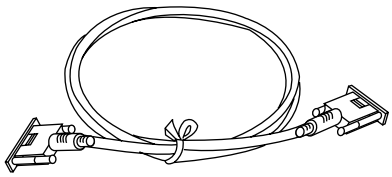
Remote Control **1 UNIT**



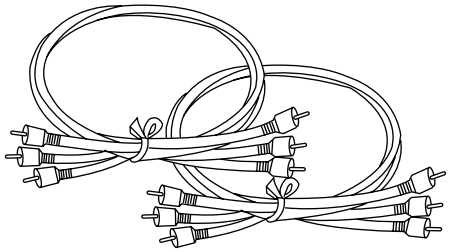
Audio Cable **1 UNIT**



PC(15pin) Cable **1 UNIT**



A/V Cable **2 UNITS**



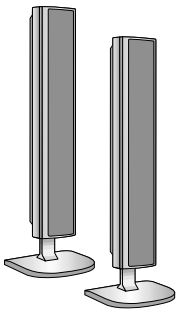
AC Cable 1 UNIT

Note

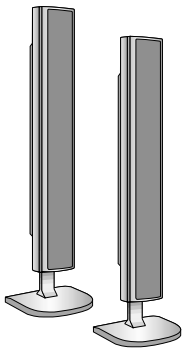
The following items are optional accessories.
Refer purchasing optional accessories from Daewoo Electronics Local Dealer or the dealer from where you purchased the unit.

Optional Accessories

Speakers



DP-SP55

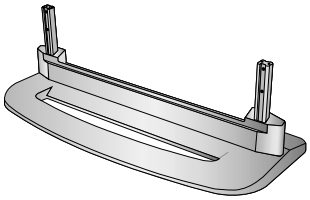


DP-SP50

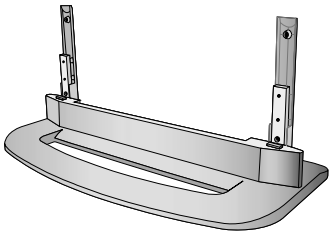
DP-SP50 / DP-SP50U
- Speaker Main Unit Dimension : 110(W) x 738(H) x 86(D)mm
- Including Speaker Stand Dimension : 210(W) x 836(H) x 210(D)mm
- Audio Amplifier : 10W + 10W
- Impedance : 8Ω
- Weight : 4.1kg

DP-SP55 / DP-SP55U
- Speaker Main Unit Dimension : 100(W) x 628(H) x 88.5(D)mm
- Including Speaker Stand Dimension : 210(W) x 704(H) x 210(D)mm
- Audio Amplifier : 10W + 10W
- Impedance : 8Ω
- Weight : 3.5kg

Table Top Stad



DP-ST55

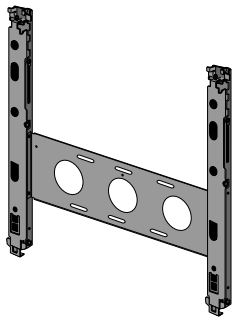


DP-ST50

DP-ST50 / DP-ST50U
- Dimension : 800(W) x 353(H) x 408(D)mm
- Weight : 6.7kg

DP-ST55 / DP-ST55U
- Dimension : 720(W) x 215(H) x 310(D)mm
- Weight : 4.5kg

Wall Mounting Unit



DP-HG10

DP-HG30

DP-HG30
- Variable Angles : 0º, 10º, 15º, 20º, 25º Speaker Main Unit
- Dimension : 651(W) x 420(H) x 38(D)mm Including Stand
- Weight : 4.9kg

DP-HG10
- Variable Angles : 0º, 10º, 15º, 20º, 25º Speaker Main Unit
- Dimension : 601(W) x 592(H) x 35(D)mm Including Stand
- Weight : 4.5kg

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26 • Connecting PC(15pin D-sub)
28 • Connecting PC(DVI)

APPLICATION

31 • Selecting Auto Picture Mode
32 • Customizing Picture
34 • Adjusting Screen Size
36 • Adjusting Screen Position and Size
38 • Enlarging Screen Size
40 • Watching a Still Image
41 • Adjusting Auto Sound Mode
42 • Customizing Sound Mode
44 • Selecting INPUT SIGNAL
46 • Checking the Current Input Signal
47 • Selecting MENU Background Screen and Languages
49 • Select Image Sticking Minimization
51 • Setting Sleep Timer

MISC.

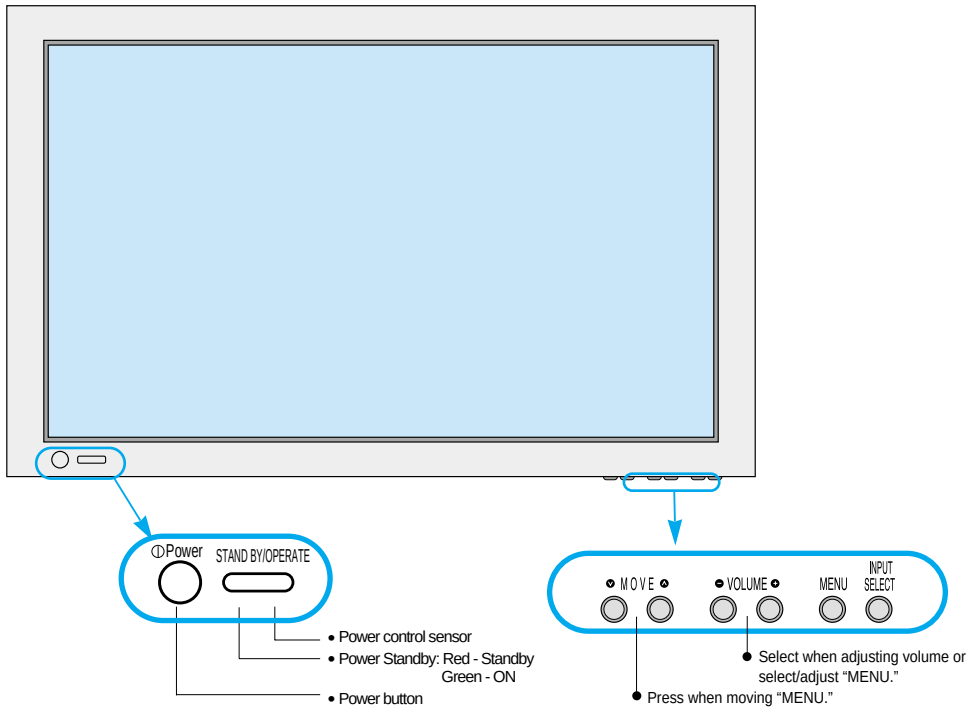
52 • Before Requesting Service
53 • SPECIFICATIONS

Panel Controls

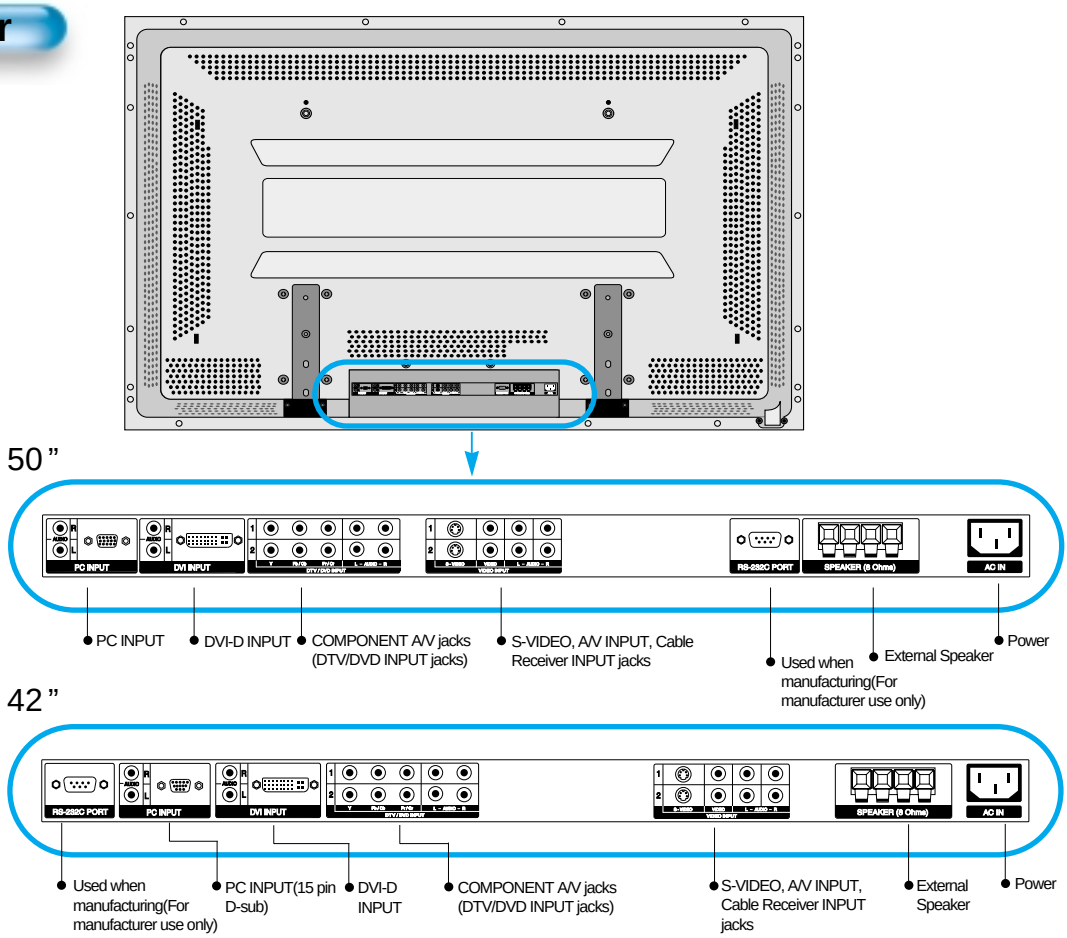
Front Panel, Back Panel, Remote Control

* Parts having same names in Plasma Display and Remote Control would function in exactly the same way.

Front



Rear

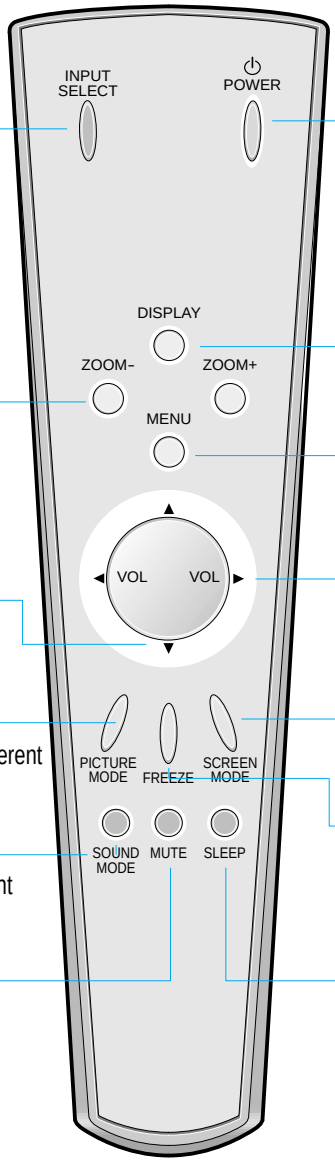


Remote Control

* The number in ( ) indicates the page in which the function of each button is explained in detail.

Note

- Use two “AAA” batteries.
- Be sure to use replacement batteries of the same type as the original ones.
- The life of a battery depends on how much it has been used.



Input Select button 44

Used to select a desired input. Every press of the button cycles through the five different modes: Video 1 –> Video 2 –> PC –> DVI –> Component 1 –> Component 2

ZOOM button 38

Used to zoom the screen. To enlarge, press the (+) button, and to return to the previous condition, press the (-) button. (ZOOM Mode: Zoom 0~20)

Menu Select button 32

Select Menu by pressing ▲(Up), ▼(Down), ◄(Left), ►(Right) buttons.

Screen Select button 31

Every press of the button cycles through the four different modes: Normal –> Dynamic –> Cinema –> User.

Sound Mode button 41

Every press of the button cycles through the five different modes: Normal –> Movie –> Music –> News –> User.

Mute button

Mutes sound.

Power button

Pressing the Power button of the Monitor allows the Display to be standby. (Red light is shown in the Remote Control Sensor.) At this time, if you press the Power button of the Remote Control, the Display is turned ON (Green light in the Sensor).

Display button 46

Indicates the current state and resolution.

Menu button 42

Used to display a desired menu.

Volume button 32

Adjusts the volume.

Aspect Ratio 34

Adjusts the size of the screen (Normal, 16:9, etc.)

Still 40

Used to view a still picture during watching moving images. (Sound can be heard.)

Sleep Timer 51

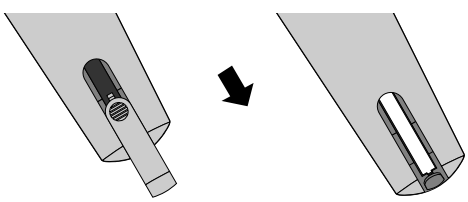
Each time you press this button, a different input mode appears.
The sequence is as follows:
15 Min. –> 30 Min. –> 60 Min. –> 90 Min. –> 120 Min. –> OFF
After the time is selected, it automatically becomes stand-by state.

■ When Using Remote Control:

- Be sure not to allow the Remote Control to drop or to become wet.
- Keep it away from hot or moist locations.

■ Installing the Batteries in your Remote Control:

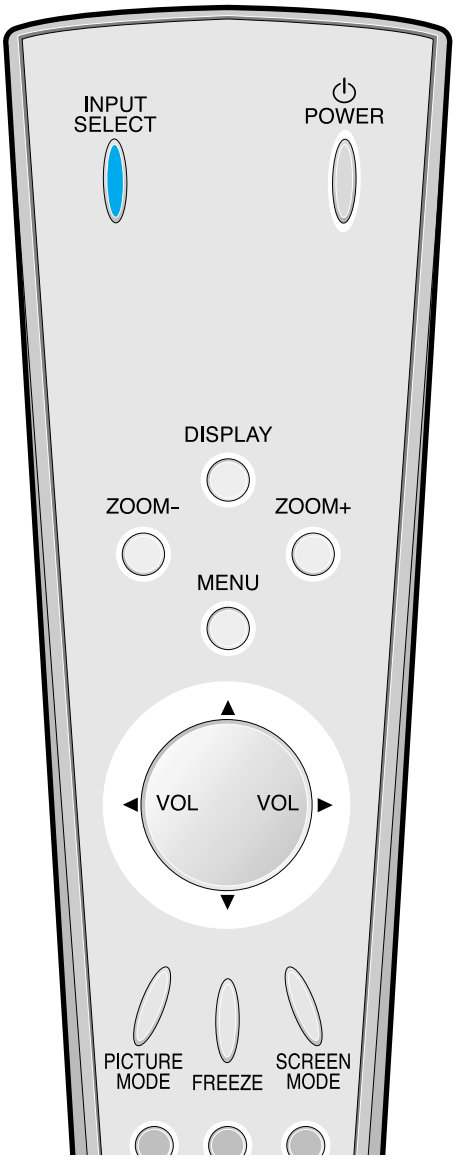
- To remove the cover, slide it outwards while pressing it down.
- Place two batteries in the remote control by properly orienting them, then close the cover.



Watching Digital Broadcasts

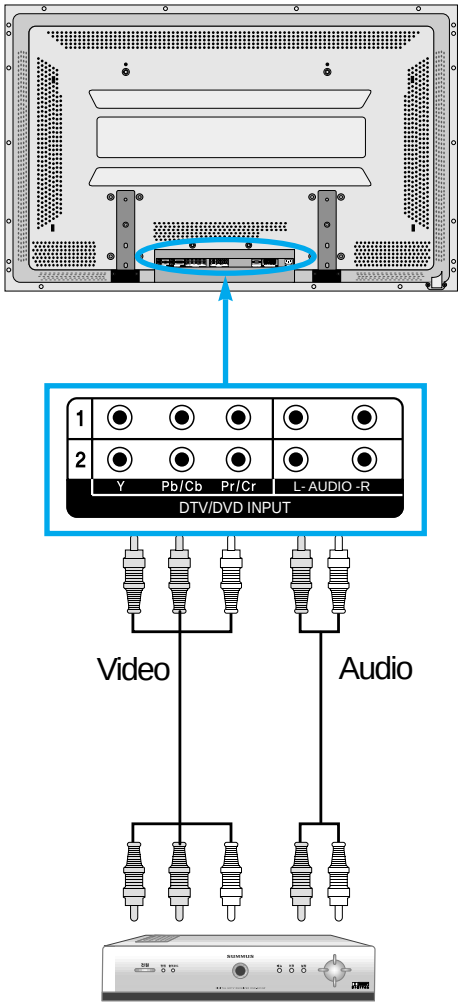
Watching Digital Broadcasts

- To watch digital broadcasts:
  - Purchase a separate digital Broadcasting Receiver(SET-TOP BOX)
  - Connect the PDP to a Digital Broadcasting Receiver as shown below.



