

OWNER'S MANUAL LCD TV / LED LCD TV / PLASMA TV

Please read this manual carefully before operating your set and retain it for future reference.

www.lg.com



Optional extras can be changed or modified for quality improvement without any notification. Contact your dealer for buying these items.

This device only works with compatible LG LED LCD TV, LCD TV, or Plasma TV.



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LED LCD TV MODELS : 32/37/42/47/55LE5***, 32/37/42/47/55LE7***, 42/47/55LE8***, 42/47LX6*** ACCESSORIES

Ensure that the following accessories are included with your TV. If an accessory is missing, please contact the dealer where you purchased the TV.



Use of ferrite core (This feature is not available for all models.)

Ferrite core can be used to reduce the electromagnetic wave when connecting the power cord.

The closer the location of the ferrite core to the power plug, the better it is.



FRONT PANEL CONTROLS

TV can be placed in standby mode in order to reduce the power consumption. And TV should be switched off using the power switch on the TV if it will not be watched for some time, as this will reduce energy consumption.

The energy consumed during use can be significantly reduced if the level of brightness of the picture is reduced, and this will reduce the overall running cost.

ACAUTION

- Do not step on the glass stand or subject it to any impact. It may break, causing possible injury from fragments of glass, or the TV may fall.
- ▶ Do not drag the TV. The floor or the product may be damaged.

Image shown may differ from your TV.

Only 32/37/42/47/55LE5***, 32/37/42/47/55LE7***, 42/47LX6***



Touch Button

You can use the desired button function by touching.



Only 42/47/55LE8***



BACK PANEL INFORMATION

Image shown may differ from your TV.



- Power Cord Socket
 This TV operates on an AC power. The voltage is indicated on the Specifications page.
 (▶ p.184 to 200) Never attempt to operate the TV on DC power.
- **2** LAN

Network connection for AccuWeather, Picasa, YouTube, etc. Also used for video, photo and music files on a local network.

- OPTICAL DIGITAL AUDIO OUT Connect digital audio to various types of equipment. Connect to a Digital Audio Component. Use an Optical audio cable.
- **RGB/DVI Audio Input** Connect the audio from a PC or DTV.
- Euro Scart Socket (AV1) Connect scart socket input or output from an external device to these jacks.
- Component Input Connect a component video/audio device to these jacks.
- HDMI/DVI IN Input Connect an HDMI signal to HDMI IN. Or DVI (VIDEO) signal to HDMI/DVI port with DVI to HDMI cable.

- **RGB IN Input** Connect the output from a PC.
- RS-232C IN (CONTROL & SERVICE) PORT Connect to the RS-232C port on a PC. This port is used for Service or Hotel mode.
- WIRELESS Control Connect the Wireless Ready Dongle to the TV to control the external input devices connected to Wireless Media Box wirelessly.
- Audio/Video Input Connect audio/video output from an external device to these jacks.
- Antenna Input Connect antenna or cable to this jack.
- **USB Input** Connect USB storage device to this jack.
- PCMCIA (Personal Computer Memory Card International Association) Card Slot Insert the CI Module to PCMCIA CARD SLOT. (This feature is not available in all countries.)
- Headphone Socket Plug the headphone into the headphone socket.

STAND INSTALLATION

Image shown may differ from your TV.

When assembling the desk type stand, check whether the bolt is fully tightened. (If not tightened fully, the product can tilt forward after the product installation.) If you tighten the bolt with excessive force, the bolt can deviate from abrasion of the tightening part of the bolt.



Carefully place the TV screen side down on a cushioned surface to protect the screen from damage.





Assemble the parts of the Stand Body with the Stand Base of the TV.

At this time, tighten the screws that hold the Stand Body on.







Assemble the TV as shown.



Assemble the parts of the Stand Rear Cover with the TV.





Fix the 4 bolts securely using the holes in the back of the TV.





(Only 42/47/55LE8***)

(Only 32/37/42/47/55LE5***, 32/37/42/47/55LE7***

M4 X 16

42/47LX6***)



ATTACHING THE TV TO A DESK

(Only 32LE5***)

Image shown may differ from your TV. The TV must be attached to desk so it cannot be pulled in a forward/backward direction, potentially causing injury or damaging the product. Use only an attached screw.



1-Screw (provided as parts of the product)



WARNING

To prevent TV from falling over, the TV should be securely attached to the floor/wall per installation instructions. Tipping, shaking, or rocking the machine may cause injury.

BACK COVER FOR WIRE ARRANGEMENT

Image shown may differ from your TV.



Secure the power cord with the **Cable Holder** on the TV back cover. It will help prevent the power cable from being removed by accident.



Cable Holder



After connecting the cables as necessary, install **Cable Holder** as shown and bundle the cables.



Cable Holder

SWIVEL STAND

Image shown may differ from your TV. After installing the TV, you can adjust the TV set manually to the left or right direction by 20 degrees to suit your viewing position.



KENSINGTON SECURITY SYSTEM

- This feature is not available for all models.
- Image shown may differ from your TV.

The TV is equipped with a Kensington Security System connector on the back panel. Connect the Kensington Security System cable as shown below.

For the detailed installation and use of the Kensington Security System, refer to the user's guide provided with the Kensington Security System.

For further information, contact http://www.kensington.com, the internet homepage of the Kensington

company. Kensington sells security systems for expensive electronic equipment such as notebook PCs and LCD projectors.

NOTE

- The Kensington Security System is an optional accessory.
- If the TV feels cold to the touch, there may be a small "flicker" when it is turned on.

This is normal, there is nothing wrong with TV.

- Some minute dot defects may be visible on the screen, appearing as tiny red, green, or blue spots. However, they have no adverse effect on the monitor's performance.
- Avoid touching the LCD screen or holding your finger(s) against it for long periods of time. Doing so may produce some temporary distortion effects on the screen.



CAREFUL INSTALLATION ADVICE

- You should purchase necessary components to fix the TV safety and secure to the wall on the market.
- Position the TV close to the wall to avoid the possibility of it falling when pushed.
- The instructions shown below are a safer way to set up the TV, by fixing it to the wall, avoiding the possibility of it falling forwards if pulled. This will prevent the TV from falling forward and causing injury. This will also prevent the TV from damage. Ensure that children do not climb or hang from the TV.



Use the eye-bolts or TV brackets/bolts to fix the product to the wall as shown in the picture. (If your TV has bolts in the eyebolts, loosen then bolts.)

* Insert the eye-bolts or TV brackets/bolts and tighten them securely in the upper holes.



Secure the wall brackets with the bolts on the wall. Match the height of the bracket that is mounted on the wall.



Use a sturdy rope to tie the product for alignment. It is safer to tie the rope so it becomes horizontal between the wall and the product.

NOTE

- ▶ When moving the TV undo the cords first.
- Use a platform or cabinet strong and large enough to support the size and weight of the TV.
- To use the TV safely make sure that the height of the bracket on the wall and on the TV is the same.

- The TV can be installed in various ways such as on a wall, or on a desktop etc.
- The TV is designed to be mounted horizontally.

EARTHING

Ensure that you connect the earth wire to prevent possible electric shock. If grounding methods are not possible, have a qualified electrician install a separate circuit breaker.

Do not try to earth the TV by connecting it to telephone wires, lightening rods or gas pipes.



DESKTOP PEDESTAL INSTALLATION

Image shown may differ from your TV.

For adequate ventilation allow a clearance of 10 cm all around the TV.



WALL MOUNT: HORIZONTAL INSTALLATION

- We recommend the use of a LG Brand wall mounting bracket when mounting the TV to a wall.
- We recommend that you purchase a wall mounting bracket which supports VESA standard.
- LG recommends that wall mounting be performed by a qualified professional installer.

NOTE

- Should Install wall mount on a solid wall perpendicular to the floor.
- Should use a special wall mount, if you want to install it to ceiling or slanted wall.
- The surface that wall mount is to be mounted on should be of sufficient strength to support the weight of TV set; e.g. concrete, natural rock, brick and hollow block.
- Installing screw type and length depends on the wall mount used. Further information, refer to the instructions included with the mount.
- LG is not liable for any accidents or damage to property or TV due to incorrect installation:
 - Where a non-compliant VESA wall mount is used.
 - Incorrect fastening of screws to surface which may cause TV to fall and cause personal injury.
 - Not following the recommended Installation method.







Model	VESA (A * B)	Standard Screw	Quantity
32LE5***	200 * 10	0 M4	4
37/42/47LE5***	200 * 20	0 M6	4
55LE5***	400 * 40	0 M6	4
32LE7***	200 * 10		4
37/42/47LE7***	200 * 20	0 M6	4
55LE7***	400 * 40	0 M6	4
42/47LE8***	200 * 20	0 M6	4
55LE8***	400 * 40	0 M6	4
42/47LX6***	200 * 20	0 M6	4

REMOTE CONTROL KEY FUNCTIONS (Only 32/37/42/47/55LE5***, 32/37/42/47/55LE7***, 42/47/55LE8***)

When using the remote control, aim it at the remote control sensor on the TV.



PREPARATION





- Open the battery compartment cover on the back and install the batteries matching correct polarity (+with +,-with -).
- Install two 1.5 V AAA batteries. Do not mix old or used batteries with new ones.
- Close cover.

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GUIDE (INFO

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 To remove the batteries, perform the installation actions in reverse.

PREPARATION REMOTE CONTROL KEY FUNCTIONS (Only 42/47LX6***)

When using the remote control, aim it at the remote control sensor on the TV.







- Close cover.
- To remove the batteries, perform the installation actions in reverse.

LCD TV MODELS : 32/37/42/47/55LD6***, 32/42/47LD7*** 32/37/42LD8***

ACCESSORIES

Ensure that the following accessories are included with your TV. If an accessory is missing, please contact the dealer where you purchased the TV.

Image shown may differ from your TV.









Nero MediaHome 4 Essentials CD

This item is not included for all models.



* Lightly wipe any stains or fingerprints on the surface of the TV with the polishing cloth.

Polishing Cloth Polishing cloth for

Do not use excessive force. This may cause use on the screen. scratching or discolouration.



(M4x20) Bolts for stand assembly



Protection cover

Use of ferrite core (This feature is not available for all models.)

Ferrite core can be used to reduce the electromagnetic wave when connecting the power cord.

The closer the location of the ferrite core to the power plug, the better it is.



FRONT PANEL CONTROLS

NOTE

TV can be placed in standby mode in order to reduce the power consumption. And TV should be switched off using the power switch on the TV if it will not be watched for some time, as this will reduce energy consumption.

The energy consumed during use can be significantly reduced if the level of brightness of the picture is reduced, and this will reduce the overall running cost.

ACAUTION

- Do not step on the glass stand or subject it to any impact. It may break, causing possible injury from fragments of glass, or the TV may fall.
- ► Do not drag the TV. The floor or the product may be damaged.
- Image shown may differ from your TV.





Only 32/42/47LD7***



Only 32/37/42LD8***



BACK PANEL INFORMATION

Image shown may differ from your TV.



- Power Cord Socket
 This TV operates on an AC power. The voltage is indicated on the Specifications page.
 (▶ p.184 to 200) Never attempt to operate the TV on DC power.
- **2** LAN

Network connection for AccuWeather, Picasa, YouTube, etc. Also used for video, photo and music files on a local network.

- OPTICAL DIGITAL AUDIO OUT Connect digital audio to various types of equipment. Connect to a Digital Audio Component. Use an Optical audio cable.
- GRGB/DVI Audio Input Connect the audio from a PC or DTV.
- Euro Scart Socket (AV1) Connect scart socket input or output from an external device to these jacks.
- Component Input Connect a component video/audio device to these jacks.
- HDMI/DVI IN Input Connect an HDMI signal to HDMI IN. Or DVI (VIDEO) signal to HDMI/DVI port with DVI to HDMI cable.

- 8 RGB IN Input Connect the output from a PC.
- WIRELESS Control Connect the Wireless Ready Dongle to the TV to control the external input devices connected to Wireless Media Box wirelessly.
- RS-232C IN (CONTROL & SERVICE) PORT Connect to the RS-232C port on a PC. This port is used for Service or Hotel mode.
- Antenna Input Connect antenna or cable to this jack.
- **USB Input** Connect USB storage device to this jack.
- PCMCIA (Personal Computer Memory Card International Association) Card Slot Insert the CI Module to PCMCIA CARD SLOT. (This feature is not available in all countries.)
- Headphone Socket Plug the headphone into the headphone socket.
- Audio/Video Input Connect audio/video output from an external device to these jacks.



A-20

SWIVEL STAND

■ Image shown may differ from your TV.

After installing the TV, you can adjust the TV set manually to the left or right direction by 20 degrees to suit your viewing position.



NOT USING THE DESK-TYPE STAND

Image shown may differ from your TV. When installing the wall-mounted unit, use the protection cover.

Insert the **Protection Cover** into the TV until clicking sound.



ATTACHING THE TV TO A DESK (Only 32/37/42LD6***,

32/42LD7***, 32/37/42LD8***)

Image shown may differ from your TV. The TV must be attached to desk so it cannot be pulled in a forward/backward direction, potentially causing injury or damaging the product. Use only an attached screw.



1-Screw (provided as parts of the product)



Desk

WARNING

► To prevent TV from falling over, the TV should be securely attached to the floor/wall per installation instructions. Tipping, shaking, or rocking the machine may cause injury.

KENSINGTON SECURITY SYSTEM

- This feature is not available for all models.
- Image shown may differ from your TV.

The TV is equipped with a Kensington Security System connector on the back panel. Connect the Kensington Security System cable as shown below.

For the detailed installation and use of the Kensington Security System, refer to the user's guide provided with the Kensington Security System.

For further information, contact http://www.kensington.com, the internet homepage of the Kensington

company. Kensington sells security systems for expensive electronic equipment such as notebook PCs and LCD projectors.

- The Kensington Security System is an optional accessory.
- If the TV feels cold to the touch, there may be a small "flicker" when it is turned on.
 - This is normal, there is nothing wrong with TV.
- Some minute dot defects may be visible on the screen, appearing as tiny red, green, or blue spots. However, they have no adverse effect on the monitor's performance.
- Avoid touching the LCD screen or holding your finger(s) against it for long periods of time.
 Doing so may produce some temporary distortion effects on the screen.



CAREFUL INSTALLATION ADVICE

- You should purchase necessary components to fix the TV safety and secure to the wall on the market.
- Position the TV close to the wall to avoid the possibility of it falling when pushed.
- The instructions shown below are a safer way to set up the TV, by fixing it to the wall, avoiding the possibility of it falling forwards if pulled. This will prevent the TV from falling forward and causing injury. This will also prevent the TV from damage. Ensure that children do not climb or hang from the TV.



- Use the eye-bolts or TV brackets/bolts to fix the product to the wall as shown in the picture. (If your TV has bolts in the eyebolts, loosen then bolts.)
 - * Insert the eye-bolts or TV brackets/bolts and tighten them securely in the upper holes.
- 2

Secure the wall brackets with the bolts on the wall. Match the height of the bracket that is mounted on the wall.



3 Use a sturdy rope to tie the product for alignment. It is safer to tie the rope so it becomes horizontal between the wall and the product.

NOTE

- ▶ When moving the TV undo the cords first.
- Use a platform or cabinet strong and large enough to support the size and weight of the TV.
- To use the TV safely make sure that the height of the bracket on the wall and on the TV is the same.

- The TV can be installed in various ways such as on a wall, or on a desktop etc.
- The TV is designed to be mounted horizontally.