1 Connect a Digital Broadcasting Receiver to the PDP

- Prepare A/V Cables supplied.
- Connect the cables from the Digital TV Receiver output terminal to the PDP(Component 1, 2) input terminal.
- When connecting the cables, be sure to match the cable colors.



Digital Broadcasting Receiver
(Set-Top Box)

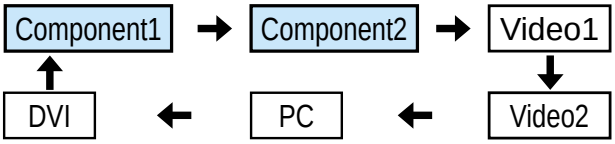
2 Press the Power Buttons

- Press the Power buttons of the PDP and the Receiver.

3 Input Select

INPUT SELECT

- Select [Component 1 or Component 2] by pressing the INPUT SELECT button of the Remote Control or the PDP unit.
- Each time you press the INPUT SELECT button, different input modes appear. The sequence is as follows: Component 1 –> Component 2 –> Video 1 –> Video 2 –> PC –> DVI.



4 Select a Desired Channel and Function

- Select a desired channel and function by using the Remote Control of Digital Broadcasting Receiver.

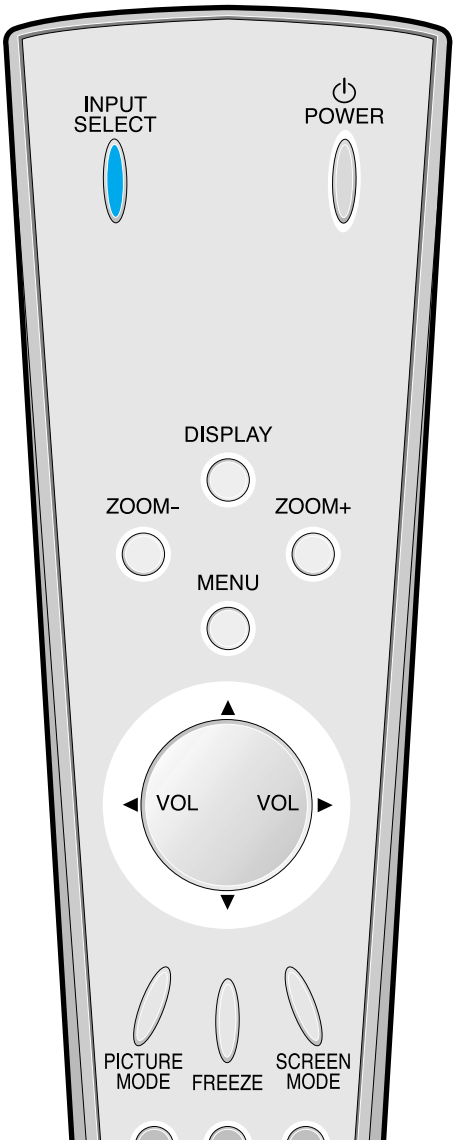
NOTES:

1) You can select INPUT SELECT while you are using OSD(Menu).
   Sequence: [Menu] –> [Input] –> [Component 1 or 2 (DTV/DVD)]
2) Digital Broadcasting signals available: 1080i, 720p, 480p.
3) Antenna Connection:
   Apartment : Check if community antenna receives digital broadcasts.
   Private Houses: Set the indoor/outdoor UHF antenna to the direction of the digital broadcasting transmitting company.
4) For detailed connection method, refer to the Owner's Manual of Digital Broadcasting Receiver.
5) What is a component? : Signal with which brightness and color signals are separated, producing a sharp screen.
6) If the Digital Broadcasting Receiver has PC Output terminal or DVI Output terminal, connect to 'PC INPUT' or 'DVI INPUT' at the back panel of the PDP.
   When watching the PDP by PC or DVI Input, some undesired signals may be seen at the top and bottom area of the screen. In this case, select [Menu] –> [Screen] –> [Vertical Size] to adjust.

Watching Cable Broadcasts

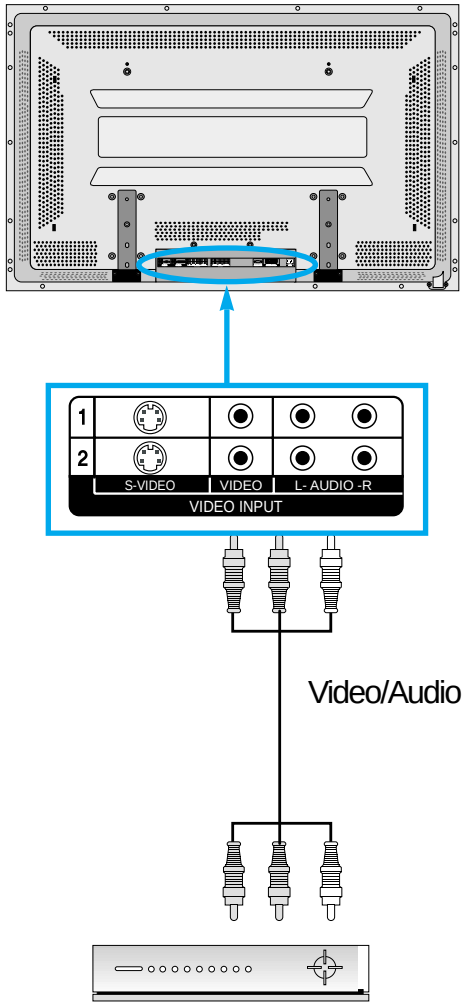
Watching Cable Broadcasts

• To watch cable broadcasts, subscribe to your local Cable TV Broadcasting, and then, connect a cable Broadcasting Receiver TV to the PDP as shown below.



1 Connect a Cable Broadcasting Receiver to the PDP.

• Prepare the A/V cable.
• Connect the receiver(Output) to PDP(Video Input) as shown below.
• When connecting to an external AV source, be sure to match the colors.



Cable Broadcasting Receiver

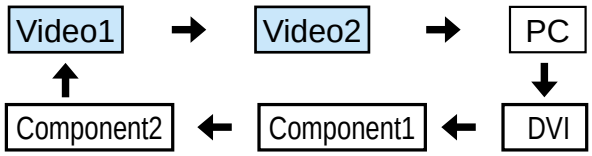
2 Press the Power Buttons

• Turn the PDP and the Receiver ON.

3 Input Select

INPUT SELECT

- Select [Video 1 or Video 2] by pressing the INPUT SELECT button of the Remote Control or the PDP unit.
- Each time you press the INPUT SELECT button, different input modes appear. The sequence is as follows: Video 1 –> Video 2 –> PC –> DVI –> Component 1 –> Component 2.



4 Select a Desired Channel and Function

- Select a desired channel and function by using the Remote Control of the Cable Broadcasting Receiver.

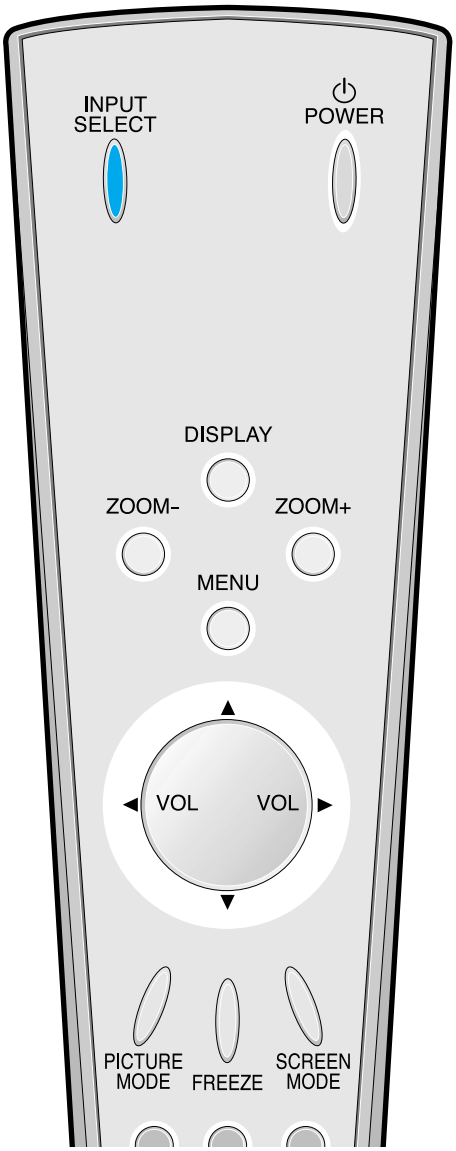
NOTES:

1) If your local cable company re-transmits digital broadcasts, you may watch normal broadcasts and digital broadcasts simultaneously. For detailed information, refer to your local cable company.

Watching Satellite Broadcasts

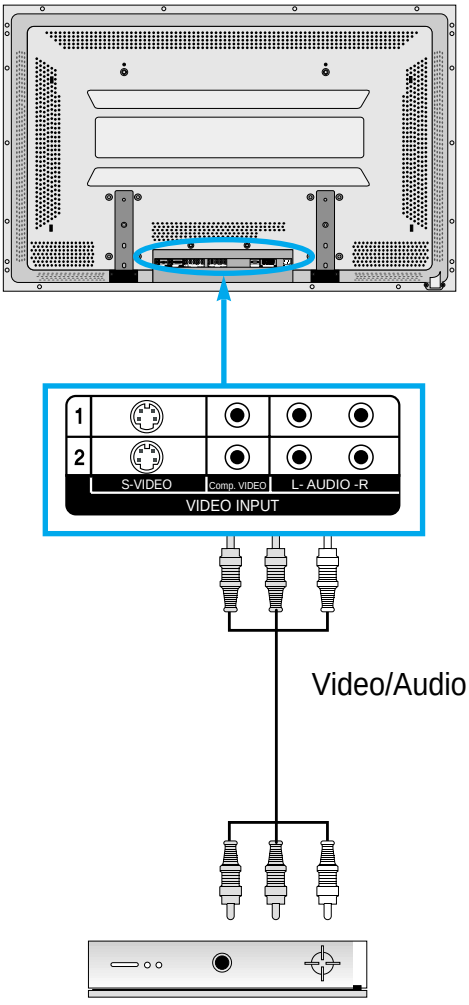
Watching Satellite Broadcasts

• To watch satellite broadcasting, subscribe to a Digital Satellite Broadcasting, then connect setellite Broadcasting Receiver to the PDP as shown below.



1 Connect a Satellite Broadcasting Receiver to the PDP.

• Prepare the A/V cable.
• Connect the receiver(Output) to PDP(Video Input) as shown below.
• When connecting to an external AV source, You have to connect to the same color AV source.



Satellite Broadcasting Receiver

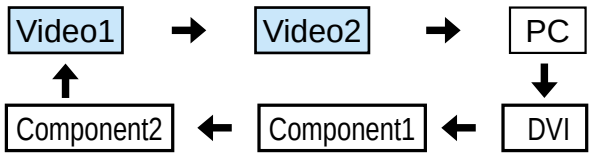
2 Press the Power Buttons

• Turn the PDP and the Receiver ON.

3 Input Select

INPUT SELECT

- Select [Video 1 or Video 2] by pressing the INPUT SELECT button of the Remote Control or PDP unit.
- Each time you press INPUT SELECT button, a different input mode appears. The sequence is as follows: Video 1 –> Video 2 –> PC –> DVI –> Component 1 –> Component 2.



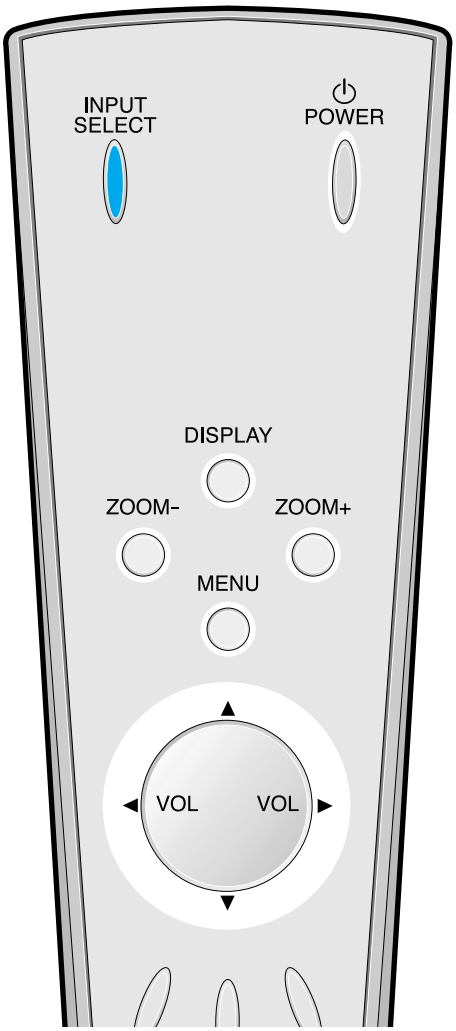
4 Select a Desired Channel and Function

- Select a desired channel and function by using the Remote Control of the Satellite Broadcasting Receiver.

Watching a DVD Image

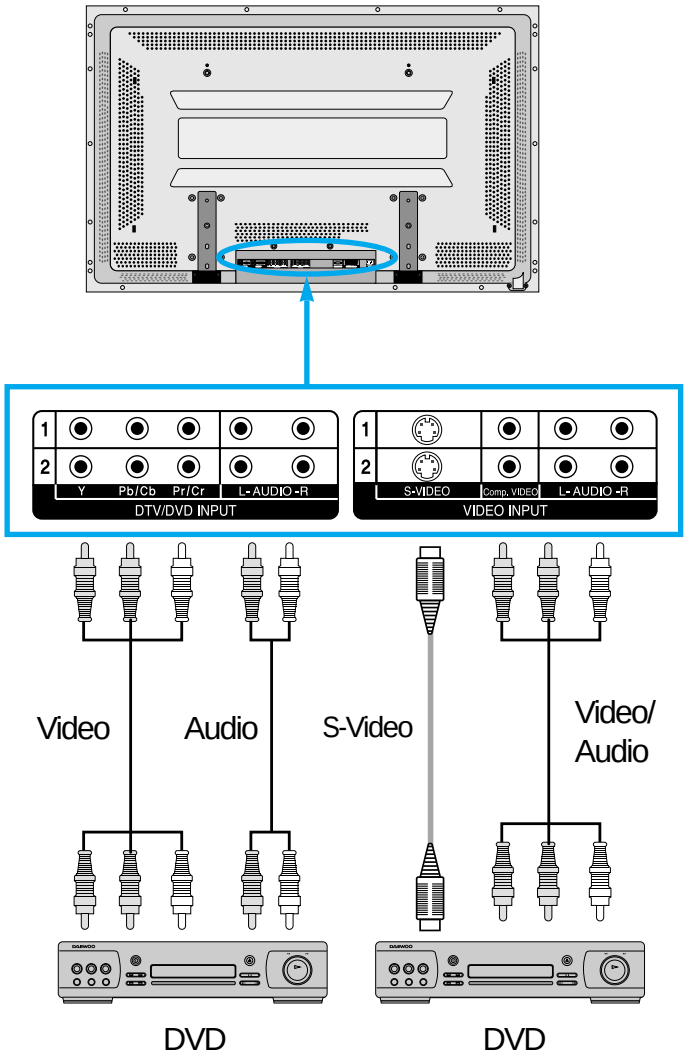
Watching a DVD Image

- Component Input is set to 480i and 480p mode.
- Connect the cable from the DVD Video Output (Y, Pb/Cb, Pr/Cr) to the Component Input at the back of PDP, and connect the cable from DVD Audio output (Left, Right) to the Audio Input at the back of PDP.



1 Connect a DVD Player to the PDP.

- Prepare the AV cable.
- Connect the DVD(Output) to the PDP(Component or Video Input) as shown below.
- When connecting to an external AV source, match the colors.



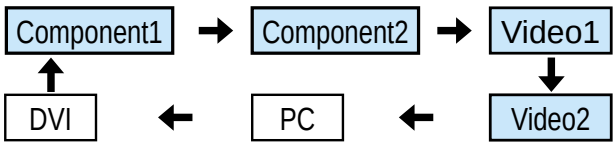
2 Press the Power Buttons

- Turn the PDP and the DVD ON.

3 Input Select

INPUT SELECT

- Select [Component 1 or Component 2, Video1, Video2] by pressing the INPUT SELECT button of the Remote Control or the PDP unit.
- Each time you press the INPUT SELECT button, a different input mode appears. The sequence is as follows: Component 1 –> Component 2 –> Video 1 –> Video 2 –> PC –> DVI.



4 Select a Desired Title and Function

- Select a desired title and function by using the Remote Control of the DVD.

NOTES:

1) Y/Cb/Cr, which stands for DVD Player's Output Terminal, can also be written as Y/B-Y/R-Y, Y/Pb/Pr depending on the kinds of DVD devices.
2) The way of connecting the DVD to the PDP is as follows:
   Y <–> Y Cb <–> Pb, B-Y, Cr <–> Pr, R-Y
3) The DVD output can be made by Video, S-Video and/or Component Video depending on the DVD devices. There are various output modes, so be sure to check when to purchase it.
4) When connecting S-Video and Video simultaneously, only S-Video will be displayed on the screen.

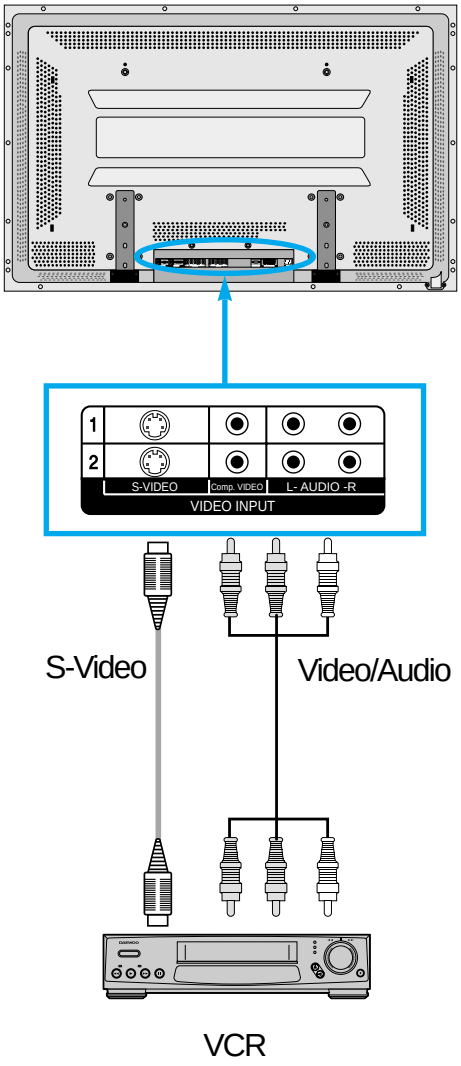
Watching a VCR Image

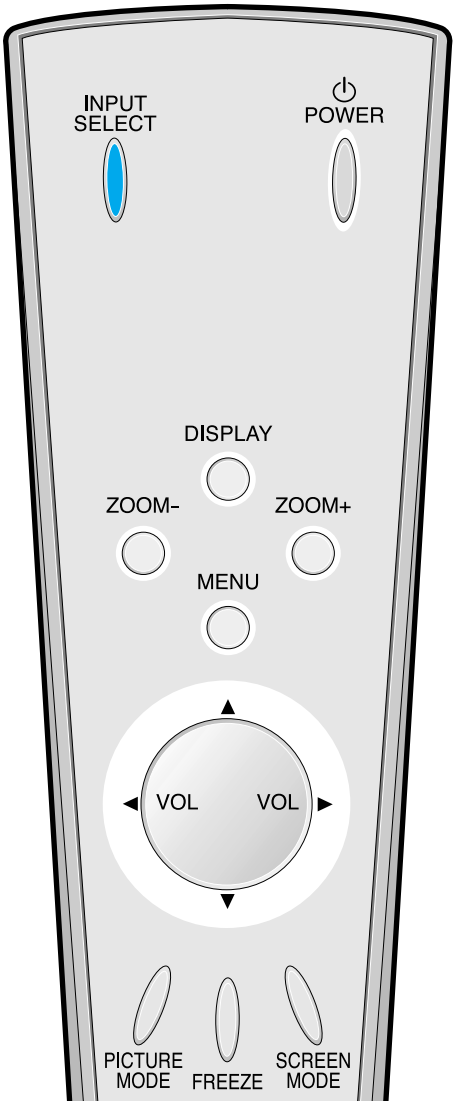
Watching a VCR Image

• Video can use either the video terminal or the S-video terminal.

1 Connect a VCR to the PDP.

• Prepare the AV cable.
• Connect the Video(Output) to PDP(Video Input) as shown below.





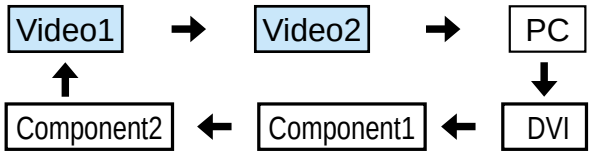
2 Press the Power Buttons

• Turn the PDP and the VCR ON.

3 Input Select

INPUT SELECT

- Select [Video 1 or Video 2] by pressing the INPUT SELECT button of Remote Control or PDP unit.
- Each time you press the INPUT SELECT button, a different input mode appears. The sequence is as follows: Video 1 –> Video 2 –> PC –> DVI –> Component 1 –> Component 2.



4 Select a Desired Title and Function

- Select a desired title and function by using the Remote Control of the VCR.

NOTES:

1) When connecting a Video, the S-Video terminal provides a better image than the Video terminal.
2) When connecting to the Video terminal, connect 3 color AV cables (video, left audio, right audio) to the PDP; for the S-Video terminal, connect the Audio terminal (Left, Right) in the same way, and connect the Video terminal by the S-Video cable (sold separately).
3) When connecting the Video terminal and the S-Video simultaneously, the S-Video terminal is selected. This can be checked by the [Display] button of the Remote Control.

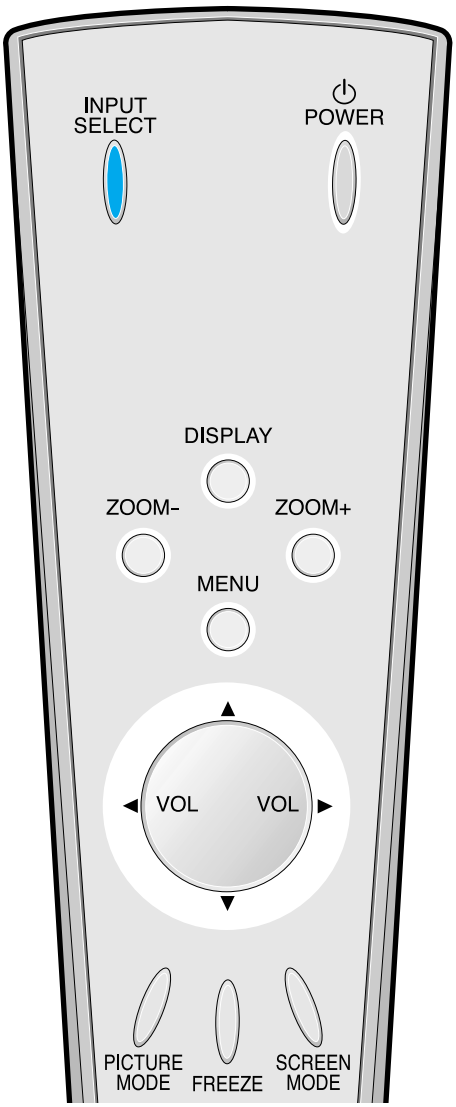
Watching a Camcorder/Game Console Image

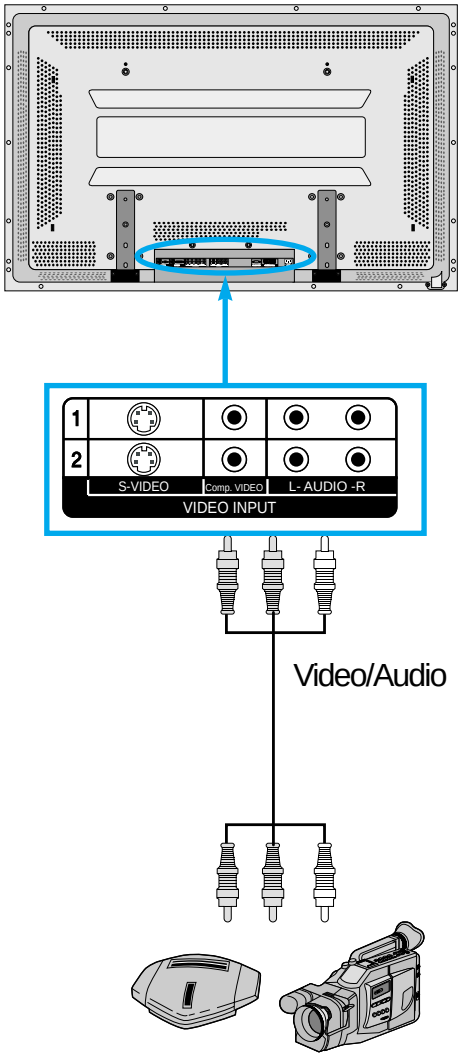
Watching a Camcorder/Game Console Image

• Enjoy images recorded by camcorder or the game console after connecting to the PDP.

1 Connect a Camcorder/Game Console to the PDP.

• Prepare the AV cable.
• Connect the Video(Output) to the PDP(Video Input) as shown below.
• When connecting to an external AV source, match the colors.





Game Console/Camcorder

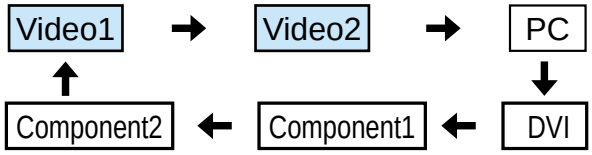
2 Press the Power Buttons

• Turn the PDP and the Camcorder/Game Console ON.

3 Input Select

INPUT SELECT

- Select [Video 1 or Video 2] by pressing the INPUT SELECT button of the Remote Control or the PDP unit.
- Each time you press the INPUT SELECT button, a different input mode appears. The sequence is as follows: Video 1 –> Video 2 –> PC –> DVI –> Component 1 –> Component 2.



4 Select Function

- Select the Function by using the Remote Control of Camcorder or Game Console.

NOTES:

1) When connecting a Video, the S-Video terminal provides a better image than the Video terminal.
2) When connecting to the Video terminal, connect 3 color AV cables (video, left audio, right audio) to the PDP; for the S-Video terminal, connect the Audio terminal (Left, Right) in the same way, and connect the Video terminal by S-Video cable(sold separately).
3) When connecting a component, refer to “Wattching a DVD Image” on page 20-21.

Connecting PC(15pin D-sub)

Connecting PC

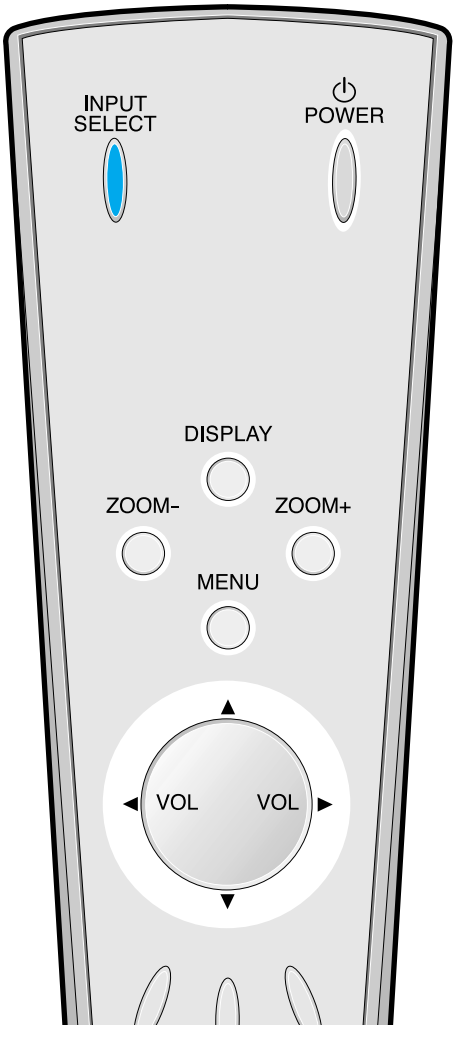
- DAEWOO PLASMA supports resolution of VGA, SVGA, XGA, SXGA, UXGA.
- Before connecting a PC to the PDP, be sure to adjust the resolution of PC.

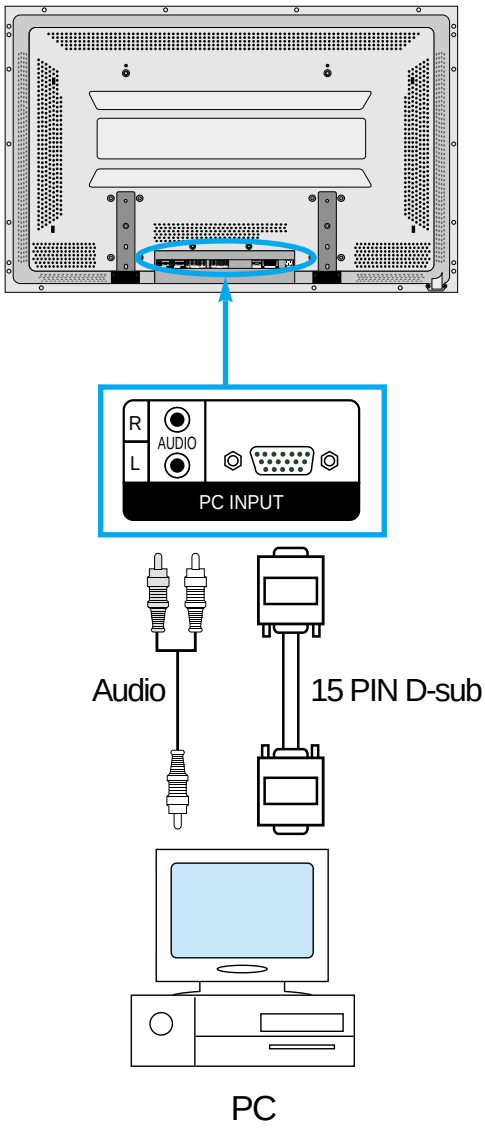
1 Before connecting to the PDP, set the resolution of the PC.

- Go to SETUP-CONTROL PANEL-DISPLAY PROPERTIES in Window Screen.
- Choose the SETTINGS tab in the DISPLAY Menu.
- In the SETTINGS Menu, select (50" : 1024 x 768), (42" : 640 x 480 or 800 x 600).

2 Connect the PC to the PDP.

- Prepare the PC cable (D-sub 15pin) and the PC audio cable(Sold seperately).
- Connect the PC(Output) to the PDP(Input) as shown below.





3 Press the Power button.

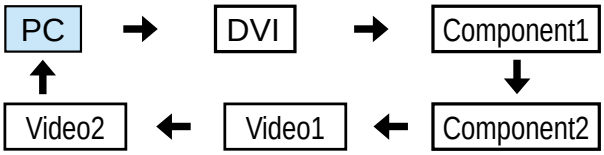
• Turn on the PDP and the PC.

4 Input Select

INPUT SELECT

• Select [PC] by pressing the INPUT SELECT button of the Remote Control or PDP unit.

• Each time you press the INPUT SELECT button, a different input mode appears. The sequence is as follows:
PC -> DVI -> Component 1 -> Component 2 ->Video 1 ->Video 2.