EARTHING

Ensure that you connect the earth wire to prevent possible electric shock. If grounding methods are not possible, have a qualified electrician install a separate circuit breaker.

Do not try to earth the TV by connecting it to telephone wires, lightening rods or gas pipes.



DESKTOP PEDESTAL INSTALLATION

Image shown may differ from your TV.

For adequate ventilation allow a clearance of 10 cm all around the TV.



WALL MOUNT: HORIZONTAL INSTALLATION

- We recommend the use of a LG Brand wall mounting bracket when mounting the TV to a wall.
- We recommend that you purchase a wall mounting bracket which supports VESA standard.
- LG recommends that wall mounting be performed by a qualified professional installer.

- Should Install wall mount on a solid wall perpendicular to the floor.
- Should use a special wall mount, if you want to install it to ceiling or slanted wall.
- The surface that wall mount is to be mounted on should be of sufficient strength to support the weight of TV set; e.g. concrete, natural rock, brick and hollow block.
- Installing screw type and length depends on the wall mount used. Further information, refer to the instructions included with the mount.
- LG is not liable for any accidents or damage to property or TV due to incorrect installation:
 - Where a non-compliant VESA wall mount is used.
 - Incorrect fastening of screws to surface which may cause TV to fall and cause personal injury.
 - Not following the recommended Installation method.







Model	VESA (A * B)	Standard Screw	Quantity
32LD6***	200 * 100	M4	4
37/42/47LD6***	200 * 200	M6	4
55LD6***	400 * 400	M6	4
32LD7***	200 * 100	M4	4
42/47LD7***	200 * 200	M6	4
32LD8***	200 * 100	M4	4
37/42LD8***	200 * 200	M6	4

PREPARATION REMOTE CONTROL KEY FUNCTIONS

When using the remote control, aim it at the remote control sensor on the TV.





PREPARATION



- Install two 1.5 V AAA batteries. Do not mix old or used batteries with new ones.
- Close cover.
- To remove the batteries, perform the installation actions in reverse.

GUIDE

(INFO())

AD

PLASMA TV MODELS : 50/60PK5**, 50/60PK7***, 50/60PK9*** ACCESSORIES

Ensure that the following accessories are included with your TV. If an accessory is missing, please contact the dealer where you purchased the TV.

Image shown may differ from your TV.



FRONT PANEL CONTROLS

TV can be placed in standby mode in order to reduce the power consumption. And TV should be switched off using the power switch on the TV if it will not be watched for some time, as this will reduce energy consumption.

The energy consumed during use can be significantly reduced if the level of brightness of the picture is reduced, and this will reduce the overall running cost.

ACAUTION

- Do not step on the glass stand or subject it to any impact. It may break, causing possible injury from fragments of glass, or the TV may fall.
- ▶ Do not drag the TV. The floor or the product may be damaged.
- Image shown may differ from your TV.

Only 50/60PK5**



			,	0	
്/		MENU	OK 🔎	- 🛆 +	УР 🏠
POWER	INPUT	MENU	ОК	VOLUME	PROGRAMME

Only 50/60PK7***, 50/60PK9***



BACK PANEL INFORMATION

Image shown may differ from your TV.



- Power Cord Socket This TV operates on an AC power. Never attempt to operate the TV on DC power.
- 2 LAN

Network connection for AccuWeather, Picasa, YouTube, etc. Also used for video, photo and music files on a local network.

- WIRELESS Control Connect the Wireless Ready Dongle to the TV to control the external input devices connected to Wireless Media Box wirelessly.
- GRGB/DVI Audio Input Connect the audio from a PC or DTV.
- OPTICAL DIGITAL AUDIO OUT
 Connect digital audio to various types of equipment.
 Connect to a Digital Audio Component.
 Use an Optical audio cable.
- Euro Scart Socket (AV1) Connect scart socket input or output from an external device to these jacks.

- Component Input Connect a component video/audio device to these jacks.
- B HDMI/DVI IN Input Connect an HDMI signal to HDMI IN. Or DVI (VIDEO) signal to HDMI/DVI port with DVI to HDMI cable.
- RGB IN Input Connect the output from a PC.
- RS-232C IN (CONTROL & SERVICE) PORT Connect to the RS-232C port on a PC. This port is used for Service or Hotel mode.
- Antenna Input Connect antenna or cable to this jack.
- **USB Input** Connect USB storage device to this jack.
- PCMCIA (Personal Computer Memory Card International Association) Card Slot Insert the CI Module to PCMCIA CARD SLOT. (This feature is not available in all countries.)
- Audio/Video Input Connect audio/video output from an external device to these jacks.

STAND INSTALLATION

Image shown may differ from your TV.

When assembling the desk type stand, check whether the bolt is fully tightened. (If not tightened fully, the product can tilt forward after the product installation.) If you tighten the bolt with excessive force, the bolt can deviate from abrasion of the tightening part of the bolt.

Only 50PK7***, 50PK9***

Only 50PK5**



BACK COVER FOR WIRE ARRANGEMENT

Image shown may differ from your TV.
 After connecting the cables as necessary, install
 Cable Holder as shown and bundle the cables.
 In case of the LAN cable, install as shown to reduce the electromagnetic wave.



Cable Holder

Only 50/60PK7***, 50/60PK9***

Connect the cables as necessary. To connect additional equipment, see the **External Equipment Setup** section.





Install the **Cable Management Clip** into the TV until clicking sound.



NOTE

- Do not use the Cable Management Clip to lift the TV.
- If the TV is dropped, you may be injured or the TV may be damaged.

HOW TO REMOVE THE CABLE MANAGEMENT CLIP

Only 50/60PK7***, 50/60PK9***

Image shown may differ from your TV.
Hold the Cable Management Clip with both hands and pull it backward as shown.


NOT USING THE DESK-TYPE STAND

Image shown may differ from your TV. When installing the wall-mounted unit, use the protection cover.



CAREFUL INSTALLATION ADVICE

- You should purchase necessary components to fix the TV safety and secure to the wall on the market.
- Position the TV close to the wall to avoid the possibility of it falling when pushed.
- The instructions shown below are a safer way to set up the TV, by fixing it to the wall, avoiding the possibility of it falling forwards if pulled. This will prevent the TV from falling forward and causing injury. This will also prevent the TV from damage. Ensure that children do not climb or hang from the TV.



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Use the eye-bolts or TV brackets/bolts to fix the product to the wall as shown in the picture. (If your TV has bolts in the eyebolts, loosen then bolts.)

- * Insert the eye-bolts or TV brackets/bolts and tighten them securely in the upper holes.
- 2

Secure the wall brackets with the bolts on the wall. Match the height of the bracket that is mounted on the wall.



3 Use a sturdy rope to tie the product for alignment. It is safer to tie the rope so it becomes horizontal between the wall and the product.

- ▶ When moving the TV undo the cords first.
- Use a platform or cabinet strong and large enough to support the size and weight of the TV.
- To use the TV safely make sure that the height of the bracket on the wall and on the TV is the same.

PREPARATION

- The TV can be installed in various ways such as on a wall, or on a desktop etc.
- The TV is designed to be mounted horizontally.

EARTHING

Ensure that you connect the earth wire to prevent possible electric shock. If grounding methods are not possible, have a qualified electrician install a separate circuit breaker.

Do not try to earth the TV by connecting it to telephone wires, lightening rods or gas pipes.



DESKTOP PEDESTAL **INSTALLATION**

Image shown may differ from your TV.

For adequate ventilation allow a clearance of 10 cm all around the TV.



WALL MOUNT: HORIZONTAL **INSTALLATION**

- We recommend the use of a LG Brand wall mounting bracket when mounting the TV to a wall.
- We recommend that you purchase a wall mounting bracket which supports VESA standard.
- LG recommends that wall mounting be performed by a qualified professional installer.

- Should Install wall mount on a solid wall perpendicular to the floor.
- Should use a special wall mount, if you want to install it to ceiling or slanted wall.
 The surface that wall mount is to be mounted on should be of sufficient strength to support the weight of TV set; e.g. concrete, natural rock, brick and hollow block.
- Installing screw type and length depends on the wall mount used. Further information, refer to the instructions included with the mount.
- LG is not liable for any accidents or damage to property or TV due to incorrect installation:
 - Where a non-compliant VESA wall mount is used.
 - Incorrect fastening of screws to surface which may cause TV to fall and cause personal injury.
 - Not following the recommended Installation method.





Model	VESA (A * B)	Standard Screw	Quantity
50PK5**	400 * 400	M6	4
60PK5**	600 * 400	M8	4
50PK7***	400 * 400	M6	4
60PK7***	600 * 400	M8	4
50PK9***	400 * 400	M6	4
60PK9***	600 * 400	M8	4

REMOTE CONTROL KEY FUNCTIONS

When using the remote control, aim it at the remote control sensor on the TV.



PREPARATION



PREPARATION



VOLUME UP /DOWN	Adjusts the volume.
MARK	Select the input to apply the Picture Wizard settings. Check and un-check programmes in the USB menu.
FAV	Displays the selected favourite programme.
CHAR/NUM	Shifts the Character or Number for NetCast menu.
RATIO	Selects your desired Aspect Ratio of picture. (▶ p.135)
DELETE	Deletes the entered character when entering the character on the screen keyboard.
MUTE	Switches the sound on or off.
Programme UP/DOWN	Selects a programme.
	Move from one full set of screen information to the next one.

SIMPLINK / Controls SIMPLINK or MY MEDIA menu (Photo List, MY MEDIA Music List and Movie List). Menu control buttons

Installing Batteries



- Open the battery compartment cover on the back and install the batteries matching correct polarity (+with +,-with -).
- Install two 1.5 V AAA batteries. Do not mix old or used batteries with new ones.
- Close cover.
- To remove the batteries, perform the installation actions in reverse.

PREPARATION

Simple Remote Control (Only 50/60PK9***)

PREPARATION



也 (POWER)	Switches the TV on from standby or off to standby.
TV/INPUT	External input mode rotate in regular sequence.(> p.57)
VOLUME UP /DOWN	Adjusts the volume.
MUTE	Switches the sound on or off.
Programme UP/DOWN	Selects a programme.
	Selects a programme. Selects numbered items in a menu.

OK Accepts your selection or displays the current mode.

Q.VIEW Returns to the previously viewed programme.

Installing Batteries



- Open the battery compartment cover on the back and install the batteries matching correct polarity (+with +,-with -).
- Install two 1.5V AAA batteries. Do not mix old or used batteries with new ones.
- Close cover.
- To remove the batteries, perform the installation actions in reverse.

To prevent damage do not connect to the mains outlet until all connections are made between the devices.

ANTENNA CONNECTION

- For optimum picture quality, adjust antenna direction.
- An antenna cable and converter are not supplied.



- In poor signal areas, to achieve better picture quality it may be necessary to install a signal amplifier to the antenna as shown above.
- If signal needs to be split for two TVs, use an antenna signal splitter for connection.

- To avoid damaging any equipment, never plug in any power cord until you have finished connecting all equipment.
- This section on EXTERNAL EQUIPMENT SETUP mainly uses diagrams for the 32/37/42/47/55LE7*** models.
- Image shown may differ from your TV.

CONNECTING WITH A COMPONENT CABLE

This TV can receive Digital RF/Cable signals without an external digital set-top box. However, if you do receive Digital signals from a digital set-top box or other digital external device, refer to the diagram as shown below.

Connect the video outputs (Y, PB, PR) of the (1)external equipment (digital set-top box, DVD, COMPONEN IN 1 etc.) to the COMPONENT IN VIDEO jacks on \bigcirc the TV. • 7 Connect the audio output of the external equip-2 7 ment (digital set-top box, DVD, etc.) to the • 7 COMPONENT IN AUDIO jacks on the TV. 7 • Turn on the external equipment. 3 (Refer to the external equipment's manual for operating instructions.) Ō Ō Ó Ó Ò 0 0 0 O e Select the Component1 input source using the 4 or **INPUT** button on the remote control. If connected to COMPONENT IN 2, select Component2 input source. ←______ \bigcirc ► HDMI Audio Supported format : Dolby Digital, PCM.)←⊲ 📖 DTS Audio format is not supported. \bigcirc ﺷᡅᆃᡆ᠓ᡄ Signal Component HDMI HDMI IN 4 480i/576i 0 Х

ANTENNA

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Component Input ports

480p/576p

720p/1080i

1080p

To achieve better picture quality, connect a DVD player to the component input ports as shown below.

0

0 0

(24 Hz / 30 Hz /

50 Hz / 60 Hz)

Component ports on the TV	Y	Рв	PR
	Y	Рв	PR
Video output ports	Y	B-Y	R-Y
on DVD player	Y	Cb	Cr
	Y	Pb	Pr

0

0

Ο

(50 Hz / 60 Hz only)

CONNECTING WITH AN HDMI CABLE

Connect the HDMI output of the external equipment (digital settop box, DVD, etc.) to HDMI/DVI IN 1(DVI), HDMI/DVI IN 2, HDMI/DVI IN 3 or HDMI IN 4 (Except for 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***) jack on the TV.

Turn on the external equipment. (Refer to the external equipment's manual for operating instructions.)

3

(2)

Select **HDMI1, HDMI2, HDMI3** or **HDMI4** (Except for 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***) input source using the **INPUT** button on the remote control.



INOTE

- The TV can receive video and audio signals simultaneously when using an HDMI cable.
- If the DVD does not support Auto HDMI, you must set the output resolution appropriately.
- Check that your HDMI cable is High Speed HDMI Cable. If the HDMI cables are not High Speed HDMI Cable, flickering or no screen display can result. Please use the High Speed HDMI Cable.

EXTERNAL EQUIPMENT SETUP

CONNECTING WITH AN HDMI TO DVI CABLE



4

CONNECTING WITH A EURO SCART CABLE

- 1 Connect the Euro scart socket of the external equipment (DVD, VCR, etc.) to the AV1 Euro scart socket on the TV.
- 2

3

Turn on the external equipment. (Refer to the external equipment's manual for operating instructions.)

Select **AV1** input source using the **INPUT** button on the remote control.



		Input		Output
Scart	Video	Audio	RGB	Video, Audio
AV1	0	0	0	Analogue TV, Digital TV

Output Type Current input mode	AV1 (TV Out)	AV1 (When DTV scheduled recording is in progress using recording equipment.)
Digital TV	Digital TV	0
Analogue TV, AV	Analogue TV	0
Component/RGB	Analogue TV	(The input mode is converted to DTV.)
HDMI	Х	Х

NOTE

► Any Euro scart cable used must be signal shielded.

TV Out : Outputs Analogue TV or Digital TV signals.

EXTERNAL EQUIPMENT SETUP

USB SETUP



1

2

Connect the USB device to the **USB IN 1** or **USB IN 2** jack on the TV.

After connecting the **USB IN 1** or **USB IN 2** jack, you use the **USB** function. (**▶ p.90**)



CONNECTING WITH AN RF CABLE

To avoid picture noise (interference), allow adequate distance between the VCR and TV.



CONNECTING WITH AN RCA CABLE

- Connect the **AUDIO/VIDEO** jacks between TV and VCR or external equipment. Match the jack colours (Video = yellow, Audio Left = white, and Audio Right = red)
- Insert a video tape into the VCR and press PLAY on the VCR. (Refer to the VCR owner's manual.)

Or, Operate the corresponding external equipment.

(Refer to external equipment operating guide.)

Select **AV2** input source using the **INPUT** button on the remote control. If connected to **AV IN 3**, select **AV3** input source.

NOTE

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► If you have a mono VCR, connect the audio cable from the VCR to the AUDIO L/MONO jack of the TV.



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CONNECTING WITH A D-SUB 15 PIN CABLE

This TV provides Plug and Play capability, meaning that the PC adjusts automatically to the TV's settings.



4

Connect the RGB output of the PC to the RGB IN (PC) jack on the TV. Connect the PC audio output to the AUDIO IN (RGB/DVI) jack on the TV. Turn on the PC and the TV

Select RGB input source using the INPUT button on the remote control.



INSERTION OF A CI MODULE

To view the encrypted (pay) services in digital TV mode. This feature is not available in all countries.



Insert the CI Module to **PCMCIA** (Personal Computer Memory Card International Association) **CARD SLOT** of TV as shown.

For further information, see p.48.



Check this point as shown and insert the CI Module.

Check if the CI module is inserted into the PCMCIA card slot in the right direction. If the module is not inserted properly, this can cause damage to the TV and the PCMCIA card slot.

HEADPHONE SETUP

(Except for 50/60PK5**, 50/60PK7***, 50/60PK9***, 42/47LX6***)

You can listen the sound through the headphone.



Plug the headphone into the headphone socket.

2

To adjust the headphone volume, press the \triangle + or - button. If you press the MUTE button, the sound from the headphone is switched off.



- ► AUDIO menu items are disabled when connecting a headphone.
- ▶ When changing AV MODE with a headphone connected, the change is applied to video but not to audio.
- ▶ Optical Digital Audio Out is not available when connecting a headphone.
- Headphone impedance: 16 Ω
- Max audio output of headphone: 10 mW to 15 mW

DIGITAL AUDIO OUT SETUP

Sending the TV's audio signal to external audio equipment via the Digital Audio Output (Optical) port. If you want to enjoy digital broadcasting through 5.1-channel speakers, connect the OPTICAL DIGITAL AUDIO OUT terminal on the back of TV to a Home Theater (or amp).



Connect one end of an optical cable to the TV Digital Audio (Optical) Output port.

Connect the other end of the optical cable to 2 the digital audio (Optical) input on the audio equipment.



Set the "TV Speaker option - Off " in the 3 AUDIO menu.(>p.159). Refer to the external audio equipment instruction manual for operation.

ACAUTION

▶ Do not look into the optical output port. Looking at the laser beam may damage your vision.

EXTERNAL EQUIPMENT WIRELESS CONNECTION

LG TVs with a Wireless Control port support the LG Wireless Media Box, which is sold separately. When you connect the Wireless Ready Dongle (included with the Wireless Media Box) to the TV, external devices can be connected to the LG Wireless Media Box and video and audio will be sent to the TV wirelessly.

After the wireless is connected, press the **INPUT** button to view the wireless input screen. Refer to the Wireless Media Box manual for operating instructions.

1	Connect the WIRELESS CONTROL jack of the Wireless Ready Dongle to the WIRELESS CONTROL jack on the TV.	-
2	Connect HDMI OUT jack of the Wireless Ready Dongle to the HDMI/DVI IN 1(DVI) , HDMI/DVI IN 2, HDMI/DVI IN 3 or HDMI IN 4 (Except for 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***) jack on the TV.	

LG Wireless Media Box



- ► WIRELESS CONTROL : Wireless Ready Dongle power supply and control usage.
- ► HDMI : Video/Audio signal is connected in Wireless Ready Dongle.
- When you connect to the Wireless Media Box (Separately sold product), you can watch the external device connected to the Wireless Media Box through wireless connection.
- When using the external device connected to the Wireless Media Box, some functions of the TV menu may not work.
- ▶ In wireless external output, Real Cinema and Digital Noise Reduction functions are not supported.

SUPPORTED DISPLAY RESOLUTION

-Plasma TV Models

RGB-PC, HDMI/DVI-PC mode

Resolution	Horizontal Frequency (KHz)	Vertical Frequency (Hz)
720x400	31.468	70.08
640x480	31.469	59.94
800x600	37.879	60.31
1024x768	48.363	60.00
1280x768	47.78	59.87
1360x768	47.72	59.80
1280x1024	63.981	60.02
1920x1080	66.587	59.93
(RGB-PC)	00.007	59.95
1920x1080	67.5	60.00
(HDMI-PC)	07.5	60.00

IDMI/DVI-DTV mode				
Resolution	Horizontal Frequency (kHz)	Vertical Frequency (Hz)		
720x480	31.469	59.94		
7208400	31.5	60		
720x576	31.25	50		
	37.5	50		
1280x720	44.96	59.94		
	45	60		
	33.72	59.94		
	33.75	60		
	28.125	50		
	26.97	23.97		
1920x1080	27	24		
1920x1080	33.716	29.976		
	33.75	30.00		
	56.25	50		
	67.43	59.94		
	67.5	60		

RGB-PC, HDMI/DVI-PC mode		HDMI/DVI-DTV mode			
Resolution	Horizontal Frequency (kHz)	Vertical Frequency (Hz)	Resolution	Horizontal Frequency (kHz)	Vertical Frequency (Hz)
720x400	31.468	70.08	700 400	31.469	59.94
640x480	31.469	59.94	720x480	31.5	60
800x600	37.879	60.31	720x576	31.25	50
1024x768	48.363	60.00		37.5	50
1280x768	47.78	59.87	1280x720	44.96	59.94
1360x768	47.72	59.80		45	60
1280x1024	63.981	60.02		33.72	59.94
1920x1080	66.587	59.93		33.75	60
(RGB-PC)	00.007	59.95		28.125	50
1920x1080	67.5	60.00		26.97	23.97
(HDMI-PC)	07.5	00.00	4000 4000	27	24
		(Except for 42/47LX6***-	1920x1080	33.716	29.976
		HDMI/DVI-PC mode)		33.75	30.00
				56.25	50
				67.43	59.94
				67.5	60

LCD TV Models / LED LCD TV Models

- Avoid keeping a fixed image on the set's screen for prolonged periods of time. The fixed image may become permanently imprinted on the screen; use a screen saver when possible.
- There may be interference relating to resolution, vertical pattern, contrast or brightness in PC mode. Change the PC mode to another resolution or change the refresh rate to another rate or adjust the brightness and contrast on the menu until the picture is clear. If the refresh rate of the PC graphic card can not be changed, change the PC graphic card or consult the manufacturer of the PC graphic card.
- The synchronization input waveform for Horizontal and Vertical frequencies are separate.
- We recommend using 1920x1080, 60 Hz for the PC mode, this should provide the best picture quality.
- Connect the signal cable from the monitor output port of the PC to the RGB (PC) port of the TV or the signal cable from the HDMI output port of the PC to the HDMI IN (or HDMI/DVI IN) port on the TV.

- Connect the audio cable from the PC to the Audio input on the TV. (Audio cables are not included with the TV).
- ▶ If using a sound card, adjust PC sound as required.
- If the graphic card on the PC does not output analogue and digital RGB simultaneously, connect only one of either RGB or HDMI IN (or HDMI/DVI IN) to display the PC output on the TV.
- If the graphic card on the PC does output analogue and digital RGB simultaneously, set the TV to either RGB or HDMI; (the other mode is set to Plug and Play automatically by the TV.)
- DOS mode may not work depending on the video card if you use an HDMI to DVI cable.
- If you use too long an RGB-PC cable, there may be interference on the screen. We recommend using under 5m of cable. This provides the best picture quality.

SCREEN SETUP FOR PC MODE

Screen Reset

Returns Position, Size and Phase to the factory default settings.

This function works in the following mode : RGB[PC].





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

Auto Configure (RGB [PC] mode only)

Automatically adjusts the picture position and minimizes image instability. After adjustment, if the image is still not correct, your TV is functioning properly but needs further adjustment.

Auto configure

This function is for automatic adjustment of the screen position, size, and phase The displayed image will be unstable for a few seconds while the auto configuration is in progress.

-

PICTURE () Move () OK	SCREEN 🔶 Move 🚓 Prev.
Sharphess /0 Colour 60 Tint 0 Colour Temp. 0 Advanced Control • Picture Reset Picture Reset • Soreen	 Resolution Auto Config. Position Size Yes No Phase Reset
Select PICTURE.	 If the position of the image is still not correct, try Auto adjustment again.
Select Screen.	• If picture needs to be adjusted again after Auto adjustment in RGB (PC), you can adjust the Position , Size or Phase .
Select Auto Config.	
Select Yes.	
Run Auto Config	

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Selecting Resolution

To view a normal picture, match the resolution of RGB mode and selection of PC mode.

This function works in the following mode: RGB[PC]

PICTURE	↔ Move ⊙ OK		SCREEN	🔶 Move 🛛 🗞 Prev.
(Sharpness 70		Resolution	⊠ 1024 x 768
	Colour 60		Auto Config.	□ 1280 x 768
0	Tint 0 RIMANIG Colour Temp. 0 WIMPLING	~		□ 1360 x 768
۷	Advanced Control	\gg	Position	
0	Picture Reset		Size	
• TruMotion	: Off		Phase	
• Screen			C Reset	



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

Adjustment for screen Position, Size, Phase

If the picture is not clear after auto adjustment and especially if characters are still trembling, adjust the picture position manually.

This function works in the following mode : RGB[PC].

	🆒 Move ⊚ OK	SCREEN	
	Sharpness 70	++ Resolution	
-	Colour 60	O Auto Config.	
O	Tint 0 RIMANIG Colour Temp. 0 WIMMING	Position	
2	Advanced Control	↔ Size	
• TruMotion	Picture Reset Off	Imm Phase	↓ ▼
• Screen	۲	C Reset	



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

NETWORK SETUP

Wired Network Connection

This TV can be connected to a local area network (LAN) via the LAN port. After making the physical connection, the TV needs to be set up for network communication.

	TEINNA
Broadband Modem	Broadband Modem
Connect the LAN port of the Modem or Router to the LAN port on the TV.	
Select " Network Setting " in the NETWORK menu. After connecting the LAN port, use the NetCast menu. For more information about NETCAST setup and trouble-	

A CAUTION

1

3

- ► Do not connect a modular phone cable to the LAN port.
- Since there are various connection methods, please follow the specifications of your telecommunication carrier or internet service provider.

Wired Network Setup

If wired and wireless networks are both available, wired is the preferred method. After making a physical connection, a small number of home networks may require the TV network

settings to be adjusted.

For detail information, contact your internet provider or router manual.

NETWORK Move a Network Setting : Wired	Network Type	tł	Previous setting value e	exists. Do	
Network Status : Internet is Legal Notice	Wired network is recommended Wired Wireless	\geqslant	previous setting?	Exit	
3	Appeare wired an are simu connecte	ed when nd wireless ultaneously ed. IP Auto	Setting	IP Man	ual Setting
Network Status		Network Setting		Network Setting	I
Gateway Gateway Internet		IP Address Subnet Mask Gateway DNS Server	IP Auto Setting ► 255 . 255 . 0 . 0 255 . 255 . 0 . 0 255 . 255 . 0 . 0 255 . 255 . 0 . 0 255 . 255 . 0 . 0	Insert the IP add IP Mode IP Address Subnet Mask Gateway DNS Server	IP Manual Setting ► 255.255.0.0 255.255.0.0 255.255.0.0 255.255.0.0 255.255.0.0
Setting Test	Close	ে Previous	<	Previous	OK

If you already set

MENU Select NETWORK. OK ◉ Select Network Setting. ~ OK ◉ Select Wired. ~ If you already set Network Setting: Select Resetting. The new connection settings OK ◉ resets the current network settings. ~ Select IP Auto Setting or IP Manual Setting. OK When Selecting IP Manual Setting: 4.11 511 6.112 7.121 8.112 9.112 IP addresses will need to be input manually. 0_ Select OK. OK ◉ ~

- This feature requires an always-on broadband internet connection.
- You do not need to connect to a PC to use this function.
- If Network Setting is not working, check your network conditions. Check the LAN cable and make sure your router has DHCP turned on if you wish to use the Auto Setting.
- If the **Network Setting** is not completed, network may not operate normally.
- IP Auto Setting: Select it if there is a DHCP server on the local area network (LAN) via wired connection, the TV will automatically be allocated an IP address. If you're using a broadband router or broadband modem that has a DHCP (Dynamic Host Configuration Protocol) server function, the IP address will automatically be determined.
- IP Manual Setting: Select it if there is no DHCP server on the network and you want to set the IP address manually.

- For more information about Netcast setup and troubleshooting, visit http://lgknowledgebase. com. Search for Netcast.
- ► Use a standard LAN cable with this TV. Cat5 or better with a RJ45 connector.
- Many network connection problems during set up can often be fixed by re-setting the router or modem. After connecting the player to the home network, quickly power off and/or disconnect the power cable of the home network router or cable modem. Then power on and/or connect the power cable again.
- Depending on the internet service provider (ISP), the number of devices that can receive internet service may be limited by the applicable terms of service. For details, contact your ISP.
- LG is not responsible for any malfunction of the TV and/or the internet connection feature due to communication errors/malfunctions associated with your broadband internet connection, or other connected equipment.
- LG is not responsible for problems within your internet connection.
- Some content available through the network connection may not be compatible with the TV. If you have questions about such content, please contact the producer of the content.
- You may experience undesired results if the network connection speed does not meet the requirements of the content being accessed.
- Some internet connection operations may not be possible due to certain restrictions set by the Internet service provider (ISP) supplying your broadband Internet connection.
- Any fees charged by an ISP including, without limitation, connection charges are your responsibility.
- ► A 10 Base-T or 100 Base-TX LAN port is required for connection to this TV. If your internet service does not allow for such a connection, you will not be able to connect the TV.
- A DSL modem is required to use DSL service and a cable modem is required to use cable modem service. Depending on the access method of and subscriber agreement with your ISP, you may not be able to use the internet connection feature contained in this TV or you may be limited to the number of devices you can connect at the same time. (If your ISP limits sub-scription to one device, this TV may not be allowed to connect when a PC is already connected.)

- The use of a "Router" may not be allowed or its usage may be limited depending on the policies and restrictions of your ISP. For details, contact your ISP directly.
- ► The wireless network operates at 2.4 GHz radio frequencies that are also used by other household devices such as cordless telephone, Bluetooth® devices, microwave oven, and can be affected by interference from them. It can be interrupted by the device using 5 Ghz radio frequencies. It is same device with LG wireless media box, cordless telephone, other Wi-Fi device.
- It may decrease the service speed using Wireless network by surrounding wireless condition.
- Turn off all unused network equipment in your local home network. Some devices may generate network traffic.
- In some instances, placing the access point or wireless router higher up away from the floor may improve the reception.
- The reception quality over wireless depends on many factors such as type of the access point, distance between the TV and access point, and the location of the TV.
- When connecting internet through the wired/ wireless sharing machine, it may interrupt the connection because of the use limitation and confirmation of service company.
- To connect wireless AP, an AP that supports the wireless connection is necessary, and the wireless connection function of the AP needs to be activated. Please enquire to the AP supplier for the possibility of AP wireless connections.
- Please verify the security settings of AP SSID for wireless AP connection, and enquire to the AP supplier for the AP SSID security settings.
- The TV can become slower or malfunction with wrong settings of network equipments (wired/wireless router, hub, etc). Please install correctly by referring to the manual of the equipment, and set the network.
- When AP is set to include 802.11 n(Except for Russia), and if Encryption is designated as WEP(64/128bit) or WPA(TKIP/AES), the connection may not be possible. There may be different connection methods according to the AP manufacturers.