5 Enjoy Dynamic Ultra Screen Monitor by Using PC's Keyboard or Mouse.

NOTES:

1) The resolution of the PC monitor is best at {50" : 1024 x 768 (XGA)}, {42" : 640 x 480 (VGA)}.
2) If there is a [Vertical Frequency]setting menu in the [Display] Menu of the PC, adjust the frequency to 60Hz.
3) If the PC resolution is too high, it may be hard to read letters. Select a suitable resolution.

Connecting PC(DVI)

Connecting PC

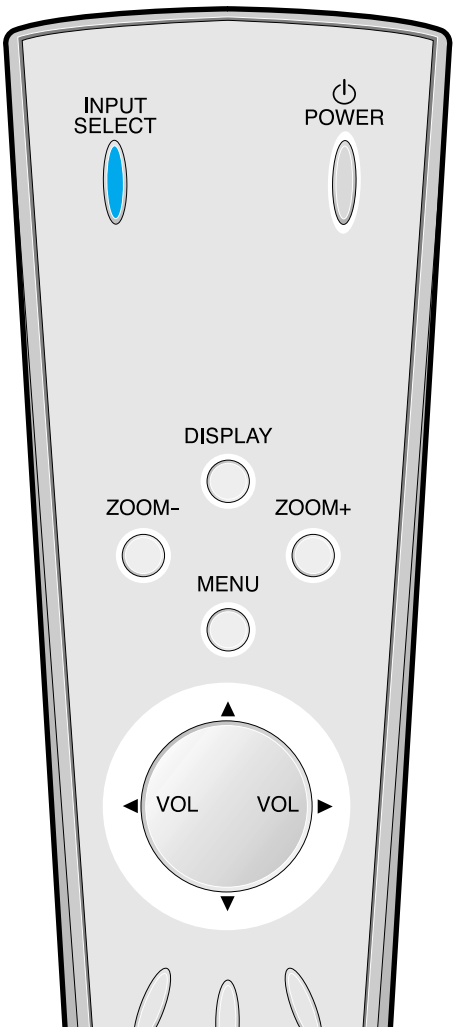
- DAEWOO PLASMA supports resolution of VGA, SVGA, XGA, SXGA, UXGA.
- Before connecting a PC to the PDP, be sure to adjust the resolution of PC.
- This product is not supported by Plug and Play, so select Standard Monitor when setting PC monitor.

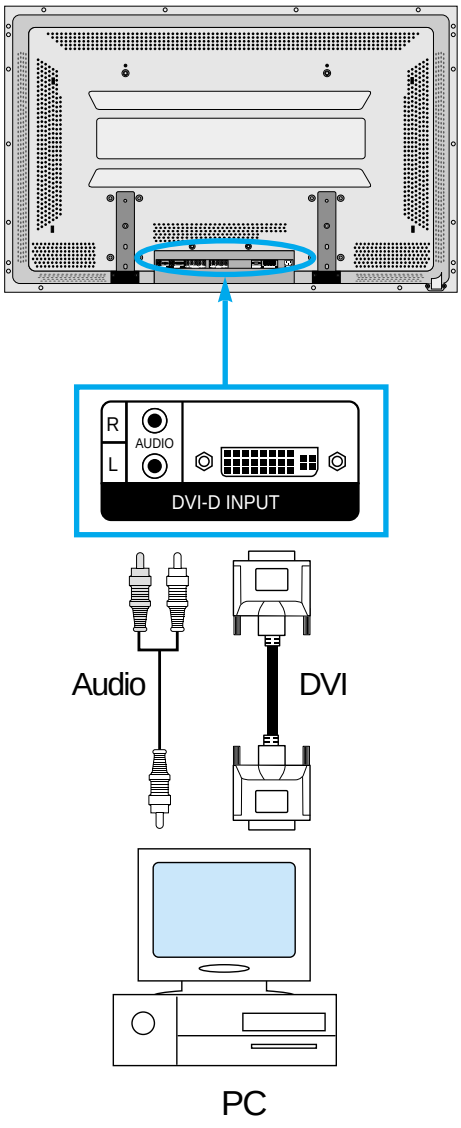
1 Before connecting to the PDP, set the resolution of the PC.

- Go to SETUP-CONTROL PANEL-DISPLAY PROPERTIES in Window Screen.
- Choose the SETTINGS tab in the DISPLAY Menu.
- In the SETTINGS Menu, select (50" : 1024 x 768), (42" : 640 x 480 or 800 x 600).

2 Connect the PC to the PDP.

- Prepare the DVI cable and the PC audio cable(Sold seperately).
- Connect the PC(Output) to the PDP(Input) as shown below.





3 Press the Power button.

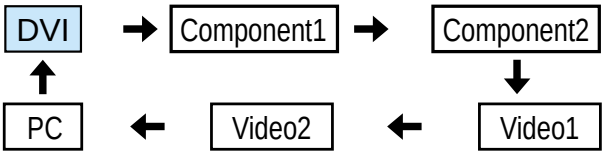
• Turn on the PDP and the PC.

4 Input Select

INPUT SELECT

• Select [DVI] by pressing the INPUT SELECT button of the Remote Control or PDP unit.

• Each time you press the INPUT SELECT button, a different input mode appears. The sequence is as follows:
DVI –> Component 1 –> Component 2 –> Video 1 –> Video 2 –> PC.



5 Enjoy Dynamic Ultra Screen Monitor by Using PC's Keyboard or Mouse.

NOTES:

1) The resolution of the PC monitor is best at {50" : 1024 x 768 (XGA)}, {42" : 640 x 480 (VGA)}.
2) If there is a [Vertical Frequency]setting menu in the [Display] Menu of the PC, adjust the frequency to 60Hz.
3) If the PC resolution is too high, it may be hard to read letters. Select a suitable resolution.
4) DVI input port receive only Digital Signal.
5) Depending on the graphic card when plug & unplug the DVI connection the screen may not display correctly. Restart the computer if this happens.

PC and DVI Input Resolution Available in PDP

• According to the kind of graphic card, there is no picture of pc input and some problems like line noises can happen in picture. If these problems happen, ask to a graphic card company.

Resolution	Horizontal Frequency(KHz)	Vertical Frequency(Hz)	Remark	DVI	PC
640x350	31.469	70.1	IBM		O
	37.861	85.1	VESA		O
640x400	24.823	56.4	NEC		O
	30.48	60.0	PGA		O
	31.469	70.1	IBM (DOS)		O
	37.861	85.1	VESA		O
640x480	31.469	59.9	DOS	O	O
	35	66.7	Macintosh	O	O
	37.861	72.8	VESA	O	O
	37.5	75.0	VESA	O	O
	39.375	75.0	IBM		O
	43.269	85.0	VESA	O	O
720x400	31.47	60.1	VGA		O
	31.469	70.1	IBM	O	O
	37.927	85.1	VESA		O
720x480	31.54	60.0	480P		O
720x576	15.63	25.0	PAL		O
800x600	35.156	56.3	VESA	O	O
	35.16	57.2	VESA		O
	37.879	60.3	VESA	O	O
	48.077	72.2	VESA	O	O
	46.875	75.0	VESA	O	O
	53.674	85.1	VESA	O	O
832x624	49.726	74.0	Macintosh	O	O
1024x768	48.193(48.077)	59.3(59.8)	Macintosh (OAK)		O
	48.363	60.0	VESA	O	O
	53.95	66.1	XGA		O
	56.476	70.1	HP & VESA	O	O
	60.241	74.9(74.6)	Macintosh		O
	60.023	75.0	VESA	O	O
	68.677	85.0	VESA		O
	80.66	100.0	Fujitsu		O
	70.84	84.0	SUN		O
1152x864	54	60.0	VAX	O	O
	63.851	70.0	VESA		O
	67.5	75.0	VESA	O	O
	77.094	85.0	VESA		O
1152x900	61.796	66.0	SUN		O
	71.713	76.0	SUN		O
1280x720	45	60.0	720P		O
1280x960	60	60.0	VESA	O	O
	75	75.0	VESA	O	O
	85.938	85.0	VESA		O
1280x1024	46.433	43.4	VESA		O
	63.981	60.0	VESA	O	O
	70.66	66.5	VAX		O
	74.88	70.0	NEC		O
	78.125	72.0	HP & HITA		O
	78.855	74.0	Sony & NEC		O
	79.976	75.0	VESA	O	O
	81.13	76.1	SUN	O	O
	91.416	85.0	VESA		O
1600x1200	62.5	48.0	VESA		O
	75	60.0	VESA	O	O
	81.25	65.0	VESA		O
	87.5	70.0	VESA		O
	93.75	75.0	VESA		O
	100	80.0	VESA		O

Selecting Picture Mode

1 Selecting Picture Mode

PICTURE MODE

- Press the [PICTURE MODE] on the Remote Control.
- Pressing the [PICTURE MODE] first time will display the current PICTURE MODE.

2 Each Press of the Button Will Select One of Four Picture Modes.

PICTURE MODE

- Each time you press the button, a different Picture mode appears. The sequence used is as follows:

Normal ➜ Dynamic ➜ Cinema ➜ User

* Normal : For a highly defined image in a normally bright room
* Dynamic: For a clear-cut image emphasizing high contrast for sports viewing
* Cinema: For a movie
* User: Allows the user to customize settings as desired.

3 Menu on the Screen Will Disappear.

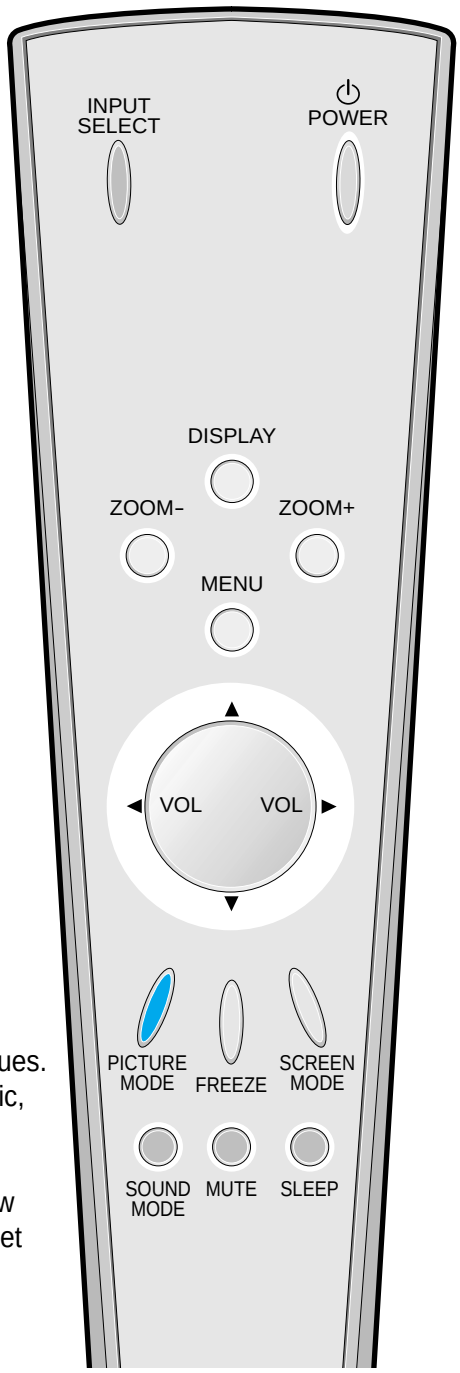
- After selecting a desired Picture mode, the menu on the screen will disappear.
- Normal, Dynamic, and Cinema Modes are factory preset values.
  If you want to customize the Picture modes, refer to the following page.

NOTES:

1) Normal, Dynamic, and Cinema Modes are factory preset values.
2) When adjusting sub-menus while you are in Normal, Dynamic, and Cinema Modes, the Picture Mode will be automatically converted to User Mode, and the adjustments will be made.
3) Pressing of the [Initialize] button in the [Utility] Menu will allow for the Brightness, Contrast, etc. to return to the factory preset values.

Selecting Picture Mode

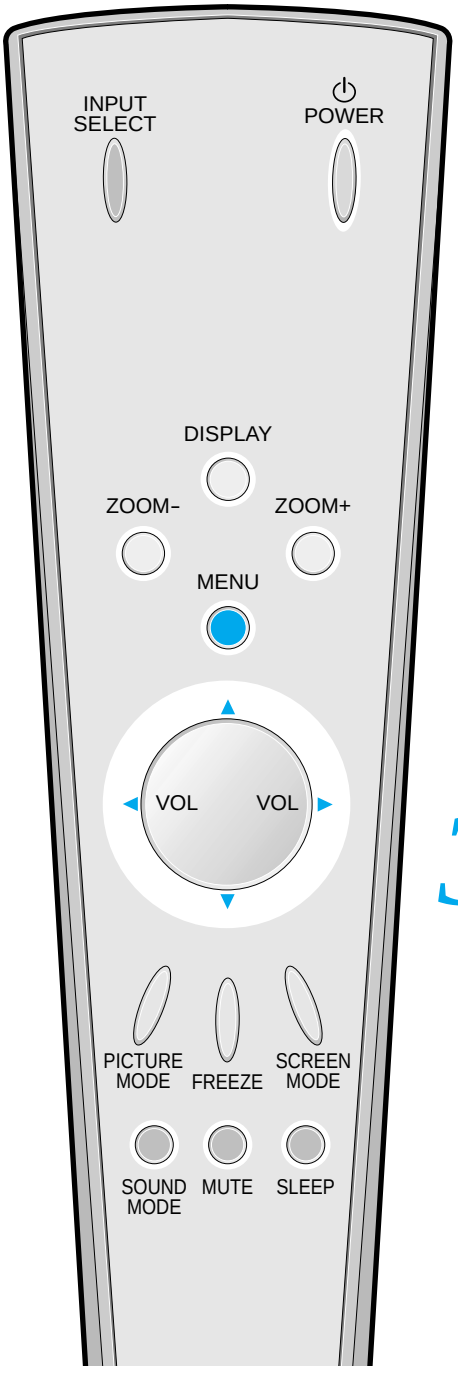
- Select the Picture modes that are appropriately set depending on the kinds of pictures, and enjoy them.



Customizing Picture

Customizing Picture

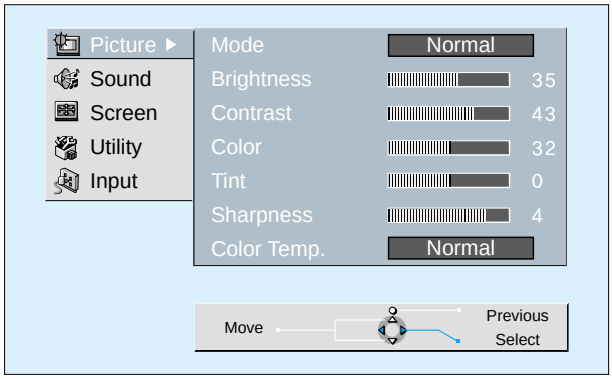
• You can adjust the color tone and brightness to your preference.



1 Press the MENU Button.

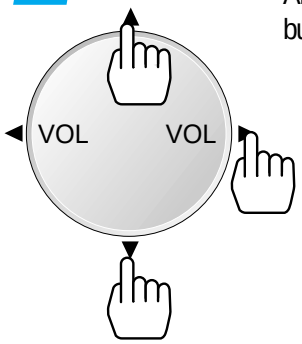
• The MENU shown below will display on the screen.

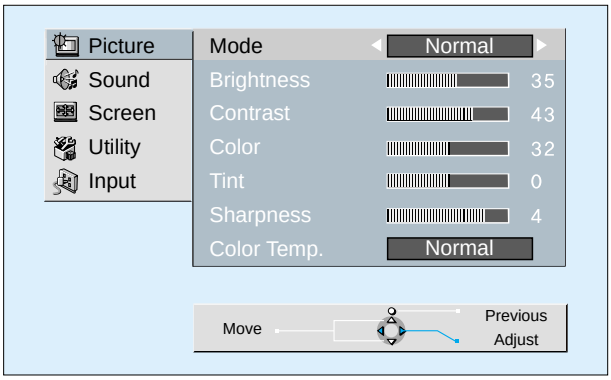
MENU



2 Press the ▲/▼ Button.

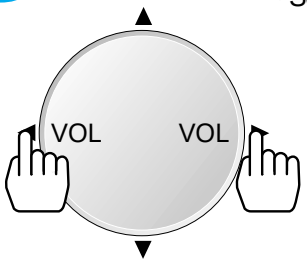
• After selecting [Picture] by the ▲/▼ buttons, press the ▶ button that will display the following.