Wireless Network Connection

The LG Wireless LAN for Broadband/DLNA Adaptor, allows the TV to connect to a wireless lan network.

The network configuration and connection method may vary depending on the equipment in use and the network environment. Refer to the setup instructions supplied with your access point or wireless router for detailed connection steps and network settings.





- ► For enjoying pictures, music, or video stored in the PC using the router, the use of wired port in the router is recommended.
- ▶ When the wireless port of the router is used, there may be restrictions for some functions.

Wireless Network Setup

Setting up the AP (Access Point) or the wireless router is required before connecting the TV to the network.

	lf you a	already set the			
S NETWORK	Netw	vork Setting		Select the wireless netwo	rk setting type.
Network Setting : Wired Network Type	Network Setting : Wired Network Type Previous			Select the wireless netwo	
Network Status : Internet is Wired network is recommen		to connect with the setting?		Setting from the	AP list
Legal Notice Wired			\geq	Simple setting (WPS-b	
Wireless		OK		Setting Ad-hoc no	etwork
<u></u>	● ■	Resetting			Next
 ■ ■ 	Next	F Exit		Previous	
Appeared when wired and wireless				∇Z	
are simultaneously connected.				V	
Network Setting	If your AP is lo	ocked	Selecti	ing AP	
	Inserting the security key		Select A	AP you want to connect.	
Select the IP setting mode.	Insert the security key of AP. Insert 8~63 ASCII characters.			Page 1/1	
IP Mode			Input	t the new SSID	
	0.	/ 1 abc 2 def 3			
Subnet Mask 255.255.0.0 Gateway 255.255.0.0	gan	s 7 tur 8 wxyz 9	ASW		Access Point Search
• DNS Server 255.255.0.0	*		Netw	vork1	Search
	OK Cancel	₩ ← ₩		Connecting with PIN mode	
OK					Next
Previous	ം Prev.	E xit	Job Pl	revious	F Exit
Select NETWORK.		(OK) Poir	nt) or wirel	available AP less routers with nem as a list.	•
Select Network Set	ting.		Select	an AP (Access	
		С	1)	s router on the	
Select Wireless.				· AP is locked, ir y key of AP).	isert the
		1.2 2xi 3xi 4yi 5xi 6-xi		ne security key o	λD
If you already set Ne Select Resetting .	etwork Setting:	4a: 5a: 6a: 7a: 8a: 9a: 0a		le security key t	JI AP.
The new connection	settings resets	9 Repeat ste	ep 4-5 on	P.20.	
the current network s	-	<u> </u>	-		
5000	U U				
Select Setting from	the AP list.				

When a security code is already set

PIN (Personal Identification Number)

If you want to connect the AP (Access Point) or router with PIN, use this feature.



1 Repeat step 1-6 on P.24.

	Connect mode.	the	access	point	with	PIN
RED	mode.					

3 You can see the Network ID and Security Key on your TV screen.

Enter the PIN number to your device.



Select Connect.

5 Repeat step 4-5 on P.20.

 PIN number is the unique 8 digit number of the dongle.

Simple setting (WPS-button mode)

If your access point or wireless router that supports PIN or WPS (Wi-Fi Protected Setup), it's available to use your access point or wireless router within 120 counts. You do not need to know the access point name (SSID: Service Set Identifier) and security code of your access point or wireless router.



1 Repeat step 1-4 on P.24.



4 Repeat step 4-5 on P.20.

Ad-hoc Mode

This is the method of communicating directly with the machine to communicate without AP. This is the same as connecting two PCs with a cross cable.



1 Repeat step 1-3 on P.24.

your TV screen.

OK



Enter this Network ID and Security Key to your device. If a network may not operate, change the setting information using the RED button.

Insert the IP address.

Network setting is completed. Select **Close**.

Network Status



Wired Connection



- Setting: Return to the network setting menu or wireless network setting type menu.
- Test: Test the current network status after setting the network.
- **Close**: Return to the previous menu.

WATCHING TV / PROGRAMME CONTROL

TURNING ON THE TV

When your TV is turned on, you will be able to use its features.

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Firstly, connect the power cord correctly. At this stage, the TV switches to standby mode.



1

In standby mode to turn TV on, press the O / I, INPUT or P \sim button on the TV or press the **POWER**, INPUT, P \sim or **NUMBER** button on the remote control and the TV will switch on.

INITIALIZING SETUP

If the OSD (On Screen Display) is displayed on the screen after turning on the TV, you can adjust the Language, Mode Setting, Power Indicator(When you select Home Use from Mode Setting-Only LED LCD TV models), Country(Except for 32/37/42/47/55LE59**, 32/37/42/47/55LE79**, 42/47/55LE79**, 32/37/42/47/55LD69**, 32/42/47LD79**, 32/37/42LD89**, 42/47LX69**, 50/60PK59*, 50/60PK79**, 50/60PK99**) or Time Zone (When Russia is selected for Country) or Set Password(When France is selected for Country), Auto Tuning.

Note:

a.If you close without completing the initial setting, the Initial Setting menu can be displayed again. b.Press the BACK button to change the current OSD to the previous OSD.

- c.For those countries without confirmed DTV broadcasting standards, some DTV features might not work, depending on the DTV broadcasting environment.
- d."Home Use" mode is the optimal setting for home environments, and is the TV's default mode.
- e. "Store Demo" mode is the optimal setting for store environments. If a user modifies image quality data, "Store Demo" mode initializes the product to the image quality set by us after a certain period of time.
- f. The mode (Home Use, Store Demo) can be changed by executing Mode Setting in the OPTION menu.
- g. When France is selected for Country, password is not '0', '0', '0', '0' but '1', '2', '3', '4'.

PROGRAMME SELECTION

Press the $\mathbf{P} \land \lor$ or NUMBER buttons to select a programme number.

VOLUME ADJUSTMENT

1

1

Press the \triangle + or - button to adjust the volume.



If you wish to switch the sound off, press the MUTE button.

You can cancel this function by pressing the MUTE, \angle + , - or AV Mode button.

WATCHING TV / PROGRAMME CONTROL

QUICK MENU

Your TV's OSD (On Screen Display) may differ slightly from that shown in this manual. Q.Menu (Quick Menu) is a menu of features which users might use frequently.

→ Aspect Ratio: Selects your desired picture format.

For Zoom Setting, select 14:9, Zoom and Cinema Zoom in Ratio Menu. After completing Zoom Setting, the display goes back to Q.Menu.

- Clear Voice II : By differentiating the human sound range from others, it helps users listen to human voices better.
- Picture Mode : Selects your desired Picture Mode.
- Sound Mode : It is a feature to automatically set the sound combination which it deems the best for the images being watched. Selects your desired Sound Mode.



- (a) Audio or Audio Language : Selects the sound output.
- ${\mathfrak G}^{{\hspace{-.1em}{\scriptsize z}}}$ Sleep Timer : Sets the sleep timer.
- **PR** Skip Off/On : Selects the Skip Off/On.
- USB Device : Selects "Eject" in order to eject USB device.

- Display each menu.
- Press the Q.MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.
ON SCREEN MENUS SELECTION AND ADJUSTMENT

Your TV's OSD (On Screen Display) may differ slightly from that shown in this manual.



- ▶ It is possible to use ISM Method in Plasma TV models only.
- ▶ It is possible to use Backlight, Power Indicator in LCD TV/LED LCD TV models only.
- ► It is not possible to use **CI Information** in Analogue mode.

Treble

Bass

• Reset

3

50

50



0

0

31





(Except for 32/37/42/47/55LE5***, 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***, 42/47LX6***, 50/60PK5**)



Image shown may differ from your TV.

Music List



02

Movie List

(Only 32/37/42/47/55LE5***, 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***, 42/47LX6***, 50/60PK5**)

WATCHING TV / PROGRAMME CONTROL

MY MEDIA

AUTO PROGRAMME TUNING

Use this to automatically find and store all available programmes.

When you start auto programming, all previously stored service information will be deleted. The maximum number of programmes that can be stored is 1,000. But the number may differ slightly depending on broadcasting signals.

DVB-T, DVB-C Auto Tuning is a menu for users in countries that support DVB cable.

If you want to select the Antenna,





• In the following country, DVB cable can be used : Germany, Netherlands, Sweden, Switzerland, Denmark, Austria, Finland, Norway, Slovenia, Hungary.(The supported country can be added.)

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

If you want to select the Cable,



- Acquired certification SO : Sweden(Comhem, Canal Digital), Denmark(YouSee, Canal Digital, Stofa), Norway(Canal Digital).
- If there are not any Service Operator that you want, select Other Operators.
- If you select "Other Operators", or the selected country supports "Other Operators" only, it may take some time to search all the channels, or it may not search some of the channels. If some of the channels do not appear, follow the steps below:

1. SETUP -> Auto Tuning -> Cable -> Setting

- 2. Switch Home Tuning from "Off" to "On"
- 3. Input additional values such as the frequency, symbol rate, modulation, and network ID. (You can ask your cable service provider for the above information.)
 - Press the **MENU/EXIT** button to return to normal TV viewing.
 - Press the **BACK** button to move to the previous menu screen.



■ When you select the Quick,

Home Tuning	I On I ■	
 Frequency(kHz) 	362000	
 Symbol rate(kS/s) 	6900	
Modulation	640QAM	
Network ID	Auto	
	0	
Start Frequency(kHz)	114000	
End Frequency(kHz)	862000	
Reset		
Close		

Quick	
Start Frequency(kHz)	: 114000
End Frequency(kHz)	: 862000
Network	: Auto
Setting	
ОК	
Close	





- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

 \gg

■ When you select the Full,







- If you wish to keep on auto tuning, select Start using the ^ ∨ button. Then, press the OK button. Otherwise select Close.
- Automatic Numbering: Decide whether to use the programme numbers as sent by broadcasting stations for tuning.
- Skip Scramble Programme : Scramble Programme is skipped in Auto Tuning and Manual Tuning.

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

The following values are needed in order to search all available programmes quickly and correctly. The commonly used values are provided as "default".

However, for correct settings, please inquire of the cable service provider.

When running Auto Tuning in DVB cable mode, selecting Full will search through all frequencies to find available channels.

In the case when the programme is not searched by selecting the Default, perform the searching by selecting the Full.

However, in the case when the programme is searched by selecting the Full, the Auto Tuning time can be taken too much.

- Frequency : Enter a user-defined frequency.
- **Symbol rate :** Enter a user-defined symbol rate (Symbol rate: Speed at which a device such as modem sends symbols to a channel).
- Modulation : Enter a user-defined modulation. (Modulation: Loading of audio or video signals onto carrier).
- Network ID : Unique identifier allocated for each user.
- Start Frequency : Enter a user-defined start frequency range.
- End Frequency : Enter a user-defined end frequency range.

CABLE DTV SETTING

(IN CABLE MODE ONLY)

The range that a user can select from the Service Operator menu differs depending on number of Service Operator supported by each country, and if number of supported Service Operator for each country is 1, corresponding function becomes non-activation.

After changing Service Operator, a warning window saying that channel map will be deleted when **OK** button is pressed or Close is selected, and a Auto-tuning pop-up window appears when '**YES**' is selected.

SETUR)	¢ Move ⊚ OK	3	SETUP	↓ №	love OK 	
• Progra • Boost • CI Infe	al Tuning Imme Edit	: Off		Auto Tuning Manual Tuning Programme Edit Booster Cl Information Cable DTV Setting	: Off	Service Operator Channel Auto Update	Comhem Coff



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

MANUAL PROGRAMME TUNING (IN DIGITAL MODE)

Manual Tuning lets you manually add a programme to your programme list.

If you want to select the Antenna,



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

If you want to select the Cable,

• Auto Tuning • Auto Tuning • Auto Tuning 362000 • Manual Tuning • Manual Tuning • Manual Tuning • Manual Tuning • Programme Edit • Booster • Off • Cl Information • Cable DTV Setting • Cable DTV Setting • Cable DTV Setting	SETUP • Move • OK		SETUP	✓ Cable DTV ►
	Manual Tuning Programme Edit Booster : Off Cl Information Cable DTV Setting	\gg	Manual Tuning Programme Edit Booster Cl Information Cable DTV Setting	Symbol rate(kS/s) 6875 Modulation 64QAM • Signal Strength • Signal Quality



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Close

MANUAL PROGRAMME TUNING (IN ANALOGUE MODE)

Manual Tuning lets you manually tune and arrange the stations in whatever order you desire.



- Press the **BACK** button to move to the previous menu screen.
- Use NUMBER buttons to input a 4-digit password in Lock System 'On'.
- L : SECAM L/L' (France)
 BG : PAL B/G, SECAM B/G (Europe / East Europe / Asia / New Zealand / M.East / Africa)
 I : PAL I (U.K. / Ireland / Hong Kong / South Africa)
 DK : PAL D/K, SECAM D/K (East Europe / China / Africa / CIS)
- To store another channel, repeat steps 4 to 9.



Assigning a station name

You can assign a station name with five characters to each programme number.



Fine Tuning

Normally fine tuning is only necessary if reception is poor.



- Press the **MENU/EXIT** button to return to normal TV viewing.
- \bullet Press the BACK button to move to the previous menu screen.

PROGRAMME EDIT

07 F

When a programme number is skipped, it means that you will be unable to select it using $P \land \lor$ button during TV viewing.

If you wish to select the skipped programme, directly enter the programme number with the NUMBER buttons or select it in the Programme edit menu.

This function enables you to skip the stored programmes.

You can change the programme number using "Move"function, if "Automatic Numbering" is unchecked when you start Auto Tuning.

	Programme Edit Favourite	Group : 🔼	Page 1/2
SETUP 🗘 Move 💿 OK	DTV	RADIO	TV
Auto Tuning	800 YLE TV1	801 YLE TV2	802 YLE FST
Manual Tuning	803 YLE24	804 YLE Teema	805 TV4 Stockholm
Programme Edit	806 Kanal Lokal	807 CNN	808 TV4
Booster : Off	809 TV4 Plus	810 TV400	811 TV4 Film
Cl Information	812 TV4 Fakta	813 MediaCorp HD5	814 SNY_SSU
	815 Demo	816 TVE 1	817 TVE 2
	818 24H TVE	819 CLAN/50 TVE	820 LA7
		▼	
	Pr. Change FAV Favour	ite Pr. Q.MENU Favourite Pr.	. Group 🔊 Previous
	P Page Change	Block/Unbloc	ck Skip
		or	
	Programme Edit Favourite	Group : 🔼	Page 1/2
	Cable DTV	Cable Radio Ca	ble TV
	800 YLE TV1	801 YLE TV2	802 YLE FST
	800 YLE TV1 803 YLE24	801 YLE TV2 804 YLE Teema	802 YLE FST 805 TV4
	803 YLE24	804 YLE Teema	805 TV4 Stockholm
	803 YLE24 806 Kanal Lokal	804 YLE Teema 807 CNN	805TV4 Stockholm808TV4
	803 YLE24 806 Kanal Lokal 809 TV4 Plus	804 YLE Teema 807 CNN 810 TV400	805 TV4 Stockholm 808 TV4 811 TV4 Film
	803 YLE24 806 Kanal Lokal 809 TV4 Plus 812 TV4 Fakta	804 YLE Teema 807 CNN 810 TV400 813 MediaCorp HD5	805 TV4 Stockholm 808 TV4 811 TV4 Film 814 SNY_SSU
	803 YLE24 806 Kanal Lokal 809 TV4 Plus 812 TV4 Fakta 815 Demo	804 YLE Teema 807 CNN 810 TV400 813 MediaCorp HD5 816 TVE 1	805 TV4 Stockholm 808 TV4 811 TV4 Film 814 SNY_SSU 817 TVE 2
	803 YLE24 806 Kanal Lokal 809 TV4 Plus 812 TV4 Fakta 815 Demo	804 YLE Teema 807 CNN 810 TV400 813 MediaCorp HD5 816 TVE 1 819 CLAN/50 TVE	805 TV4 Stockholm 808 TV4 811 TV4 Film 814 SNY_SSU 817 TVE 2 820 LA7



• Press the MENU/EXIT button to return to normal TV viewing.

• Press the **BACK** button to move to the previous menu screen.

IN DTV/RADIO MODE

Skipping a programme number



Select a programme number to be skipped.



Turn the programme number to blue.

BLUE) Release.

- When programmes are to be skipped, the skipped programme shows in blue and these programmes will not be selected by the $\mathbf{P} \wedge \vee$ buttons during TV viewing.
- If you wish to select a skipped programme, directly enter the programme number with the NUMBER buttons or select it in the programme edit or EPG.

It can be registered as Lock

System is turned Off.

programme even when Lock

Locking a programme number

Select a programme number to be locked.

(YELLOW) Turn the programme number to yellow.

YELLOW Release.

IN TV MODE

This function enables you to delete or skip the stored programmes. You can also move some channels and use other programme numbers.

Deleting a programme



Select a programme number to be deleted.

Turn the programme number to red.

• The selected programme is deleted, all the following programmes are shifted up one

Moving a programme



Select a programme number to be moved.



Turn the programme number to green.

	Г
Skipping a programme number	• When a programme number is skipped it
Select a programme number to be skipped.	means that you will be unable to select it using the $\mathbf{P} \land \lor$ button during normal TV viewing.
BLUE Turn the programme number to blue.	 If you wish to select a skipped programme, directly enter the programme number with the NUMBER buttons or select it in the
BLUE Release.	programme edit or EPG.

Auto Sort



Start Auto Sort.

After activating Auto Sort once, you can no longer edit programmes.

Locking a programme number



Select a programme number to be locked.

• It can be registered as Lock programme even when Lock System is turned Off.



YELLOW Release.

Trelease.

Selecting favourite programme

Favourite programmes is a convenient feature that lets you quickly scan up to programmes of your choice without having to wait for the TV to scan through all the in-between programmes.



Selecting favourite programme group



OK ◉

Select your desired programme.

Display a pop-up window where Favourite group can be changed.

Select a Favourite group.

BOOSTER

If reception is poor select Booster to "On". When the signal is strong, select "Off".





- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

CI [COMMON INTERFACE] INFORMATION

This function enables you to watch some encrypted services (pay services). If you remove the CI Module, you cannot watch pay services.

When the module is inserted into the CI slot, you can access the module menu.

To purchase a module and smart card, contact your dealer. Do not repeatedly insert or remove a CI module from the TV. This may cause a malfunction. When the TV is turned on after inserting a CI Module, you may not have any sound output.

This may be incompatible with the CI module and smart card.

CI (Common Interface) functions may not be possible depending upon the country broadcasting circumstances.

When using a CAM(Conditional Access Module), please make sure it meets fully the requirements of either DVB-CI or CI plus.

A abnormal process of CAM(Conditional Access Module) may cause a bad picture.





SOFTWARE UPDATE

You can update the TV with the latest software to enhance the product operation and/or add new features. You can update the software by connecting the TV directly to the software update server. The Software Update function may not work properly depending on your internet environment. In this case, you can obtain the latest software from the authorized LG Electronics Service Center then update your TV.





• Press the MENU/EXIT button to return to normal TV viewing.

· Use the Check Update Version to update the

latest software on the Network server manually.

• Press the BACK button to move to the previous menu screen.

When setting "Software Update"

Occasionally, a transmission of updated digital software information will result in the following menu on the TV screen.

⑦ Software update is available. Would you like to download now?
Yes
No
Simple Update : for current update stream

⑦ A new software update is available at 00/00/0 00:00. Do you want to update the software when available?
Yes
No

Download starts when "Yes" is selected. At this time, progressing pop-up window does not display.

Download progress status can be checked from Software Update menu.

 Software downloading progress. Ver. 00.00.01 ► Ver.00.00.02 4% Check Update Version Close 	Software Update
Check Update Version	
	4%
Close	Check Update Version
	Close

TV is restarted when download is completed.

 Update is completed. Rebooting now. 	
---	--

Schedule Update : for scheduled update stream When the Software Update menu is "Off", the message to change it to "On" appears.

When new Software is available when connected to Internet, the following message will be displayed.



- During Progress of a Software Update, please note the following:
- Power to the TV must not be interrupted.
- After Software Update, you can confirm the updated software version in Software Update menu.
- It may take hours to download the software, so make sure that the power stays on during the download. <Simple Update, Schedule Update>
- The antenna must not be disconnected.
- The software is downloaded only in Standby mode or in MUX with Software Update Service, and stops when the power cord is unplugged or when viewing MUX without Software Update Service.
- When you return to Standby mode or MUX with Software Update Service, the software download will resume from where it stopped.
- <Network Update>
- You do not disconnect the network while the software is being updated.
- When there is a new software update when you open NetCast, you will not be able to use NetCast without updating the software.
- You cannot open NetCast while the software is being updated.

PICTURE/SOUND TEST

This function is a customer support function that can execute picture and sound tests.



• Press the MENU/EXIT button to return to normal TV viewing.

• Press the BACK button to move to the previous menu screen.



WATCHIN TV / PROGRAMME CONTROL

SIGNAL TEST

This function enables you to view information on the Manufacturer, Model/Type, Serial Number and Software Version.

This displays the information and signal strength of the tuned *MUX.

This displays the signal information and service name of the selected MUX.

(*MUX: A higher directory of channels in digital broadcasting (a single MUX contains multiple channels.))





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

PRODUCT/SERVICE INFORMATION

This function is a customer support function that can see product/service information and customer service center information.





Used time, Customer service center and Homepage.

• Press the MENU/EXIT button to return to normal TV viewing.

 Press the BACK button to move to the previous menu screen.

NETWORK TEST

Check the network status.

~

OK ◉





SIMPLE MANUAL

You can easily and effectively access the TV information by viewing a simple manual on the TV. During the Simple Manual operation, audio will be muted.



Image shown may differ from your TV.

Remote Control Description	Contents Lis
From	1. Menu
日日	2.Auto Tuning
	3. Energy Saving
0	4.AV Mode
	5. Clear Voice II
	6.Picture Wizard
	7.MY MEDIA
Remote Control	-



- RED : Go to the Index page.
- BLUE : Play the Simple Manual automatically or manually.

Select the part of the manual you want to see.

SELECTING THE PROGRAMME LIST

You can check which programmes are stored in the memory by displaying the programme list.



Selecting a programme in the programme list



Select a programme.

Switch to the chosen programme number.



The mode will be switched between TV, DTV, and Radio from the programme you are currently watching.



INPUT LIST

HDMI and AV1 (SCART) can be recognized by a detect pin and thus enabled only when an external device approves voltage.

By using **TV/RAD** button, you can move from External Input to RF Input and to the last watched programme in DTV/RADIO/TV mode.



INPUT () OK Sele

Select the input source.

- Antenna or Cable : Select it when watching the DTV/RADIO/TV.
- **USB** : Select it when using USB depends on connector.
- **AV** : Select it when watching the VCR or external equipment.
- **Component** : Select it when using the DVD or the Digital set-top box depends on connector.
- **RGB** :Select it when using PC depends on connector.
- **HDMI** : Select it when using DVD, PC or Digital set-top box depend on connector.

INPUT LABEL

Selects a label for each input source.

Image shown may differ from your TV.