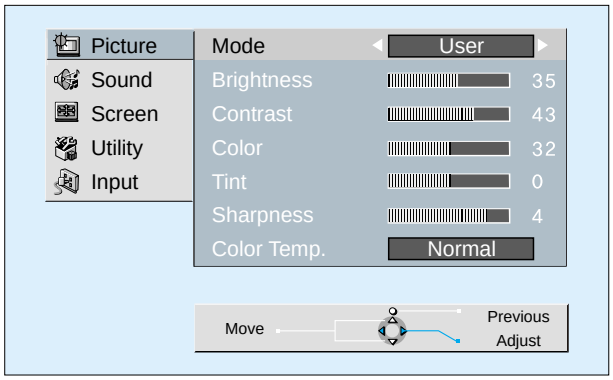




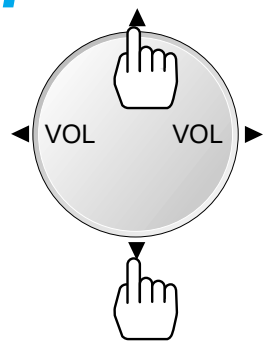
3 Select the Custom Mode.

• Select [User] by the ◀/▶ buttons.

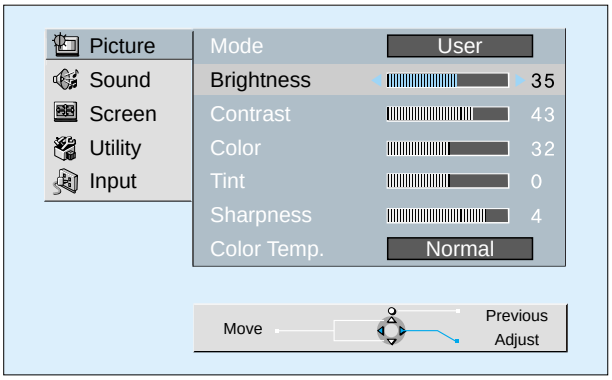




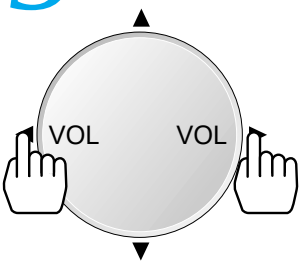
4 Select User Mode Adjustments



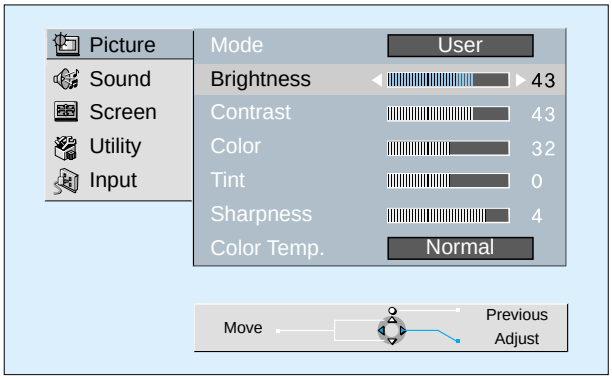
• While you are in [Picture Mode – User], press the ▲/▼ buttons to select a specific adjustment item.



5 Picture Condition Adjustments



• Press the ◀/▶ buttons to adjust the picture at your preference.



NOTES:

1) While you are in the PC or DVI INPUT mode, you can only adjust brightness, contrast, sharpness and color temperature.
2) When you adjust Brightness, Contrast, Color, Tint in DTV mode or adjust Brightness, Contrast in PC or DVI mode, the picture is adjusted finely.
3) The adjusted values are memorized in each mode seperately.
4) The Tint control is used only when the input signal is NTSC If input signal is NTSC, Tint control is displayed in picture menu.
5) The Sharpness Menu adjusts the picture sharpness.
6) Adjusting the Color Temperature makes the mood warm or cold.

Adjusting Screen Size

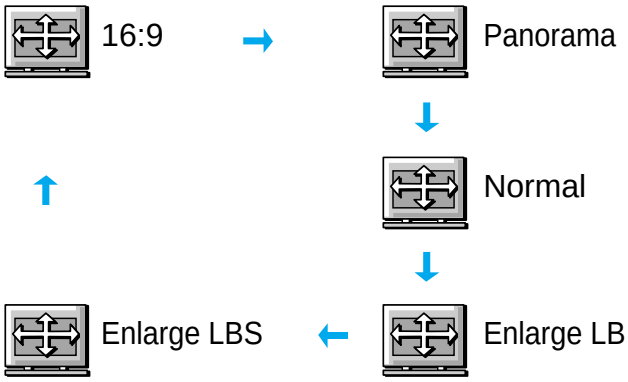
Adjusting Screen Size

• You can adjust screen size or aspect ratio as desired.

1 Press the SCREEN MODE Button.

SCREEN MODE

• Each time you press the SCREEN MODE button on the Remote Control, a different SCREEN MODE appears. The sequence used is as follows:
• The MENU shown below will display on the screen.



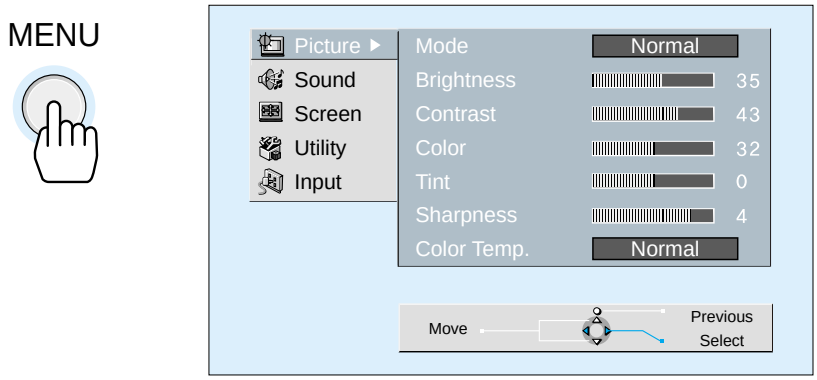
NOTES:

1) When the INPUT SIGNAL is DTV [in Component 1 or Component 2], only the aspect ratios of 16:9 and 4:3(Normal) will be applied by Input signal.
   Etc) If input signal is 16:9, PDP displays in 16:9 mode.
2) The digital broadcasting (720p, 1080i) is fixed at the aspect ratio of 16:9.
3) Displaying a picture in a normal mode (4:3) for a long time may cause phosphor of the PDP to be burned. So avoid displaying a picture in 4:3 screen size for a long time.
4) 16:9 : Theater-like 16:9 picture formats
   Panorama : 16:9 picture formats with panorama effect
   Normal : Displays pictures of original picture size.
   Enlarge LB : Enlarges the screen as to fill the black part of up and down.
   Enlarge LBS : Enlarges the screen, and shifts up as to see the subtitles in case you are watching video with subtitles.

Adjusting from MENU Screen

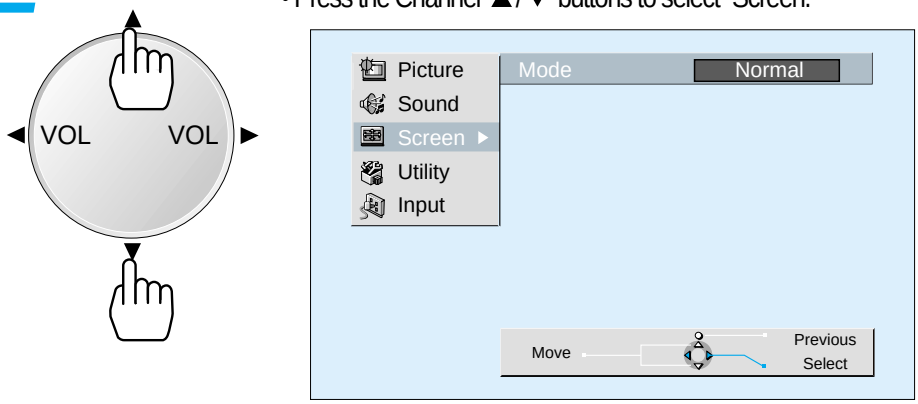
1 Press the MENU Button.

• Press the [MENU] button on the Remote Control.



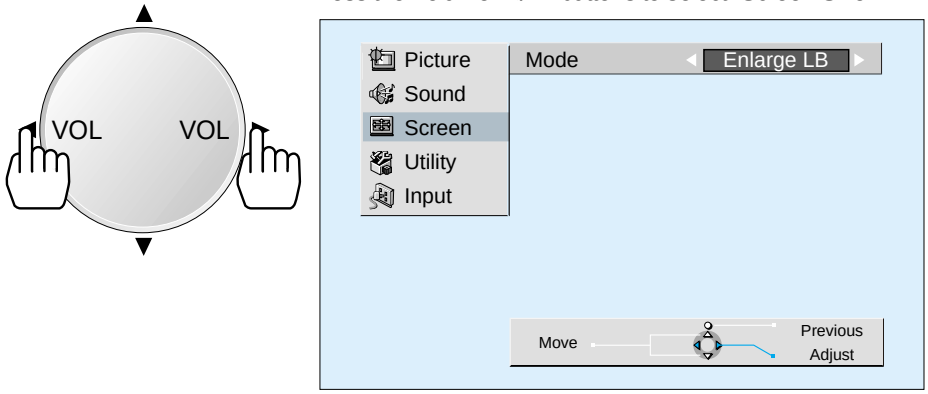
2 Select “Screen”.

• Press the Channel ▲/▼ buttons to select “Screen.”



3 Select the Screen Size.

• Press the Volume ◀/▶ buttons to select “Screen Size”.



• Available Screen Mode

Input	Available Mode
PC,DVI	None
Component (480p or above)	16:9, Normal
Video 1 Video 2 Component (480i)	16:9, Panorama Normal Enlarge LB Enlarge LBS

Adjusting Screen Position and Size

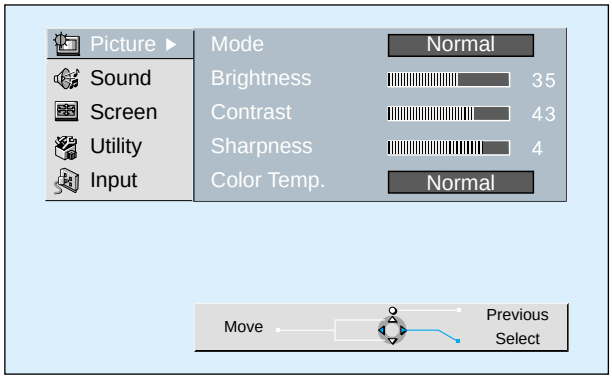
Adjusting Screen Position and Size

- You can adjust the screen position and size as desired.
- This function is only used when adjusting the screen position and size on the PDP monitor by using the PC or DVI input signal.

1 Press the MENU Button.

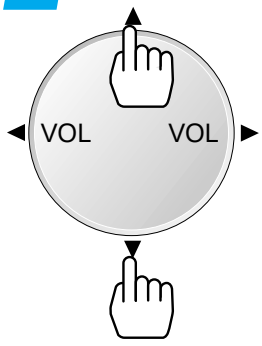
- The MENU screen as shown below will appear.

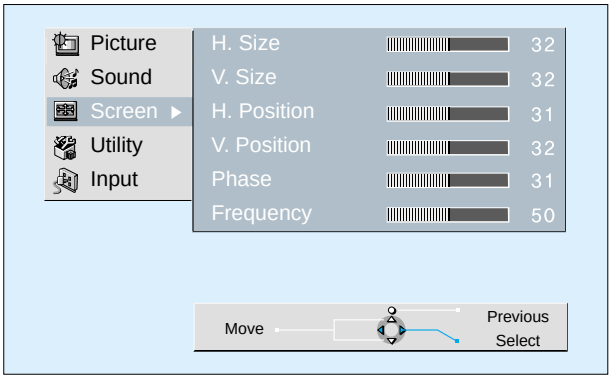
MENU



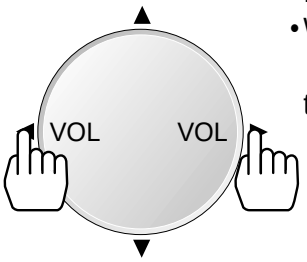
2 Press the ▲/▼ Button.

- Press the ▲/▼ buttons to select 'Screen'.

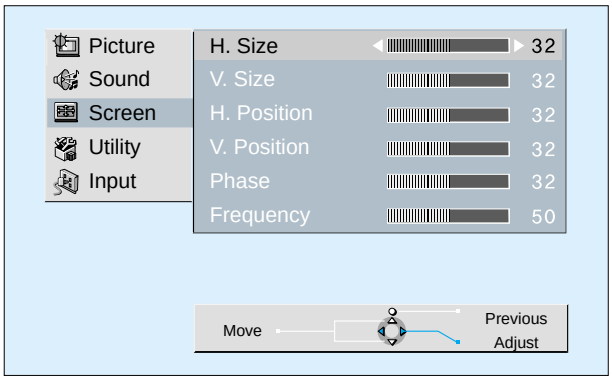




3 Press the Volume ◀/▶ Buttons.



- Press the Volume ◀/▶ buttons to select "Screen".
- While you are in 'Screen' mode, press the ▲ or ▼ button to select a desired item, and then, adjust the value by pressing the ◀ or ▶.



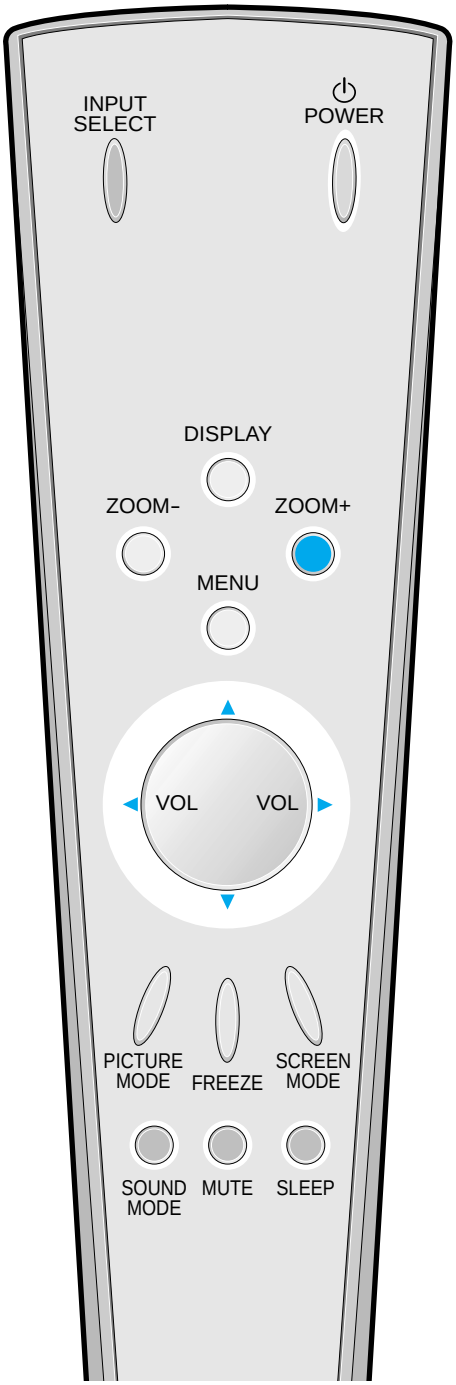
NOTES:

1) Horizontal/Vertical size and position values can be adjusted only in the [PC] or [DVI] input mode.
2) H. Size: As the value increases, the screen width increases
3) V. Size: As the value increases, the screen height increases.
4) H. Position: Increasing value moves screen to the right.
   As the value increases, the screen moves to the right.
5) V. Position: Increasing value moves screen up.
   As the value increases, the screen mores up.
6) Phase: When there are zitter or blurring in image, adjust this value.
7) Frequency: When there are zitter or blurring in image, adjust this value.

Enlarging Screen Size

Enlarging Screen Size

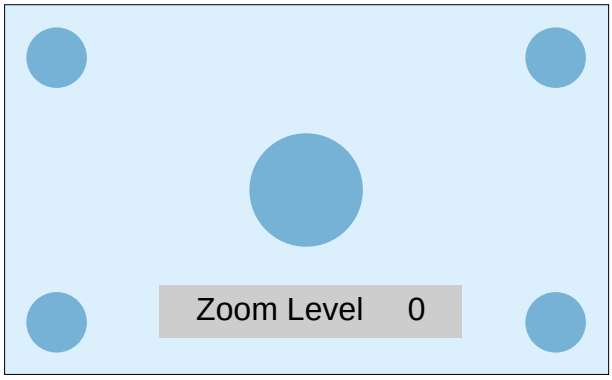
- You can view enlarged size of the screen with this function



1 Press the 'ZOOM+' Button.

ZOOM+

- Press the 'ZOOM+' button to show currently selected screen size.
- Each time you press the 'ZOOM+' button, the screen size will increase stepwise in 0 ~ 20 scale.
- To reduce the screen size, press the [ZOOM-] button.



Zoom Level 0

↓

Zoom Level 5

↓

Zoom Level 10

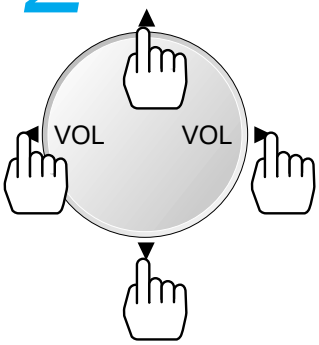
↓

Zoom Level 15

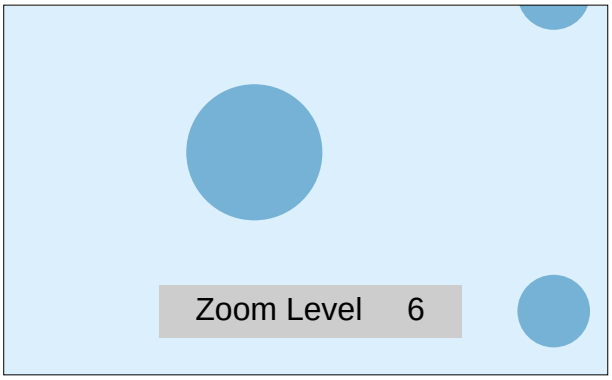
↓

Zoom Level 20

2 Move the Screen Position.



• While you are in the 'Zoom' mode, press the ▲/▼, ◀/▶ buttons to move screen stepwise up/down, left/right, respectively.



NOTES:

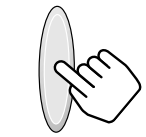
1) When the screen is enlarged, the pixel of the screen can become thick and dim.
2) When only subtitle of zoom level remains, you can scroll the image.
   If subtitle of zoom level disappears, press zoom key, and scroll the image.
3) You can enlarge the screen on freeze mode.

Watching a Still Image

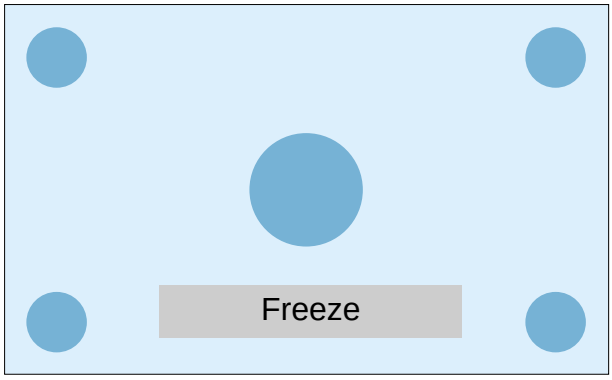
Watching a Still Image

- You can view still images temporarily with this function. However, displaying the same images such as still images for a long time may cause image sticking.

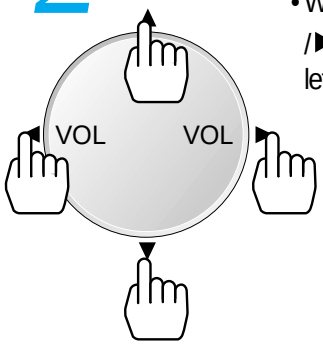
1 Press the 'FREEZE' Button.



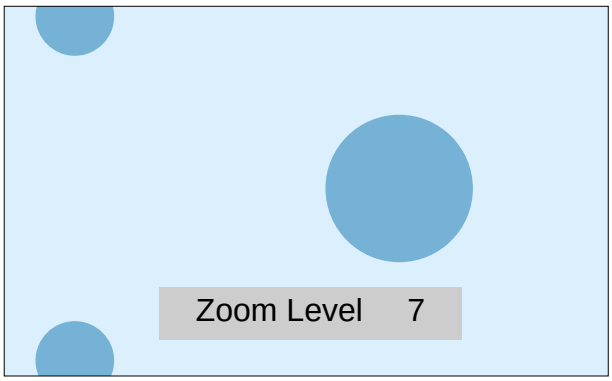
- If you wish to freeze a picture, press the 'FREEZE' button. You can still hear the sound.
- Press FREEZE button to cancel the 'FREEZE' function.
- To view the enlarged images, press the [ZOOM+] button.



2 Move the Screen Position.



- While you are in 'FREEZE' mode, press the ▲/▼, ◄/► buttons to move screen stepwise up/down and left/right.



NOTES:

1) Displaying the same images such as still images for a long time may cause image sticking (after-image lagging).
2) In this case, such "image sticking" may become less noticeable if moving images are later displayed for a long time.
3) However, an image sticking may become a permanent one, damaging the Plasma Display; therefore, avoid displaying the same images for a long time.
4) Use the function [ISM], while displaying still images for a long period of time to minimize this effect.

Adjusting Auto Sound Mode

1 Select SOUND Mode.

- Press the [SOUND MODE] on the Remote Control.
- Press of the [SOUND MODE] for the first time will display the current SOUND MODE.

2 Every Press of the Button Changes Modes.

- Each time you press the button, a different sound mode appears. The sequence used is as follows:

Normal ➜ Movie ➜ Music ➜ News ➜ User

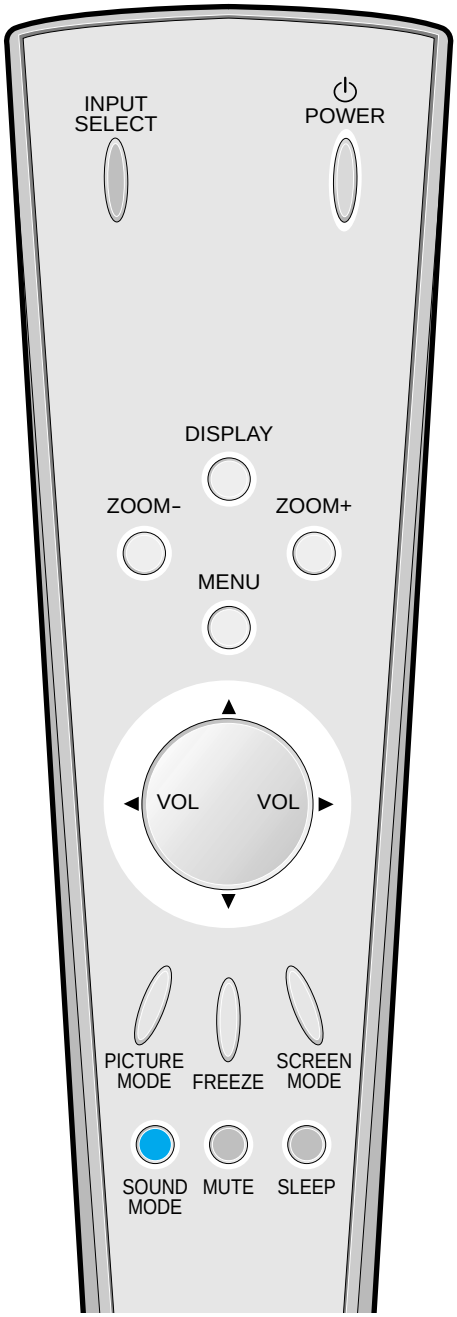
* Normal : Suitable for watching any motion picture
* Movie : Select this mode to simulate being at a movie theater
* Music : Ideal for listening to music
* News : Allows human voice to be heard more clearly
* User : Allows the user to adjust as desired.

3 MENU will Disappear.

- After selecting a desired SOUND Mode, on-screen menu will disappear in about 2~3 seconds.
- Normal, Movie, Music, News Modes are factory preset values. If you want to customize the sound modes at your preference, refer to the following page.

Adjusting Auto Sound Mode

- Enjoy various sound modes by selecting your favorite Sound Mode depending on the kinds of moving pictures.



Customizing Sound Mode

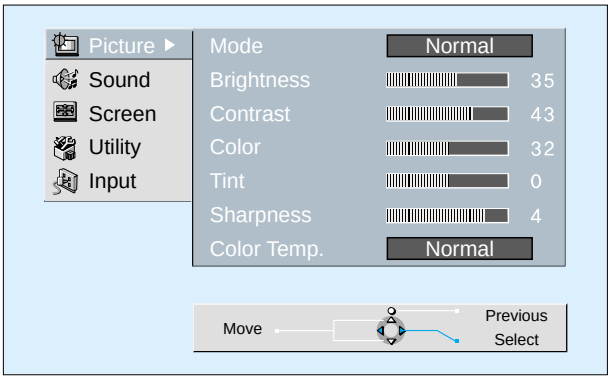
Customizing Sound Mode

• This feature allows the user at adjust at his preference.

1 Press the MENU Button.

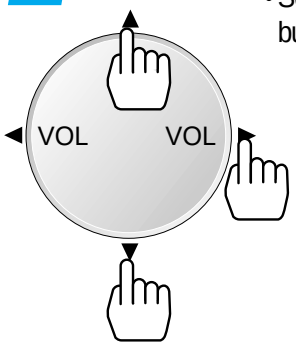
• The MENU Screen as below will be displayed.

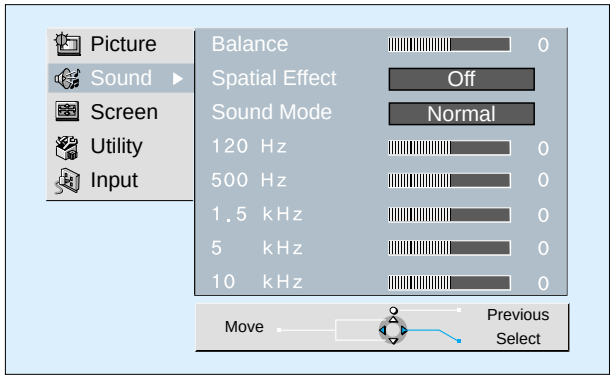
MENU



2 Press the ▲/▼ Button.

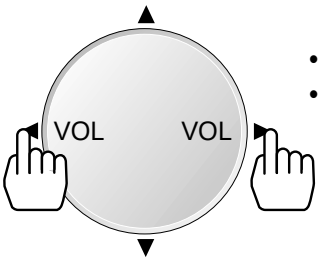
• Select [Sound] by the ▲/▼buttons, then press the ▶ button to display the following.

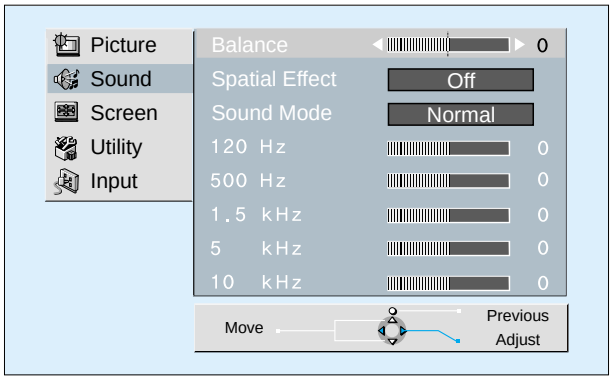




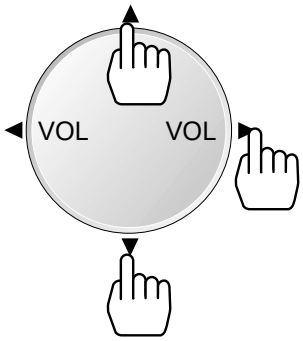
3 Select SOUND BALANCE.

• Select [Sound Balance] by the ◀/▶ buttons, then adjust it.
• Sound balance is best at '0'.
• Sound Balance: Adjusts sound balance of left and right speaker.

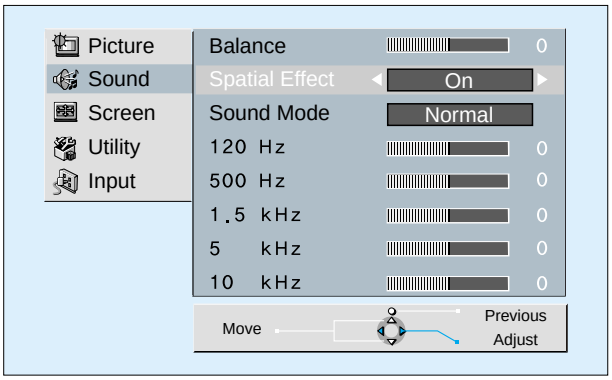




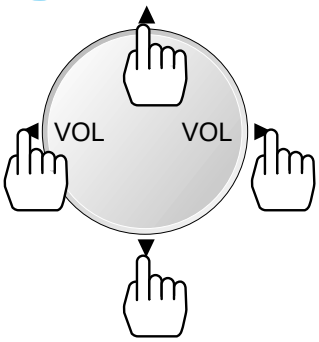
4 Select the Spatial Effect Mode.



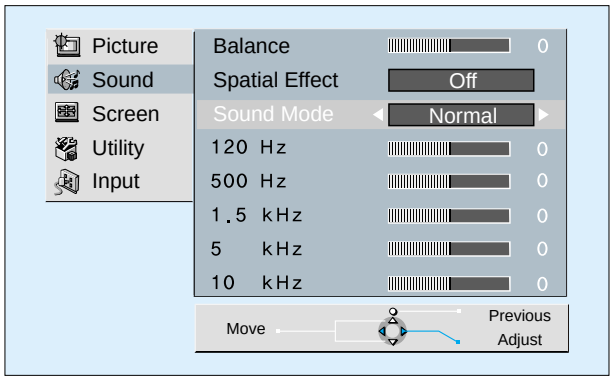
- Select Spatial Effect by pressing the ▲/▼ buttons, then select ON/OFF by pressing the ► button.
- Spatial Effect: Used to feel grotesque by emphasizing stereo effect.



5 Select the Sound Mode.



- Select the Sound Mode by pressing the ▲/▼ buttons, then adjust it by pressing the ◄/► buttons.



Normal ➜ Movie ➜ Music ➜ News ➜ User

* Normal : Suitable for watching any motion picture
* Movie : Select this mode to simulate being at a movie theater
* Music : Suitable for listening to music
* News : Allows human voice to be heard more clearly
* User : Allows the user to adjust as desired.

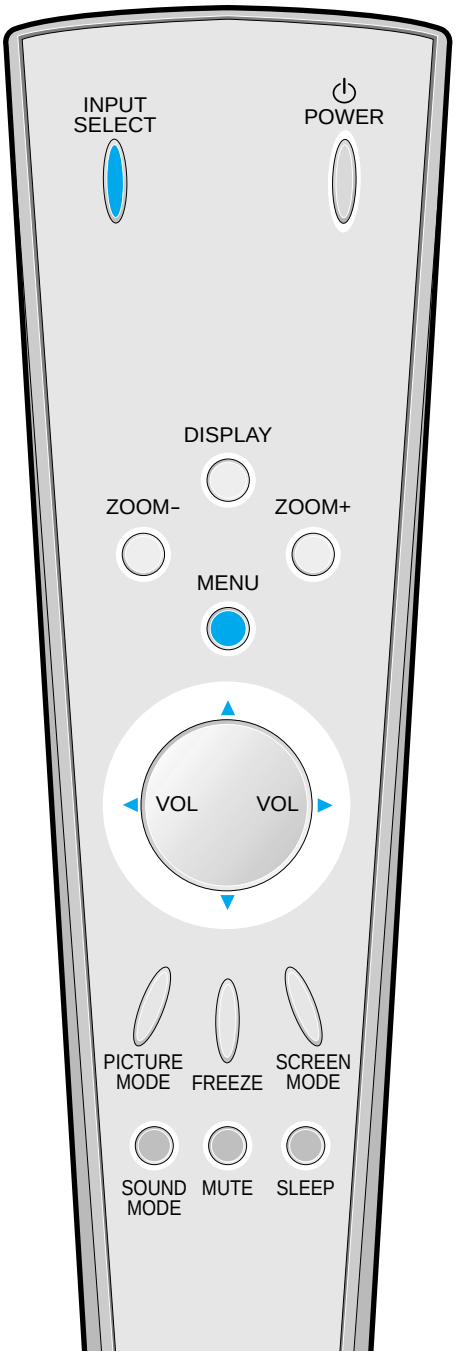
NOTES:

1) Custom Mode : Used as an Equalizer with which the user can adjust the sound frequency as desired.
2) If you modify the sound frequency in auto Sound Mode (News, Movie, Music, etc.), it is automatically switched to the User Mode.
3) Low frequency is emphasized as the frequency is lowered to 120 Hz, and high frequency as raised to 10 KHz.
4) When INPUT is MONO and if you make connection to the Left Audio Input, you can hear from both speakers.