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\gg
```





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

DATA SERVICE

(This menu is enabled only in Ireland.)

This function allow users to choose between **MHEG(Digital Teletext)** and **Teletext** if both exist at the same time.

If only one of them exists, either **MHEG** or **Teletext** is enabled regardless of which option you selected.





• Press the MENU/EXIT button to return to normal TV viewing.

• Press the BACK button to move to the previous menu screen.

MHP SERVICE

(Only 32/37/42/47/55LE58**, 32/37/42/47/55LE78**, 42/47/55LE88**, 32/37/42/47/55LD68**, 32/42/47LD78**, 32/37/42LD88**, 42/47LX68** 50/60PK78**, 50/60PK98**)

(This menu is enabled only in Italy and MHP services of the other contries may not work properly.)

This function is Auto Start function of MHP, Italian data broadcast. Use in channel with MHP signal.

Data broadcast function may not be smooth due to situation from the broadcasting station.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

When MHP Auto Start is set to On



■ When MHP Auto Start is set to Off



- Press the EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

SIMPLINK

This function operates only with devices with the SIMPLINK logo. Please check the SIMPLINK logo.

This TV might not function properly when using it with other products with HDMI-CEC function. This allows you to control and play other AV devices connected to the display through HDMI cable without additional cables and settings.

If you do not want SIMPLINK menu, select "Off".

In wireless external output, SIMPLINK function is not supported.

(SIMF	ч∟іпк
	🔘 OK 🔗 Exit
•	On 🕨
Wa Wa	atch TV
	SC
🥔 VC	R
E HC	D Recorder
	Speaker

(Smplink)	Display the SIMPLINK .
	Select On or Off.
CK OK	Save.

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Connecting to Home Theater with the SIMPLINK logo.





Home Theater

When you select or operate a media device with home theater function, the speaker automatically switches to home theater speaker (HT speaker).

NOTE

- Connect the HDMI/DVI IN or HDMI IN terminal of the TV to the terminal (HDMI terminal) of the SIMPLINK device with the HDMI cable.
- When you switch the Input source using the INPUT button on the remote control, you can stop the operation of a device controlled by SIMPLINK.

SIMPLINK Functions

Disc playback

Control connected AV devices by pressing the $\land \lor \lt >$, OK, \blacktriangleright , \blacksquare , II, $\blacktriangleleft \blacklozenge$ and $\blacktriangleright \triangleright$ buttons.

Direct Play

After connecting AV devices to the TV, you can directly control the devices and play media without additional settings.

Select AV device

Enables you to select one of the AV devices connected to the TV and operate it.

Power off all devices

When you switch off the TV, all connected devices are turned off.

Switch audio-out

Offers an easy way to switch audio-out.

Sync Power on

When the equipment with Simplink function connected HDMI terminal starts to play, The TV will change automatically to turn on mode.

* A device, which is connected to the TV through an HDMI cable but does not support SIMPLINK, does not provide this function.

Note: To operate SIMPLINK, an High Speed HDMI Cable with *CEC function should be used. (*CEC: Consumer Electronics Control).

SIMPLINK Menu

Press the ^ < > button and then OK button to select the desired SIMPLINK source.

- TV viewing : Switch to the previous TV programme regardless of the current mode.
- DISC playback : Select and play connected discs.

When multiple discs are available, the device type of discs are conveniently displayed at the bottom of the screen.

- OVCR playback : Play and control the connected VCR.
- HDD Recordings playback : Play and control recordings stored in HDD.
- G Audio Out to Home theater/Audio Out to TV: Select Home theater or TV speaker for Audio Out.



• Home theater: Only one supported at a time

• DVD, Recorder: Up to three(Only 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***), four(Only 32/37/42/47/55LE5***, 32/37/42/47/55LE7***, 42/47/55LE8***, 42/47LX6***, 50/60PK5**, 50/60PK7***, 50/60PK9***) supported at a time.

VCR: Only one supported at a time

AV MODE

You can select the optimal images and sounds when connecting AV devices to external input.

OffDisables the AV MODE.Cinema or IEX CinemaOptimizes video and audio for watching movies.SportOptimizes video and audio for watching sports events.GameOptimizes video and audio for playing games.





- If you select **Cinema or** <u>IHX</u> **Cinema** in AV mode, **Cinema or** <u>IHX</u> **Cinema** will be selected both for **Picture Mode** and **Sound Mode** in **PICTURE** menu and **AUDIO** menu respectively.
- If you select "**Off**" in AV mode, the picture and image which you initially set will be selected.
INITIALIZING (RESET TO ORIGINAL FACTORY SETTINGS)

This function initializes all settings.

But the settings of **Day** and **W Night** of the **Picture Mode** cannot be initialized. It is useful to initialize the product or when you move to other city or country. When the Factory Reset is completed, you must restart the Initializing setup.

When the Lock System menu is "On", the message to enter the password appears.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

NETCAST

LEGAL NOTICE

S	NETWORK	
٥	Network Setting	: Wired
	Network Status	: Internet is connected
\odot	Legal Notice	۲
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		Page 1/3
All content and services protected by copyri content and services not use any content content owner or s authorized by the a upload, post, transi any manner or med YOU EXPRESSLY AC	E RELATING TO NETWORK SERVICE vices accessible through this device bel ght, patent, trademark and/or other intell are provided solely for your personal non t or services in a manner that has not be rervice provider. Without limiting the for pplicable content owner or service prov mit, translate, sell, modify, create deriva dium any content or services displayed t XKNOWLEDGE AND AGREE THAT THE DE VICES ARE PROVIDED AS IS WITHOUT W	lectual property laws. Such commercial use. You may een authorized by the egoing, unless expressly ider, you may not copy, tive works, or distribute in through this device. VICE AND ALL THIRD PART
EITHER EXPRESS C	OR IMPLIED. LG ELECTRONICS EXPRESS	LY DISCLAIMS ALL
WARRANTIES AND (CONDITIONS WITH RESPECT TO ANY CON	NTENT AND SERVICES,



• Press the **MENU/EXIT** button to return to normal TV viewing.

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NETCAST

NETCAST MENU

These services are provided by separate Content Provider.

Please visit the content providers web site for specific information on their services. (But, some content manual maybe not provide depending on Content Provider).

NetCast menu source can differ by country.



Select **NETCAST** menu option.



NOTE

OK

- ▶ The videos list searched from the TV may different with the list searched from a web browser on PC.
- ▶ The settings of this TV do not affect the YouTube's playback quality.
- The playback videos may be paused, stopped or buffering occurring often depending on your broadband speed.

We recommend a minimum connection speed of 1.5 Mbps. For the best playback condition, a connection speed of 4.0 Mbps is required. Sometimes your broadband speed varies based on your ISP's network conditions. Contact your ISP if you have problems maintaining a fast connection that is reliable, or if you want to increase your connection speed. Many ISPs offer a variety of broadband speed options.

- ► To view the owner's manual that provided by the Content Provider, visit our website at http://www.lg.com.
- ► To see the activation method of Orange or maxdome, click the Orange, maxdome in the CD manual (Only Frence or German).
- For service that requires log in, join the applicable service on the website using the PC and log in through the TV to enjoy various additional functionalities.
- When you set the city you want with Setup by pressing the red button, the background of NetCast will be set to the weather of the selected city.
- ► If there is no user action 2 minutes following freezing image or video on screen, the screensaver will activate itself preventing fixed image remaining on screen. (Plasma TV only)
 - Press the RED button to select Weather of area.
 - Press the EXIT button to return to normal TV viewing.

YOUTUBE

YouTube is a video sharing website where users can upload, view, and share video clips.

YouTube Screen Components



NOTE

► When you press the Q.menu button while the Youtube video is playing in full mode, you can set the video options.

NETCAST

YouTube Service menu

- Home: You can watch the popular video in real time.
- Featured: The featured videos list will be displayed.
- Popular: The best rated videos list from YouTube server will be displayed.
- Most Viewed: The most viewed videos list will be displayed.
- Search: The keypad/keyboard menu will be displayed.
- **History**: The videos list that you previously played will be displayed. Maximum of 20 videos can be stored.
- **Favorites**: In sign-in status, this menu will be displayed the videos list that is arranged in the YouTube server with your account (Some videos may not appear on the **Favorites** list, even if the videos are arranged in the server).
- Sign in (Sign Out): Displays the keypad/keyboard menu to sign in or returns to the sign-out status.

Using the remote control

	Stops the video and displays related videos list.
Ш	Pause the video while it is playing.
	Play the selected video.
	Skip the playback forward or backward.
RED	Set the option menu.
Margan	Return to Netcast menu.
EXIT	Return to TV viewing.

ACCUWEATHER

Accuweather is the programme to view the weather of the city the user wants.

AccuWeather Screen Components

AccuWeather menu 0 Weather list by city Eavorite City Orresponding buttons on the remote control 2 3 RED Change between Celsius and Fahrenheit. Move the focus to the menu you want. OK Select the focused menu. etCast Return to Netcast menu. Return to TV viewing. EXIT

AccuWeather Service menu

- Home: The weather of selected city is displayed.
- Favorite City: Frequently checked cities can be registered to check the weather.

NOTE

- ► By default, New York, London and Paris are registered and the user can add/delete cities from Favorite City.
- ► LG is not responsible for the accuracy of the weather forecast.
- Applicable weather information can differ from the actual weather depending on the information provided by Accuweather.

NETCAST

PICASA

Picasa is an application from Google that appreciates digital image files.

Picasa Screen Components



Picasa Service menu

- Home: The featured photos list will be displayed.
- Friends: You can register users with the pictures you want as friends. You can add up to 10 friends.
- Search: The keypad/keyboard menu will be displayed.
- My Photos: You can view the pictures uploaded to the Web. This function can only be used when you sign in.
- Sign in (Sign Out): Displays the keypad/keyboard menu to sign in or returns to the sign-out status.

TO USE THE BLUETOOTH

(Except for 32/37/42/47/55LE5***, 32/37/42/47/55LD6***, 32/42/47LD7***, 32/37/42LD8***, 42/47LX6***, 50/60PK5**)

BLUETOOTH?

Bluetooth is a short distance networking technology using 2.4 GHz frequency to connect various types of information devices such as computers, cell phones and PDAs, as well as digital appliances through wireless connection, without having to connect any cable, to enable data exchange.

With the Bluetooth communication function, you can connect the Bluetooth enabled wireless headset or receive images(only JPEG), listen to music from the Bluetooth enabled cell phone using this TV.

- Communication Spec.: Bluetooth Specification Version 2.0 + EDR (Enhanced Data Rate)
- Output: Bluetooth Specification Power Class 2
- Maximum Communication Range: Line of open sight approx. 10 m (30 ft)
- Frequency Band: 2.4 GHz band (2.4 GHz to 2.4835 GHz)
- Bluetooth Module: RBFS-B921A(Plasma TV), RBFS-B721A(LCD/LED LCD TV) (LG Electronics)
- Compatible Bluetooth Profile : GAVDP(Generic Audio/Video Distribution Profile)
 - A2DP(Advanced Audio Distribution Profile)

HSP(Headset Profile) OPP(Object Push Profile) BIP(Basic Imaging Profile) FTP(File Transfer Profile)

CE 0700

Precautions when using the Bluetooth

- ► Use within 7 m (-45° to 45°) range.
- ► If you use the device out of the range or within the range with obstacles, it can result in communication error.
- ► Communication error can occur depending on the surrounding devices.
- Products using the same frequency of 2.4 GHz (Wireless LAN, microwave oven etc.), can cause communication error by using the same frequency bandwidth.
- ▶ The device search time differs depending on the number of Bluetooth devices and the operating situation.
- ▶ The probability of search increases with less number of devices.
- ► Electromagnetic wave can be interfered with applicable wireless devices.
- Because applicable wireless devices have the possibility of electromagnetic wave interference, they cannot provide services related to human life.
- ▶ You can only connect one Bluetooth device at a time.
- ► You cannot receive photos(only JPEG) or listen to music from other Bluetooth devices while using the Bluetooth headset.
- ► For details of Bluetooth, refer to the user manual of the Bluetooth device.
- Operation is subject to the following two conditions : (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation of the device.
- ▶ Bluetooth can be used about 30 seconds after the power is turned on.
- Depending on the transmission processing method and performance of the headset used, the audio can be instantly disconnected.

QDID(Qualified Design Identity) : B015199

SETTING THE BLUETOOTH

If you want to listen to the broadcasted sound using the Bluetooth headset or receive the jpeg images from an external device and view them on the TV, listen to music from cell phone(Bluetooth device), you can use the wireless communication without having to connect any cables.

You can use the BLUETOOTH menu by selecting "**Bluetooth on**". If you do not want to use the Bluetooth function, select "**Bluetooth off**".

If it is connected to the external Bluetooth device, you can select "**Bluetooth off**" after disconnecting the device.

• Press the EXIT button to return to normal TV viewing.

• Press the **BACK** button to move to the previous menu screen.





TO USE A BLUETOOTH

BLUETOOTH HEADSET

When you select the Bluetooth headset, you can listen to the TV sound in the Bluetooth headset through wireless communication.

You must pair it with any new Bluetooth device before the first use. For details, refer to the user manual of the applicable device.

A maximum of 12 devices can be paired.

When the unit is searching for the Bluetooth headset, other buttons except for the "Stop" (OK button) do not work.

Connecting a new Bluetooth headset

You can only search for the new Bluetooth headset only in the **Disconnected** condition. When you run the search, it will show you the list of all Bluetooth headsets responding. After new Bluetooth device is searched, the PIN number is validated to connect the device. For details, refer to the user manual of the applicable device.

Bluetooth	∂ ∿ Exit	Searching Bluetooth heads
Didelootii	🗘 Move 💿 OK	
Bluetooth off	No Bluetooth device.	42LH70YD-SE
Search headset		
	My Info	Stop searching



- Press the **EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Connecting to Bluetooth headset already registered

Bluetooth headsets are listed in the order most recently used with the headset currently in use listed at the top.

When connecting to the Bluetooth device already registered, you can select and connect directly without any PIN validation.





- After connecting/using the Bluetooth headset, the headset setting will be the **Disconnected** condition automatically when you turn off the power of the TV and then turn on.
- After connecting the Bluetooth headset, the TV speaker is switched to Mute condition and the sound will only be generated from the headset.
 - Press the EXIT button to return to normal TV viewing.
 - Press the **BACK** button to move to the previous menu screen.

TO USE A BLUETOOTH

Disconnecting the Bluetooth headset during use





- Press the EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

When requesting to connect to TV from the Bluetooth headset

When the Bluetooth menu is "On" and there is a connection request from the headset, this message is displayed.

Not all headsets support the this feature.(Refer to the user manual of the applicable Bluetooth headset.)

Some headset types may make an attempt at connection when they are turned off/on even though they are not included in the Registered Device list.





NOTE

 LG recommends the following headset models.

-Plantronics VOYAGER-855 / SONY HBH-DS970, HBH-DS980 / Motorola S605 There might be an audio delay, depending on the buffer memory size of the headset.

- The stereo/mono headset officially certified to be Bluetooth compatible can be searched and connected.
- The stereo/mono headset that supports the A2DP or HSP function among the Bluetooth devices can be connected.
- If the surrounding environment of the TV is as follows, the device may not be searched or connected properly.
 - -If there is strong electromagnetic wave.
 - -If there are many Bluetooth devices.

-If the headset is turned off, not in place or has an error.

-Because products such as microwave oven, wireless LAN, plasma light, gas range etc., use the same frequency range, it can cause communication error.

Only one Bluetooth headset can be connected at once.

- Connection that is lost due to the TV being turned off etc. will not be automatically recovered. Try connecting the applicable device again.
- Some operations can be slower while operating the headset.
- Even if you choose simplink Home Theater after using the headset during Simplink operation, the unit will not automatically switch to Home Theater speakers.
- ► When the headset connection continuously fails, pair the device one more time.
- The audio quality of mono headsets will not be as good as that for stereo headsets.
- Mono headsets may suffer from noise as the distance from the TV increases, because they use a different transmission method compared with stereo headsets.
- When a Bluetooth headset is in use, the Volume +/- and Mute keys do not work, and the Audio menu returns to the default value and is disabled.
- With Bluetooth set to On, if any registered devices are turned on, the TV will switch to Bluetooth mode automatically even though you are watching in another input mode. In this case, set Bluetooth to Off.

TO USE A BLUETOOTH

REMOVE THE BLUETOOTH DEVICE

When 12 devices are registered, you cannot register any more devices, and the external device will no longer be able to pair up with the TV. In this case, you should delete one (disconnect first if a device is connected to the TV) and then you can register another device.

"Remove device" will be available when selecting the device that is not connected to the TV.





- Press the **EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

്ം Exit

Cancel

My Info

MY BLUETOOTH INFORMATION

This function provides the My Bluetooth Information to the user. "Edit" will be available when TV is not connected with any device.