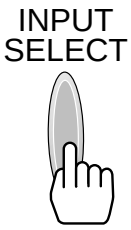
Selecting INPUT SIGNAL

INPUT SIGNAL

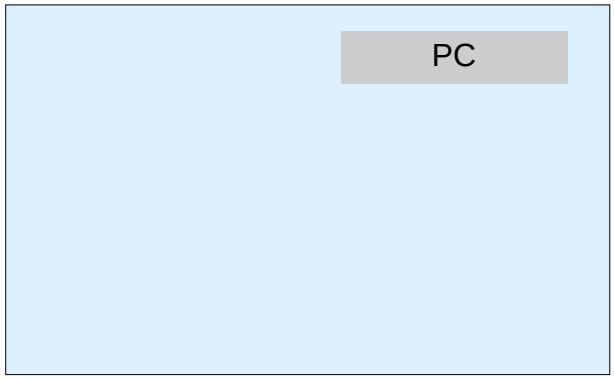
- Used to select INPUT signal of external device connected to the PDP.

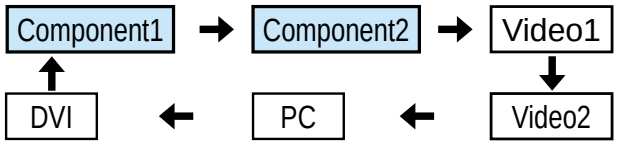


1 Press the INPUT SELECT Button.



- Press the [INPUT SELECT] button on the Remote Control or the PDP Display to select desired input signal.
- Each time you press the [input select] button, a different screen mode appears. The sequence used is as follows: COMPONENT 1 –> COMPONENT 2 –> VIDEO 1 –> VIDEO 2 –> PC –> DVI





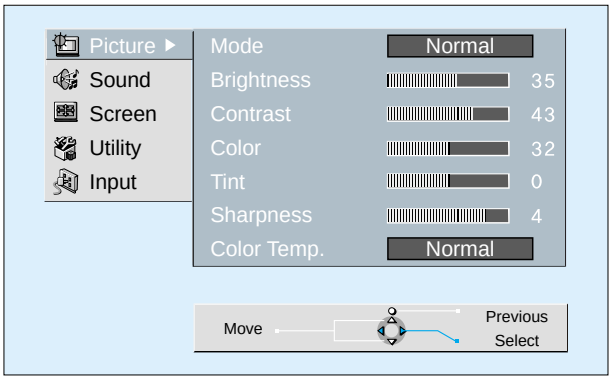
NOTES:

1) If an external device is not connected or INPUT signal is not applied, Warning Message (“No Signal”) would be displayed.
2) In this case, check if external device is connected and/or terminal connection is properly done.

1 Press the MENU Button.

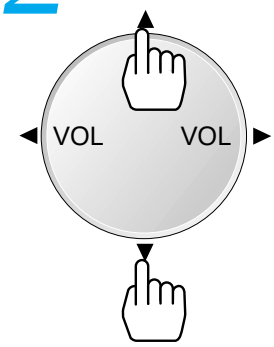
• Press the [MENU] button on the Remote Control.

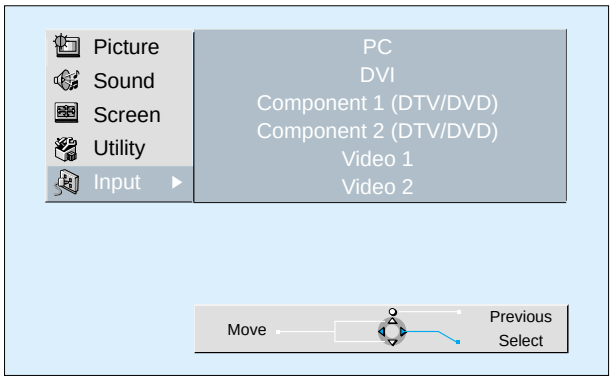
MENU



2 Select Input.

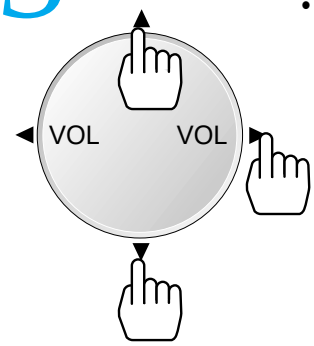
• Select [Input] by the ▲/▼ button.

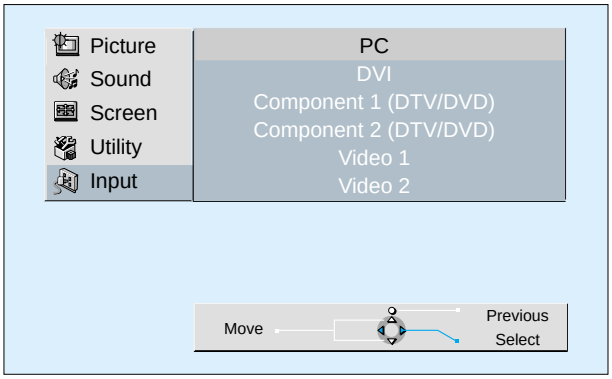




3 Select Input Signal.

• Select [Input Signal] by the ▲/▼ buttons, then press the ▶ button.

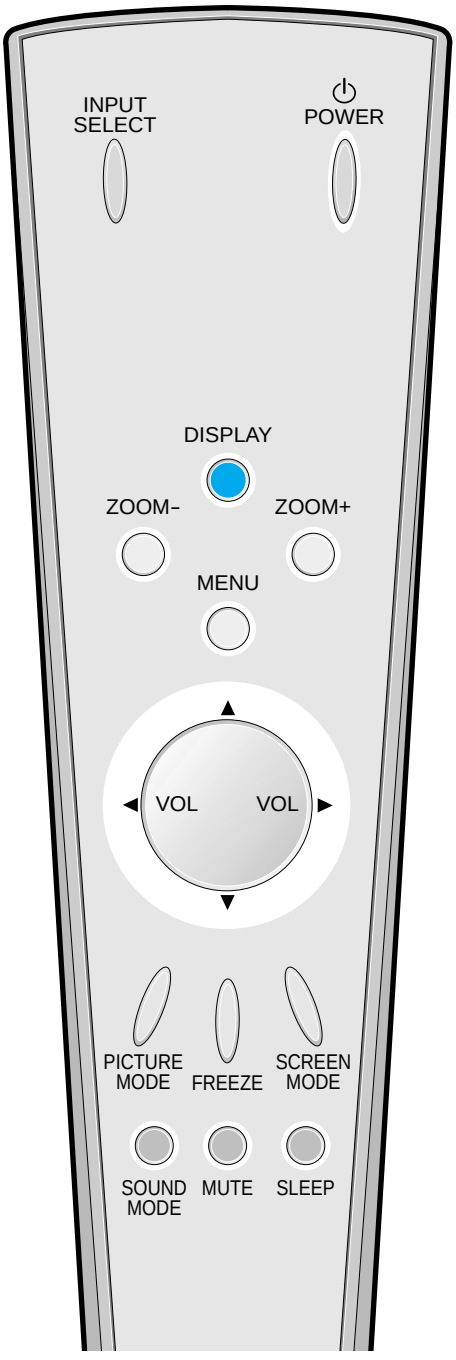




Checking the Current Input Signal

Checking the Current Input Signal

• Used to check the INPUT signal mode, resolution, frequency, etc. of the current screen.



1 Press the DISPLAY Button.

• Press the [DISPLAY] button on the Remote Control.

DISPLAY

Component 1
1920 x 1080
60 Hz

1. If you watch Digital Broadcasts:

Component 1 → Displays which input terminal is used, and indicates the input signal mode.
1920 x 1080 → Indicates the horizontal and vertical resolution of the current INPUT signal.
60 Hz → Indicates the frequency of the current INPUT signal.

2. If you watch DVD image:

Component 2 → Displays which input terminal is used, and indicates the signal mode.
YUV 60 Hz → Indicates the mode and frequency of the current INPUT signal.

3. If you watch VCR image:

Video 1 → Displays which input terminal is used, and indicates the signal mode.
NTSC 60 Hz → Indicates the mode and frequency of the current INPUT signal.

NOTES:

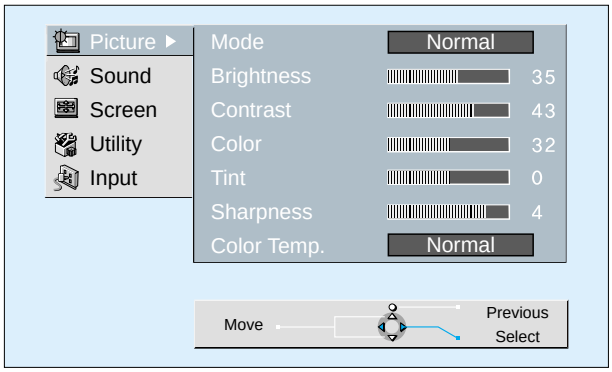
1) DAEWOO PLASMA can receive NTSC, PAL, SECAM, etc.
2) “1920 x 1080” displayed in the INPUT signal does not indicate the resolution of the monitor, but the signal that is sent by Digital Broadcasting Receiver.

Selecting MENU Background Screen and Language

1 Press the MENU Button.

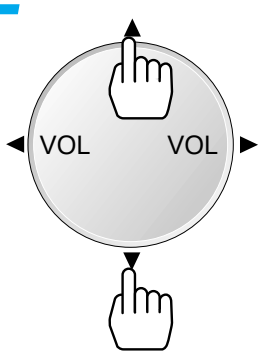
• The MENU screen will be displayed as below.

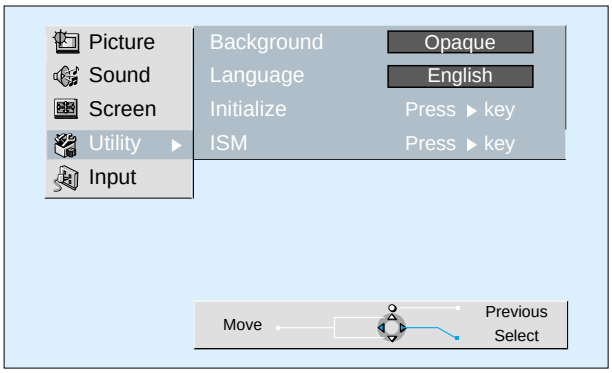
MENU



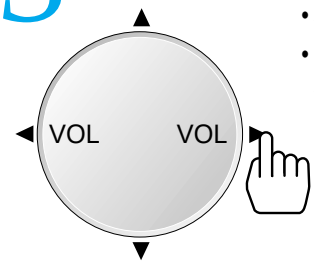
2 Press the ▲/▼ Button.

• Select [Utility] by the ▲/▼ button.



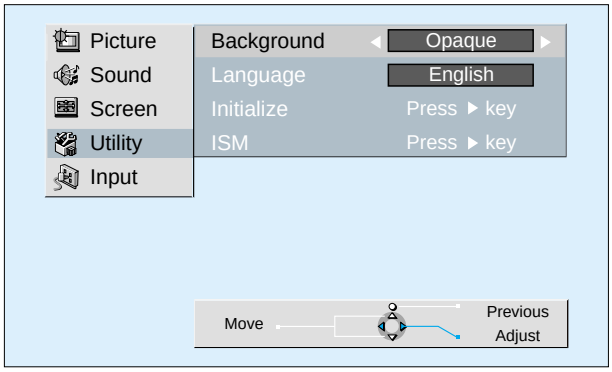


3 Select the menu Background Screen.



• Select the MENU [Background Screen] by pressing the ▶ button.

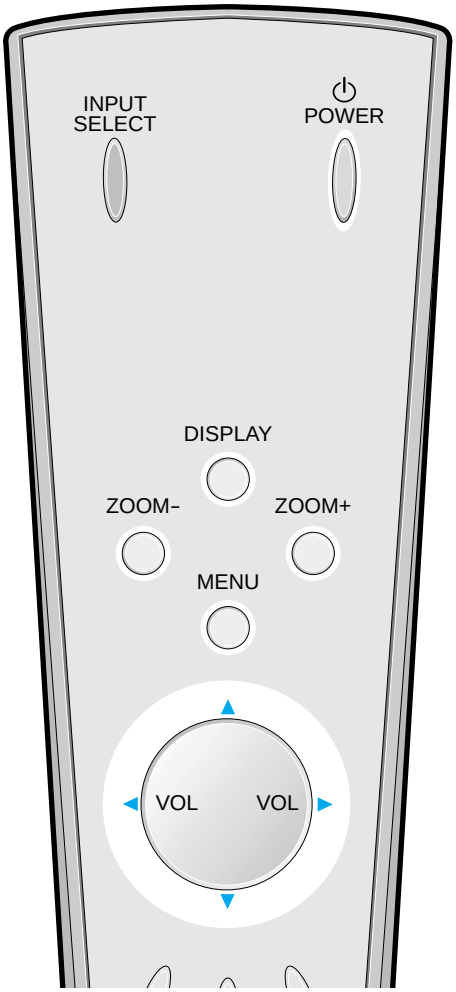
• Every press of the▶ button while you are in the[Background Screen] would switch between Trarslucent/Opaque.



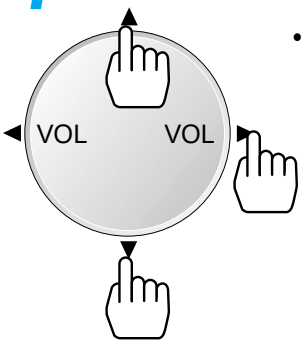
Selecting Languages

• Used to select transparency of the background screen and language used in MENU.

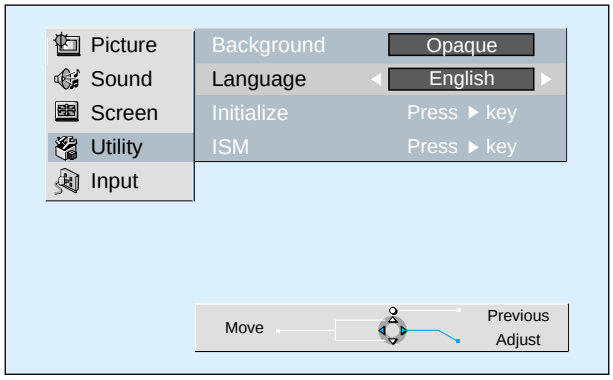
Selecting MENU Background Screen and Languages



4 Select MENU LANGUAGE SELECT by the ▲/▼ Button.



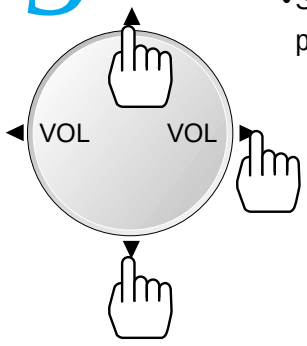
- Select LANGUAGE by the ▲/▼ button.
- Every press of the ▶ button while you are in the [LANGUAGE] mode would cycle through the different languages.