You can edit the Setup TV PIN or Setup TV name. You can check the TV address.

To accept connection from an external Bluetooth device or to connect to an external Bluetooth device, the PIN needs to be entered.

For details on how to set the PIN of the external Bluetooth device, refer to the user manual of the applicable device.

The TV PIN is composed of numbers of up to 16 digits. The TV PIN must have more than 1 digit.



- Press the **EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

TO USE A BLUETOOTH

RECEIVING PHOTOS FROM EXTERNAL BLUETOOTH DEVICE

For details on how to send photos(only JPEG) from the external Bluetooth device to TV, refer to the user manual of the applicable device.

Receiving picture(s)		
്	Cancel	



When you select Hide with the ^ v < > button, the OSD will disappear.
And when you press the OK button again, it will appear again.



(Rotate) : Rotate photos.

■ Rotates the photo 90° clockwise upon **OK** button on **(Rotate)**.

 \gg

- The maximum accumulated size of the image(s) that can be received is 10MBytes.
- You cannot receive the image(s) while using the Bluetooth headset.
- You cannot receive the image(s) while listening to music from Bluetooth device.
- When the external Bluetooth device is currently sending the photo, press the **BACK** button to stop receiving the photo. All photos already received will be deleted as a result.
- With some Bluetooth devices, you may not be able to transmit an image (JPEG) file to the TV set.

LISTENING TO THE MUSICS FROM EXTERNAL BLUETOOTH DEVICE

For details on how to listen to the musics from the external Bluetooth device to TV, refer to the user manual of the applicable device.

You should use the Bluetooth device supporting A2DP(as external device).

- With some Bluetooth devices, you may not be able to listen to music via the TV speaker system.
- With some Bluetooth device, the sound can be slow or discontinued from time to time.

Listening to bluetooth music...
Press any key to finish.

- Press the \triangle + or button to adjust the volume.
- If you wish to switch the sound off, press the MUTE button.
- Press the **BACK** button to return to normal TV viewing.

NOTE

- ▶ You cannot listen to music while using the Bluetooth headset.
- ► You cannot listen to music while receiving image(s).

TO USE 3D VIDEO (Only 42/47LX6***)

3D VIDEO

This TV can display 3D video when received from a compatible device. 3D video contains two pictures for each video frame formatted for each eye. Therefore, special 3D glasses are required to view 3D video.

- On initial power on after turning the power on, the may need a few seconds to calibrate with the TV.
- It may take some time to see standard stereoscopic if you look at other places and stereoscopic again while watching stereoscopic.
- ► It may flicker slightly on TV while watching stereoscopic under 3 wavelength lamp fluorescent light(50 Hz~60 Hz) or around windows. If so, it is recommended to block the sun light with a curtain and to turn lights low.
- When watching with other company's 3D glasses, the 3D video may not work normally.
- If there is an obstacle between the emitter and the 3D glasses, 3D vision cannot be viewed normally.
- ► Use TV as far as possible from other electronic equipments and IR equipments.

Caution when viewing 3D video

► When viewing 3D video, watch the TV within effective viewing angle and distance.

- If you exceed the viewing angle or distance, you may not be able to view 3D video.
- ► If the receiving range is out of the specified range, the screen may not be viewable as 3D video. When watching while lying down, the screen may not be visible.
- ▶ If you watch 3D video too closely for a long period of time, it may hurt you eyesight.
- Watching TV or game screen with 3D video glasses for a long period of time can cause drowsiness or fatigue to your eyes.
 - If you feel headache, fatigue or drowsiness, stop watching TV and take a rest.
- Pregnant woman, senior, person with heart problem or frequent drowsiness should refrain from watching 3D video.
- Some 3D video may cause you to duck or dodge the image in the video. Do not watch 3D video near fragile objects or any objects that can be knocked over easily.
- Please prevent children under the age of 5 from watching 3D video. It may cause problems to normal vision development.
- Warning for photosensitization seizure

Specific image from the video game and light or specific pattern from the video can cause a seizure to some individuals. If you or anybody from your family has a history of epilepsy or seizure, please consult your doctor before watching 3D video.

Also the following symptoms can occur in unspecified conditions without any previous history.

- If you experience dizziness, visual transition, visual or facial instability, unconscious action, convulsion, loss of conscience, confusion, loss of directional sense or nausea during or after watching 3D video, immediately stop watching 3D video and consult the doctor.

Risk of photosensitization seizure can be reduced with the following actions.

- Take 5-15 minutes of break for every 1 hour watched.

- For anyone that has a difference in the vision between the eyes, watch after taking vision correction measures.

- Watch at eye level with the 3D screen, directly in front of the screen.
- When you feel fatigued, dizzy or have a headache, stop watching and take a break.
- Do not watch 3D video when sleepy, tired or sick, and avoid watching 3D video for a long period of time.

CAUTION WHEN USING 3D GLASSES

- ▶ 3D glasses is sold separately. Refer to the 3D glasses manual for operating instructions.
- ▶ Do not use the 3D glasses to replace the general glasses, sunglasses or protective goggles.
- ▶ Do not store the 3D glasses in hot or cold location.
- ▶ Do not drop objects onto the 3D glasses. Do not drop or bend the glasses.
- Since the lenses of the 3D glasses are easily scratched, make sure to clean only with a soft cloth. As the product may be scratched if there is any foreign material on the cloth, shake off any dust before using it.

3D VIDEO VIEWING RANGE

TV size, viewing angle & other circumstances may change the viewing distance and the angle of view.

Viewing Distance	2 m - 7 m
Viewing	120 °
Angle	(When the viewing distance is 2 m)



TO USE 3D VIDEO

WATCHING 3D VIDEO

1 Play the title produced in 3D video.

Refer to the following for 3D video input format supported.

	Signal	Resolution	Horizontal Frequency (kHz)	Vertical Frequency (Hz)	Playable 3D video format
		1280x720	45	60	Top & Bottom, Side by Side
	720p		89.9/90	59.94/60	HDMI (V. 1.4 with 3D) Frame Packing
	720p		37.5		Top & Bottom, Side by Side
			75	50	HDMI (V. 1.4 with 3D) Frame Packing
	1000;	1920X1080	33.75	60	Tan & Dattam Sida by Sida
	1080i		28.125	50	Top & Bottom, Side by Side
HDMI Input		1920X1080	67.50	60	Top & Bottom, Side by Side,
mpar			56.250	50	Checker Board, Single Frame Sequential
	1080p		27	24	Top & Bottom, Side by Side, Checker Board
			53.95/54	23.98/24	HDMI (V. 1.4 with 3D) Frame Packing
			33.75	30	Top & Bottom, Side by Side, Checker Board
USB Input	1080p	1920X1080	33.75	30	Top & Bottom, Side by Side, Checker Board

For 3D video feed that is input in the HDMI (V. 1.4 with 3D) Frame Packing format, it is automatically switched to 3D.

Media contents and a player need to support HDMI (V. 1.4 with 3D) Frame Packing to play Frame Packing format stereoscopic.

Video, which is input as HDMI (V. 1.4 with 3D) Frame Packing format, is switched into the stereoscopic screen automatically.



After selecting the shape as shown in the screen on TV, wear the 3D glasses.

To turn on 3D Mode, select this icon.







Select Left/Right or Right/Left. Select the screen with 3D video with better visibility.

Setting Left/Right	
\checkmark	Left/Right
	Right/Left
30	End 3D video
	🐢 Exit

• Press the **3D** button to return to normal TV viewing.

NOTE

- Some menus may not work while watching 3D video.
- You can only choose→Standard → Movie → Game with the AV MODE button on remote control. AV Mode is set as Standard while playing 3D video.
- ► 3D video does not work during external input lock, external input transition, editing Input Label, MY MEDIA menu and SIMPLINK.
- 3D effect can be seen when 3D Mode is selected appropriately for the 3D input signal supplied to the TV.
- ▶ Picture mode is set as Standard, Energy Saving Off if entering to 3D mode.
- ▶ While watching stereoscopic images, you cannot adjust video/audio settings using the menu.
- ▶ For *.mpo file (3D camera file), the stereoscopic mode is set to on automatically.
- ► DTV does not support 3D mode.

TO USE A USB OR PC DEVICE

WHEN CONNECTING A USB DEVICE

When you connect a USB device, this pop up menu is displayed, automatically. "POP UP MENU" will not be displayed while the OSD including Menu, EPG or Schedule list is activated or while the Bluetooth Headset is connected.

When the Pop Up menu appears, you can select Music List, Photo List or Movie List in the MY MEDIA menu. In USB device, you can not add a new folder or delete the existing folder.

After choosing the desired type of media, choose a device to open files from. The options are: USB device or DLNA.



Precautions when using the USB device

- ► Only a USB storage device is recognizable.
- ▶ If the USB storage device is connected through a USB hub, the device is not recognizable.
- ► A USB storage device using an automatic recognition programme may not be recognized.
- ► A USB storage device which uses its own driver may not be recognized.
- ▶ The recognition speed of a USB storage device may depend on each device.
- Please do not turn off the TV or unplug the USB device when the connected USB storage device is working. When such device is suddenly separated or unplugged, the stored files or the USB storage device may be damaged.
- Please do not connect the USB storage device which was artificially maneuvered on the PC. The device may cause the product to malfunction or fail to be played. Never forget to use only a USB storage device which has normal music files, image files or movie files.
- Please use only a USB storage device which was formatted as a FAT32 file system, NTFS file system provided with the Windows operating system. In case of a storage device formatted as a different utility programme which is not supported by Windows, it may not be recognized.
- Please connect power to a USB storage device(over 0.5 A) which requires an external power supply. If not, the device may not be recognized.
- ▶ Please connect a USB storage device with the cable offered by the device maker.
- Some USB storage devices may not be supported or operated smoothly.
- ► File alignment method of USB storage device is similar to Window XP and filename can recognize up to 100 English characters.
- Be sure to back up important files since data stored in a USB memory device may be damaged. We will not be responsible for any data loss.
- ► If the USB HDD does not have an external power source, the USB device may not be detected. So be sure to connect the external power source. Please use a power adaptor for an external power source. We do not guarantee an USB cable for an external power source.
- If your USB memory device has multiple partitions, or if you use a USB multi-card reader, you can use up to 4 partitions or USB memory devices.
- ▶ If a USB memory device is connected to a USB multi-card reader, its volume data may not be detected.
- ▶ If the USB memory device does not work properly, disconnect and reconnect it.
- ▶ How fast a USB memory device is detected differs from device to device.
- If the USB is connected in Standby Mode, specific hard disk will automatically be loaded when the TV is turned on.
- The recommended capacity is 1 TB or less for a USB external hard disk and 32 GB or less for USB memory.
- ► Any device with more than the recommended capacity may not work properly.
- If a USB external hard disk with a "Energy Saving" function does not work, turn the hard disk off and on again to make it work properly.
- USB storage devices below USB 2.0 are supported as well. But they may not work properly in the movie list.
- ► Maximum of 999 folders or files can be recognized under one folder.
- ▶ If there are too many folders and files in one folder, it may not operate properly.

TO USE A USB OR PC DEVICE

DLNA

About DLNA

This TV is a DLNA Certified digital media product.

It can display and play a movie, photo and music content from your DLNA server.

The Digital Living Network Alliance (DLNA) is a cross-industry organization of consumer electronics, computing industry and mobile device companies. Digital Living provides consumers with easy sharing of digital media through a wired or wireless network in the home.

The DLNA certification logo makes it easy to find products that comply with the DLNA Interoperability Guidelines. This unit complies with DLNA Interoperability Guidelines v1.5. When a PC running DLNA server software or other DLNA compatible device is connected to this TV, some setting changes of software or other devices may be required. Please refer to the operating instructions for the software or device for more information.

- The supplied Nero MediaHome 4 Essentials CD-ROM is a customized software edition only for sharing files and folders to this TV.
- ► The supplied Nero MediaHome 4 Essentials software does not support following functions: Transcoding, Remote UI, TV control, Internet services and Apple iTunes
- ► This manual explains operations with the English version of Nero MediaHome 4 Essentials as examples. Follow the explanation referring to the actual operations of your language version.
- ▶ If there are too many folders and files in one folder, it may not operate properly.
- ► For the DLNA option, use the Nero MediaHome programme that is provided with the TV. However, we cannot guarantee that third party programmes will work perfectly.
- > You can select a channel while viewing the small preview channel list on your TV screen.
- Check your network settings when the DLNA option does not work properly.
- If there is an abnormal operation or an error occurs in Nero Media Home, the DLNA option may not work properly. In this case, exit Nero Media Home and restart the programme. You can download the latest version of Nero Media Home by clicking the question mark at the bottom-left of the programme.
- ▶ When the network is unstable, the device may be slower or may need to load during playback.
- When playing a video in DLNA mode, the Multi Audio and Closed Caption features are not supported.
- ► When selecting Full Screen in DLNA mode, the ratio of the outputted screen may differ from the original.
- When more than one TV is connected to a single server in DLNA mode, a file may not play properly, depending on the server performance.
- ▶ If the play time information is not provided by the server, it is displayed as "--:--."
- ► When using Movie List, DRM/*.tp /*.trp files in the DLNA server cannot be played.
- DLNA operation may not work properly according to the AP manufacturers.

Installing Nero MediaHome 4 Essentials

Nero MediaHome 4 Essentials is easy to use DLNA server software for Windows.

Requirement PC system before you install Nero MediaHome 4 Essentials

- Windows® XP (Service Pack 2 or higher), Windows Vista® (no Service Pack required), Windows® XP Media Center Edition 2005 (Service Pack 2 or higher), Windows Server® 2003
- Windows Vista® 64-bit edition (application runs in 32-bit mode)
- Hard drive space: 200 MB hard drive space for a typical installation of Nero MediaHome standalone
- 1.2 GHz Intel® Pentium® III or AMD Sempron[™] 2200+ processors
- Memory: 256 MB RAM
- Graphics card with at least 32 MB video memory, minimum resolution of 800 x 600 pixels, and 16-bit colour settings
- Windows® Internet Explorer® 6.0 or higher
- DirectX® 9.0c revision 30 (August 2006) or higher
- Network environment: 100 Mb Ethernet, WLAN (IEEE 802.11 b/g/n) (IEEE 802.11 n: Except for Russia)
- 1 Start up your computer, and insert the Nero MediaHome 4 Essentials CD-ROM into your computer's CD-ROM drive.

An installation wizard will walk you through the quick and uncomplicated installation process.

- 2 Close all Microsoft Windows programmes and exit any anti-virus software that may be running.
- 3 Insert the Nero MediaHome 4 Essentials CD-ROM into your computer's CD-ROM drive.
- 4 Click **Nero MediaHome 4 Essentials**. The installation is prepared and the installation wizard appears.
- 5 Click the **Next** button to display the serial number input screen. Click **Next** to go to the next step.
- 6 If you accept all conditions, click I accept the License Conditions check box and click Next. Installation is not possible without this agreement.
- 7 Click **Typical** and click **Next**. The installation process is started.
- 8 If you want to take part in the anonymous collection of data, select the check box and click the **Next** button.
- 9 Click the **Exit** button to complete the installation.

TO USE A USB OR PC DEVICE

Sharing files and folders

After installing Nero MediaHome, you must add folders you wish to share.

- 1 Double-click the Nero MediaHome 4 Essentials icon on the desktop.
- 2 Click **Network** icon on the left and define your network name in the **Network name** field. The Network name you enter will be recognized by your TV.
- 3 Click Shares icon on the left.
- 4 Click Local Folders tab on the Shared screen.
- 5 Click Add icon to open the Browse Folder window.
- 6 Select the folder containing the files you want to share. The selected folder is added to the list of shared folders.
- 7 Click Start Server icon to start the server.

NOTE

- If the shared folders or files are not displayed on the TV, click the folder on the Local Folders tab and click Rescan Folder at the More button.
- ▶ Visit **www.nero.com** for more information and software tools.

Playing back shared contents

You can display and play movie, photo and music content stored on your computer or other DLNA media servers.

1 Start the server on your computer or other device that connected on your home network.



Select MY MEDIA.

Select Movie List, Photo List or Music List.

Select the DLNA.

Depending on the media server, this TV may need to get the permission from the server.

If you want to re-scan available media server, press blue colour button.

NOTE

- ► To play the file on the media server, the TV and the media server must be connected to the same access point.
- Because the compatibility and available playback functions on the MY MEDIA menu are tested on the bundle DLNA server (Nero MediaHome 4 Essentials) environment, file requirements and playback functions on the MY MEDIA may differ depending on media servers.
- ► The file requirements on this page are not always compatible. There may have some restrictions by file features and media server's ability.
- Even the files that are not supported can be displayed in photo thumbnail or music thumbnail.
- ► Movie thumbnail is not supported in DLNA Movie.
- ► If there is an unplayable music file in the **MY MEDIA** menu, the TV will skip the file and play next file.
- ► The file information indicated on the screen may not always correct for music and movie files in MY MEDIA menu.
- ► This TV only supports movie subtitle files supplied by Nero MediaHome 4.
- ► The subtitle file name and movie file name have to be the same and located at the same folder.