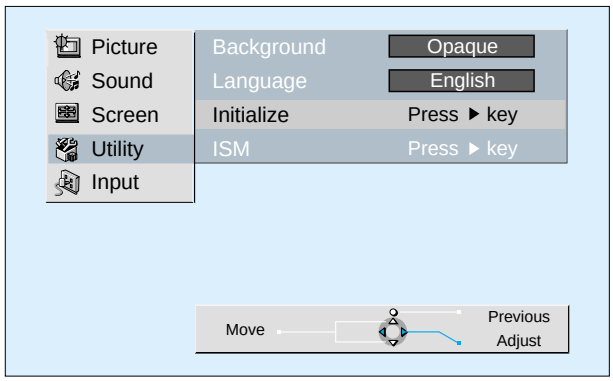
NOTES:

* When Power is turned ON first time, 'SELECT LANGAUGE' Mode will be displayed, then, select a desired language by ▶ button. (Displayed only once)

5 INITIALIZATION will Start.



- Select [INITIALIZATION] by the ▲/▼ buttons, then press the ▶ button to start initialization.



When [INITIALIZATION] is completed:

1) When [INITIALIZATION] is completed, those values that have been set in the User Mode of [SCREEN MODE] and [SOUND MODE] will be returned to the factory preset values.
2) When you try to initialize, be advised that you should think it over.
3) The items in the [SCREEN] Menu in PC or DVI INPUT are also initialized (i.e., H. Size, V. Size, H. Position, V. Position, Phase, Frequency, etc.)
4) Language, volume, OSD background, input mode are not initialized.

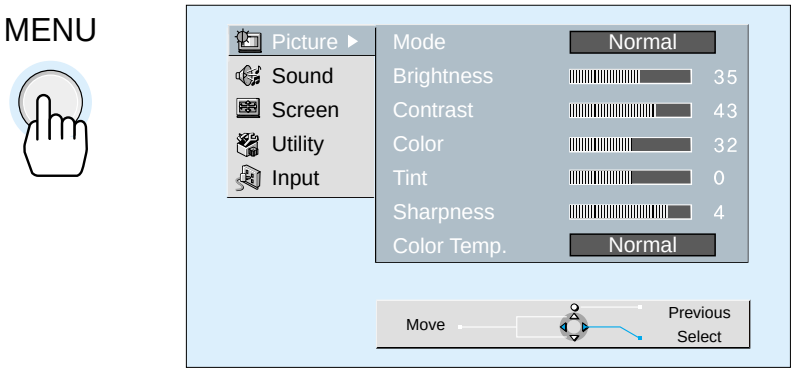
Back to Initialization

- You can restore the values of the adjustment/setting made in the MENU to factory settings.

Selecting Image Sticking Minimization

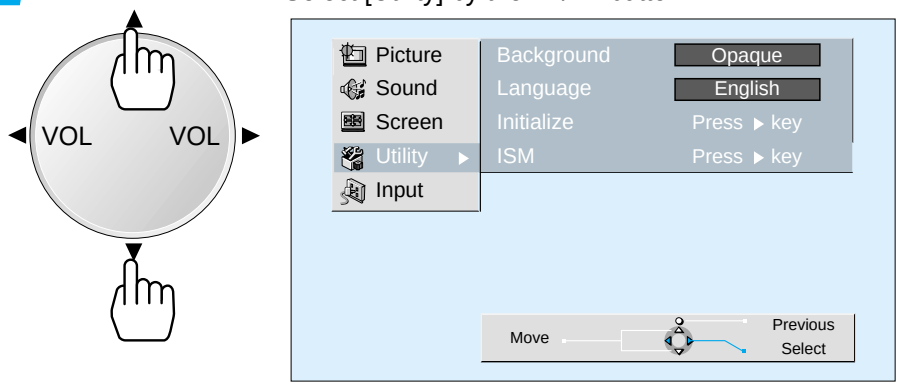
1 Press the MENU Button.

• The MENU screen will be displayed as below.



2 Press the ▲/▼ Button.

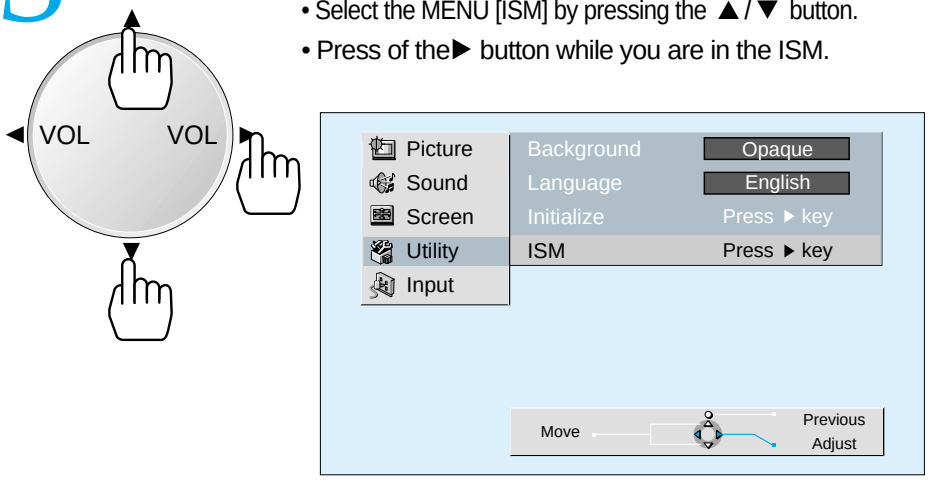
• Select [Utility] by the ▲/▼ button.



3 Select the MENU ISM SCREEN.

• Select the MENU [ISM] by pressing the ▲/▼ button.

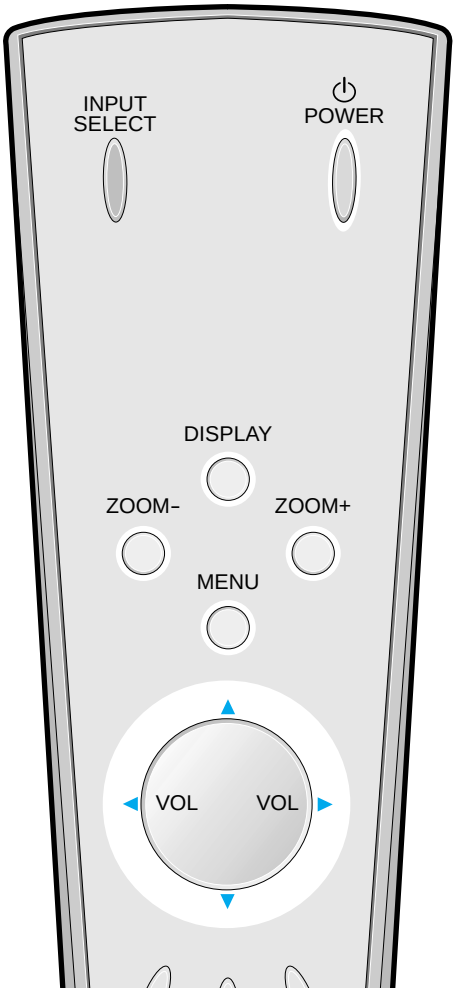
• Press of the▶ button while you are in the ISM.



ISM

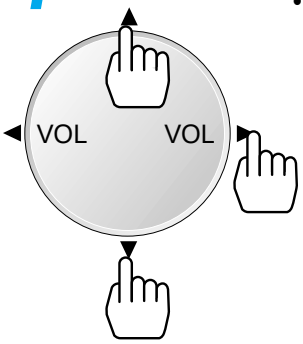
- Image sticking minimization.
- Displaying a still image like PC input for a long time causes part image sticking in the panel
- The ISM function minimize this effect.

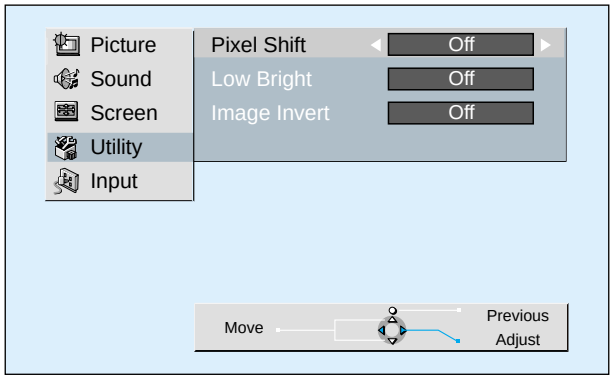
Selecting Image Sticking Minimization



4 Select Functions.

- Every press of the ▶ button after select function by the ▲/▼ button would switch between ON/OFF.





NOTES:

* **Pixel Shift** : The whole screen shifts up/down, left/right at 10sec interval to minimize image sticking.

* **Low Bright** : When displaying a stand picture or a fixed pattern for a long time, brightness level decreases to minimize image sticking. Return to the original brightness level if picture change or mode off.

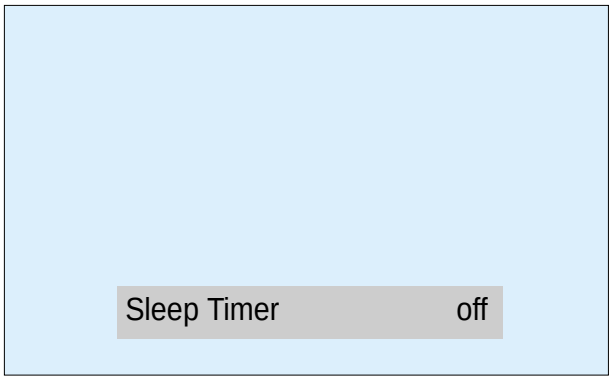
* **Image Invert** : Displays inverted image.

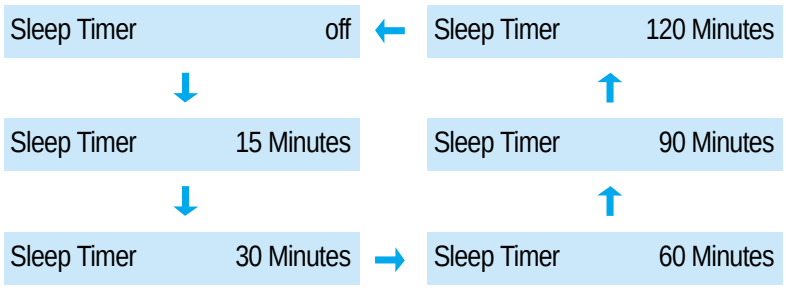
Setting Sleep Timer

1 Press the SLEEP Button.

SLEEP

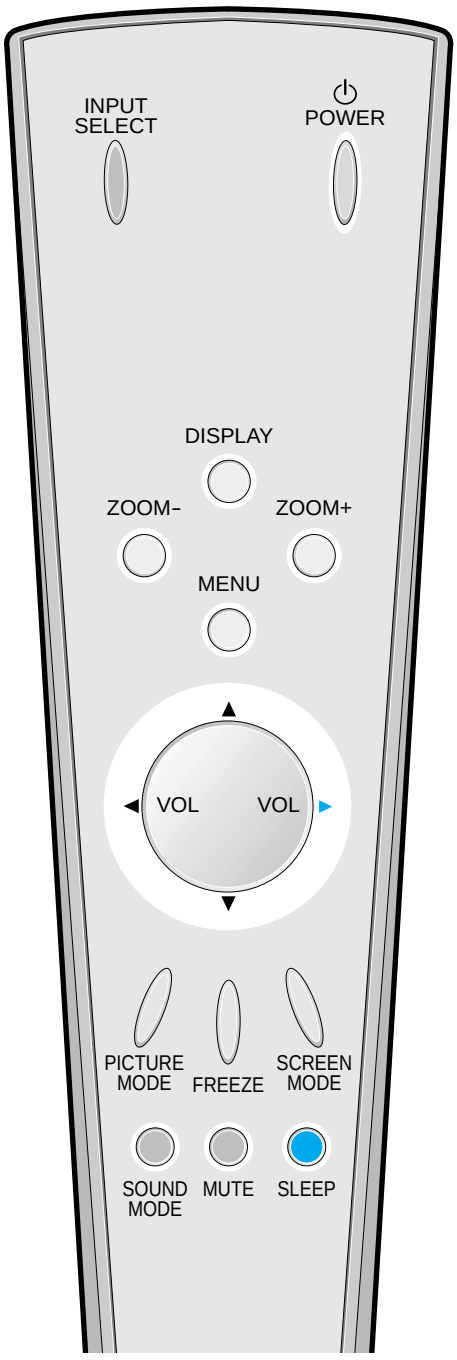
- Press the [SLEEP] button on the Remote Control.
- Pressing the [SLEEP] button first time will display the current setting for SLEEP TIMER.
- To cancel the SLEEP TIMER, press the [SLEEP] button to select 'OFF'.





Setting Sleep Timer

- SLEEP TIMER turns the Monitor off after a preset time.



NOTES:

1) On-screen information disappears if you do not take any action for about two seconds after pressing the SLEEP button.
2) If you turn the Monitor off after setting SLEEP, the setting is erased.

Before Requesting Service

Before requesting for a service, check the following points once again.

Symptoms

Checks

Action

• Remote control does not function properly.

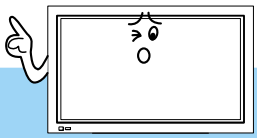
- Check for any obstacle between the Remote Control and the Display.
- Check for dead batteries and incorrect battery orientation.
- Check if the Remote Control is the right one.

- Remove any obstacle between the Remote Control and the Display.
- Replace batteries and use the correct polarity (+) or (-) of the batteries.
- Use the pertinent Remote Control proper to the model.

• The Display makes a snapping sound.

- Check if the pictures and sound are normal.

- This sound is produced due to variations in room temperature.
- This sound does not indicate that the Display has a problem if the pictures and sound can be viewed and heard properly.

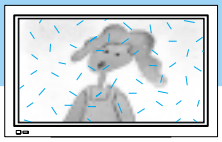


• There are empty spots at the top and the bottom area of the screen.

- Check if the screen size of an image is wider than 16:9 aspect ratio (theater screen size).

- When video screen is wider than 16:9 aspect ratio, you may see dark areas at the top and the bottom of the screen.

Before Requesting for a Service



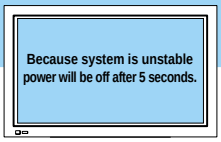
• There are spots on the screen or screen rolls.

- Check if your product is affected by any interference from automobiles, high-voltage transmission lines, neon signs or other potential sources.

• Screen size is suddenly changed.

- The screen size of a video image may not be matched to the size of the dark initial screen.

- Check by using other video tape.



• System auto detection. (50” only)

- If above statement shows while watching, for safety the internal system is automatically detected and PDP will be turn off.

- Please contact nearest Service Center immediately.

SPECIFICATIONS

In the event that the product has been submerged in the water in rainy season:
Immediately wash it with clean water, and dry it in ashadow place, then call for service from the nearest Daewoo Service Center.
Never plug the Power Cord since there is risk of electric shock and damag of the product.

DISPLAY UNIT

Model	DSP-4224LVS	DSP-5014LXS
Diagonal Size	106cm (42”)	126cm (50”)
Screen Aspect Ratio	16 : 9	16 : 9
Display Resolution	852(H) ×480(V) dots	1366(H) ×768(V) dots
Pixel Pitch	1.08(H) ×1.08(V) mm	0.28(H) ×0.81(V) mm
Video Signal	NTSC, PAL, SECAM, PAL-M/N, NTSC4.43	NTSC, PAL, SECAM, PAL-M/N, NTSC4.43
Dimension	1044(W) ×631(H) ×83(D)mm 41.02(W) ×24.84(H) ×3.23(D)inch	1222(W) ×738(H) ×94(D)mm 48.11(W) ×29.06(H) ×3.7(D)inch
Weight	28 kg (61.73Lbs)	43 kg (94.8Lbs)
Power Requirement	AC 100-240V~, 50/60Hz	AC 100-240V~, 50/60Hz

* Appearance and specifications of this product are subject to change for improving the product without prior notice.

INPUT/OUTPUT TERMINAL

INPUT/OUTPUT	ITEMS	VIDEO	AUDIO
EXTERNAL INPUT	COMPONENT INPUT	DTV/DVD ONLY (Y, Pb/Cb, Pr/Cr), 2 sets	(LEFT/RIGHT) 2 sets
	VIDEO INPUT	two RCA jacks	(LEFT/RIGHT) 2 sets
	S-VIDEO INPUT	two 4 pin Mini DIN jack	
	Computer(PC)	one 15 pin D-sub jack one DVI-D(Digital only) jack	(LEFT/RIGHT) 2 set each
AUDIO OUTPUT	SPEAKER OUTPUT(sold separately)	20W (two 10W)	