- ► If subtitle files have been added after a directory has been indexed already, the user has to remove and re-add the folder to the list of shares.
- ► The playback and operating quality of the **MY MEDIA** function may be affected by your home network condition.
- ► The files from removable media such as USB drive, DVD-drive etc. on your media server may not share properly.
- ► When playing the Media through DLNA connection, it does not support the DivX file play which is protected by DRM.
- ▶ Up to 200 folders in one folder and 999 including folders and files can be recognized.
- ▶ If there are too many folders and files in one folder, it may not operate properly.

TO USE A USB OR PC DEVICE

MOVIE LIST

You can play movie files on a USB or PC storage device.

The movie list is activated once USB is detected. It is used when playing movie files on TV.

Displays the movies in the USB folder and supports Play.

Allows playback of all movies in the folder and user desired files.

It is a movie list that displays folder information and movie file.

The On Screen Display may be different from your TV. Images are an example to assist with the TV operation.

Movie(*.mpg/*.mpeg/*.dat/*.ts/*.trp/*.tp/*.vob/*.mp4/*.mov/*.mkv/*.dvix/*.avi/*.asf/*.wmv/*.avi(motion-jpeg)/*.mp4(motion-jpeg)/*.mp4(motion-jpeg)/*.mkv(motion-jpeg))supporting file

Video format : DivX3.11, DivX4.12, DivX5.x, DivX6, Xvid1.00, Xvid1.01, Xvid1.02, Xvid1.03, Xvid1.10 beta-1/beta-2, Mpeg-1, Mpeg-2, Mpeg-4, H.264/AVC, VC1, JPEG, Sorenson H.263

Audio format : Dolby Digital, AAC, Mpeg, MP3, LPCM, HE-AAC, ADPCM, WMA

Bit rate : within 32 kbps to 320 kbps(MP3)

External Subtitle format : *.smi/*.srt/*.sub(MicroDVD,Subviewer1.0/2.0)/*.ass/*.ssa/*.txt(TMPlayer)/*.psb(PowerDivX) Internal Subtitle format : only, XSUB (It is the subtitle format used in DivX6 files)

- Some user-created subtitles may not work properly.
- Some special characters are not supported in subtitles.
- HTML tags are not supported in subtitles.
- Subtitles in languages other than the supported languages are not available.
- · Changing font and colour in subtitles is not supported.
- · Subtitles in languages other than one specified are not supported.
- Video files with subtitle files of 1 MB or larger may not be played properly.
- The screen may suffer temporary interruptions (image stoppage, faster playback, etc.) when the audio language is changed.
- A damaged movie file may not be played correctly, or some player functions may not be usable.
- · Movie files produced with some encoders may not be played correctly.
- If the video and audio structure of recorded file is not interleaved, either video or audio is outputted.
- HD videos with a maximum of 1920x1080@25/30P or 1280x720@50/60P are supported, depending on the frame.
- Videos with resolutions higher than 1920X1080@25/30P or 1280x720@50/60P may not work properly depending on the frame.
- · Movie files other than the specified types and formats may not work properly.
- Max bitrate of playable movie file is 20 Mbps.
- We do not guarantee smooth playback of profiles encoded level 4.1 or higher in H.264/AVC.
- DTS Audio codec is not supported.
- A movie file more than 30 GB in file size is not supported for playback.
- A DivX movie file and its subtitle file must be located in the same folder.
- A video file name and its subtitle file name must be identical for it to be displayed.
- Playing a video via a USB connection that doesn't support high speed may not work properly.
- The movie file encoded by the GMC (Global Motion Compensation) and Qpel (Quarterpel Motion Estimation) is not supported.
- When you are watching the movie by Movie List function, you can adjust an image by **Energy Saving** and **AV Mode** key on the remote control. User setup for each image mode does not operate.
- Trick Mode does not support other functions than ▶▶ if video files do not have index information.
- When playing video file using network, the Trick mode is limited to 2-times speed.
- Video file names that contain special characters may not be playable.

Supported DivX file

File Extensions	A/V	Codec	Profile/Level Support	Explanation	
		VC-1 Advanced Profile	Advanced Profile@Level 3 (e.g. 720p60, 1080i60, 1080p30)	Only streams compliant to SMPTE 421M VC-1	
.asf .wmv	Video	VC-1 Simple and Main Profiles	Simple Profile@Medium Level (e.g. CIF, QVGA) Main Profile@High Level (e.g. 1080p30)	standard are supported	
	Audio	WMA Standard			
	Audio	WMA 9 Professional			
		DivX3.11			
		DivX4 DivX5 DivX6	Advanced Simple Profile (e.g. 720p/1080i)	Global motion com- pensation or quar- terpel motion esti- mation does not	
مان م	Video	XViD		supported. Streams	
.divx .avi		H.264 / AVC	Main Profile@ Level 4.1 High Profile@ Level 4.1 (e.g. 720p60, 1080i60, 1080p30)	using this syntax are not supported.	
	Audio	MPEG-1Layer I, II MPEG-1 Layer III(MP3) Dolby Digital			
.mp4	Video	H.264 / AVC	Main Profile@ Level 4.1 High Profile@ Level 4.1 (e.g. 720p60, 1080i60, 1080p30)	Global motion compensation or quarterpel motion estimation does	
.mp4		MPEG-4 Part 2	Advanced Simple Profile (e.g. 720p/1080i)	not supported. Streams using this	
	Audio	AAC	AAC-LC and HE-AAC	syntax are not sup- ported.	
.mkv	Video	H.264 / AVC	Main Profile@ Level 4.1 High Profile@ Level 4.1 (e.g. 720p60, 1080i60, 1080p30)	Most of the MKV content available is encoded by the open source x264 codec.	
	Audio	AAC	AAC-LC and HE-AAC		
	Audio	Dolby Digital			
		H.264 / AVC	Main Profile@ Level 4.1 High Profile@ Level 4.1 (e.g. 720p60, 1080i60, 1080p30)		
		MPEG-2	Main Profile@High Level(e.g. 720p60, 1080i60)		
.ts .trp .tp	Video	VC-1	Simple Profile@Medium Level (e.g. CIF, QVGA) Main Profile@High Level (e.g. 1080p30) Advanced Profile@Level3 (e.g. 720p60, 1080i60, 1080p30)	Only streams com- pliant to SMPTE 421M VC-1 stand- ard are supported.	
	Audio	MPEG-1Layer I, II MPEG-1 Layer III(MP3) Dolby Digital			
		AAC	AAC-LC and HE-AAC		
	Video	MPEG-1 MPEG-2	Main Profile@High Level (e.g. 720p60, 1080i60)	-	
.vob	Audio	Dolby Digital MPEG-1Layer I, II DVD-LPCM			
.mpg	Video	MPEG-1	Main Profile@High Level (e.g. 720p60, 1080i60)	Only streams compliant configured properly for	
	Audio	MPEG-1Layer I, II		TS, PS or ES	

TO USE A USB OR PC DEVICE

Screen Components

You can also adjust **USB** in the **INPUT** menu.



 Some files may be displayed the preview image by icon only.



 Non-supported files are displayed the preview image by icon only.



• Abnormal files are displayed in the form of bitmap.



Movie Selection

When playing movie files

Movie List			Page 1/1	
USB1 External		Drive1		Page 1/1
001	002	003	004	
005	006	051. Apple_ 02:30:25		
			⊙ Play P 💭 Page Chan	ge MARK Mark
Change Device	To Photo List	Change Numbers	Mark Mode	Exit



Using the remote control

RED	Change device.
GREEN	Repeatedly, press the GREEN button to converted to Photo List->Music List.
YELLOW	A method to view in 5 large thumbnail or simple list.
BLUE	Convert to Mark Mode.
EXIT	Return to normal TV viewing.
►	Press the PLAY(►) button to return to normal playback.

TO USE A USB OR PC DEVICE

When selected movie files are played





• When one or more movie files are marked, the marked movies will be played in sequence.

NOTE

▶ In the case of files not supported, a message regarding non-supported file is displayed.

Using the remote control

RED	Play the selected movie file. Once a movie file finishes playing, the next selected one will be played automatically.
GREEN	Mark all movie files on the screen.
YELLOW	Deselect all marked movie files.
BLUE	Exit the Mark Mode .
EXIT	Return to normal TV viewing.

NOTE

- ► If you select "Yes" from OSD when playing the same file after the movie file has been stopped, it will restart where it stopped previously.
- If continuous series files exist within the folder, the next file will automatically be played. But, this excludes cases when the **Repeat** function of Movie List Option is turned "**On**" (Refer to p. 104) or when set as Marked Play.

TO USE A USB OR PC DEVICE

Using the Movie List function, play





NOTE

- ▶ Option values changed in Movie List does not affect Photo List and Music List.
- Option value changed in Photo List and Music List are changed likewise in Photo List and Music List excluding Movie List.
- ▶ When replaying the video file after stopping, you can play from where it stopped previously.
Using the remote control

	Stop the playing movie file.
►	Press the PLAY(►) button to return to normal playback.
II	 During playback, press the Pause(II) button. Still screen is displayed. If no buttons are pressed on the remote control for 10 minutes after pausing, the TV returns to the playback state. Press the Pause(II) button and then use the FF(►►) button for slow motion.
~ / >	When playing, repeatedly, press the REW(◀◀) button to speed up ◀◀(x2)-> ◀◀◀(x4) -> ◀◀◀◀(x8) ->◀◀◀◀(x16) ->◀◀◀◀◀(x32) . repeatedly, press the FF(►►) button to speed up ►►(x2)-> ►►►(x4) -> ►►►►(x8) ->►►►►(x16) -> ►►►►►(x32). ■ Pressing these buttons repeatedly increases the fast forward/reverse speed.
MENU Or Q.MENU	Show the Option menu.
BACK	Hide the menu on the full-sized screen. ■ To see the menu again on the full-sized screen, press OK button to display.
EXIT	Return to normal TV viewing.
<>	■ When using the 〈 or 〉 button during playback a cursor indicating the position can be viewed on the screen.
ENERGY EXP SAVING	Press the ENERGY SAVING button repeatedly to change the brightness of your screen.(Refer to p. 138)
AV MODE	Press the AV MODE button repeatedly to select the desired source.(Refer to p. 66)

When you select the Set Video Play,





) Select Picture Size, Audio Language, Subtitle Langugae or Repeat.

Make appropriate adjustments.

Subtitle Language	Support Language
Latin1	English, Spanish, French, German, Italian, Swedish, Finnish, Dutch, Portuguese, Danish, Romanian, Norwegian, Albanian, Gaelic, Welsh, Irish, Catalan,Valencian
Latin2	Bosnian, Polish, Croatian, Czech, Slovak, Slovenian, Serbian, Hungarian
Latin4	Estonian, Latvian, Lithuanian
Cyrillic	Bulgarian, Macedonian, Russian, Ukrainian, Kazakh
Greek	Greek
Turkish	Turkish

- Picture Size : Selects your desired picture format during movie play.
- Audio Language : Changes the Language Group of the audio during movie play. Files with a single audio track cannot be selected.
- Subtitle Langugae : Turn on/off the subtitle.
- Language : Activated for SMI subtitle and can select the language within the subtitle.
- Code page : Can select the font for subtitle. When set to default, same font as general menu will be used.
- Sync : Adjusts the time synchronisation of the subtitle from -10 secs to +10 secs by steps of 0.5 secs during movie play.
- Position : Changes the position of the subtitle either up or down during movie play.
- Size : Selects your desired Subtitle size during movie play.
- Repeat : Turn on/off repeat function of movie playback. When turned on, the file within the folder will be played back repeatedly. Even when the repeated playback is turned off, it can run the playback if the file name is similar to the previous file.

NOTE

▶ Only 10,000 of sync blocks can be supported within the subtitle file.

▶ When playing a video, you can adjust the Picture Size by pressing the **RATIO** button.

When you select the Set Video,

■ Image shown may differ from your TV.

LCD TV/LED LCD TV only

Set Video.		
Picture Mode		 ✓ Standard
 Backlight 	70	►
 Contrast 	100	<
 Brightness 	50	<
Colour	60	<pre>></pre>
Dynamic Contrast		◄ Medium ►
Edge Enhancer		 ◄ High
Noise Reduction		 ◄ Medium ►
TruMotion		✓ Low ►
Picture Reset		or Previous

PLASMA TV Only

Set Video.		
Picture Mode		 ✓ Standard
 Contrast 	100	<
 Brightness 	50	<pre>></pre>
 Sharpness 	50	►
Colour	60	<pre>></pre>
• Tint	0	R G
Colour Temp. 0		
Noise Reduction		▲ Low ▶
Picture Reset		Previous

Select **Picture Mode** or **TruMotion**.

When you select the Set Audio,

Set Audio.	
Sound Mode	 ✓ Standard
Auto Volume	 ■ Off ▶
Clear Voice II	 ■ Off ▶
Balance	0 < LR >
	Jacobia Previous



PHOTO LIST

You can view photo files on USB or PC storage device.

The On Screen Display may be different from your TV. Images are an example to assist with the TV operation. When you are watching the photo by the Photo List function, you can not change the picture mode.

PHOTO(*.JPEG) supporting file

Baseline : 64 x 64 to 15360 x 8640 Progressive : 64 x 64 to 1920 x 1440

- You can play JPEG files only.
- Non-supported files are displayed in the form of predefined icon.
- An error message occurs for corrupted files or file formats that cannot be played.
- Corrupted image files may not be displayed properly.
- It may take some time to view high-resolution images in full screen.

Only 42/47LX6***

	File Extensions	Item	Profile
	jpeg	supproted file format	SOF0: baseline SOF1: Extend Sequential SOF2: Progressive
2D Jpg jpe	photo size	Min: 64 x 64 Max - Normal Type: 15360 (W) x 8640 (H) Progressive Type: 1920 (W) x 1440 (H)	
		supproted file format	тро
3D	mpo	photo size	4:3 size: 3,648 x 2,736 2,592 x 1,944 2,048 x 1,536 3:2 size: 3,648 x 2,432

Screen Components

You can also adjust **USB** in the **INPUT** menu.



Photo Selection

When playing photo files



• Use the $\mathbf{P}^{\wedge} \vee$ button to navigation in the

photo page.



 \bigcirc



When selected photo files are displayed





Using the remote control



How to view photo

Detailed operations are available on full-sized photo view screen.

Page 1/1 Photo List P 🗘 Page Change MARK Mark To Music List Ch Change D 1

 \bigvee



The aspect ratio of a photo may change the size of the photo displayed on the screen in full size. Press the EXIT button to move to the previous menu screen.

- Select the target folder or drive. OK Select the desired photos. The selected photo is displayed in full OK ◉ size.
- Use the P ^ v button to navigation in the photo page.

- Press the EXIT button to go back to Photo List.
- Press the **BACK** button to make Help OSD disappear.



- Slideshow : When no picture is selected, all photos in the current folder are displayed during slide show. If some photos are selected, those photos are displayed in a slide show.
 - Set the time interval of the slide show in **Option**.
- ► BGM (Background Music) : Listen to music while viewing photos in full size.
- Set the BGM device and album in Options before using this function.
- You can adjust Option by Q.MENU or MENU button on the remote control.
- ► U (Rotate) : Rotate photos.
- Rotates the photo 90°, 180°, 270°, 360° clockwise.
- It can not be rotate when the width of a picture is bigger than supported height.
- ► 𝓜/-♠ : You can view the photo in Full or Original mode.
- Press the ENERGY SAVING button repeatedly to change the brightness of your screen. (Refer to p. 138)
- ▶ Option : Set values for Slide Speed and BGM.
- Use ^ < > button and OK button to set values. Press OK to save the settings.
- You cannot change **BGM** while BGM is playing.
- You can only select the MP3 folder saved on the device that currently displays the photo.
- ► Hide : Hide the menu on the full-sized screen.
- To see the menu again on the full-sized screen, press OK button to display.

Press the EXIT button to go back to Photo List.



Select the Slideshow, BGM, ♡ (Rotate),) (/ , e∅, Option, Hide or Exit.

- Use < >button to select the previous or next photo.
- Use < >button to select and control the menu on the full-sized screen.

Using the Photo List function





NOTE

- ► Option values changed in **Movie List** does not affect **Photo List** and **Music List**.
- Option value changed in Photo List and Music List are changed likewise in Photo List and Music List excluding Movie List.

When you select the Set Photo View,

Set Photo View. Slide Speed • Fast ► BGM Drive1 Repeat • On ► Random Off • ► Previous



When you select the Set Video,

Image shown may differ from your TV.

LCD TV/LED LCD TV only

Set Video.		
Picture Mode		 Standard ►
 Backlight 	70	
 Contrast 	100	<
 Brightness 	50	<
Colour	60	<
Dynamic Contrast		◄ Medium ►
Edge Enhancer		 High ►
Noise Reduction		◄ Medium ►
TruMotion		 ▲ Low ▶
Picture Reset		Previous

PLASMA TV Only

Set Video.		
Picture Mode		 Photo
Contrast	100	<
Brightness	50	▲
Sharpness	50	►
Colour	60	
• Tint	0	< R
Colour Temp.	0	 ✓ William C ►
Dynamic Contrast		 ■ Off
Picture Reset		Previous

Select Picture Mode or TruMotion.

When you select the Set Audio,

Set Audio.	
Sound Mode	 ✓ Standard
Auto Volume	 Off
Clear Voice II	< Off ►
Balance	0 < LR >
	Previous

OK



) Make appropriate adjustments. (Refer to p. 154 to 158)

MUSIC LIST

You can play music files on USB or PC storage device.

Purchased music files(*.MP3) may contain copyright restrictions. Playback of these files may not be supported by this model.

Music file on your USB device can be played by this unit.

The On Screen Display may be different from your TV. Images are an example to assist with the TV operation.

MUSIC (*.MP3) supporting file Bit rate 32 to 320

- Sampling rate MPEG1 Layer3 : 32 kHz, 44.1 kHz, 48 kHz
- Sampling rate MPEG2 Layer3 : 16 kHz, 22.05 kHz, 24 kHz

Screen Components

You can also adjust **USB** in the **INPUT** menu.



Music Selection



When playing music files



 Use the P ^ v button to navigate up/down in the music page.

Using the remote control



When selected music files are played





- When one or more music files are marked, the marked music title will be played in sequence. For example, if you want to listen to only one music repeatedly, just mark the music only and play it. If no music is marked, all the music in the folder will be played in sequence.
- If you want to activate Random playback, you must set Option->Set audio play.->Random to On.

Using the remote control



Using the Music List function, play





- ▶ Option values changed in Movie List does not affect Photo List and Music List.
- Option value changed in Photo List and Music List are changed likewise in Photo List and Music List excluding Movie List.
- ► You can listen to the music only within the device currently played.

Using the remote control

	Stop the playing music file.
►	Press the PLAY(▶) button to return to normal playback.
II	When you press the Pause(II) button while playing the file, the playback will be paused. When you press the Pause(II) button again while the playback is paused, it will resume the playback.
~/>	When playing, When you press the REW(◀◀) button, the previous music file will be played. When you press the FF(►►) button, the next music file will be played.
GREEN	Start playing the selected music files and then move to the Photo List .
ENERGY	Press the ENERGY SAVING button repeatedly to change the brightness of your screen.(Refer to p. 138)
SAVING	Only Off/Screen Off operates from the Movie List, Photo List, Music List (LCD TV/LED LCD TV only).
MENU Or Q.MENU	Show the Option menu.
BACK	When you press the Back button while the music is playing, the music player currently playing will be hidden and only the music list will be displayed.
EXIT	 When you press the Exit button while the Music player is displayed, only the music will be stopped and the player will not return to normal TV viewing. When you press the Exit button while the music is stopped or while the music player is hidden, the player will return to normal TV viewing.
<>	■ When using the 〈 or 〉 button during playback a cursor indicating the position can be played.

When you select the Set Audio Play,

Set Audio Play.			
Repeat		On	►
Random	•	Off	
		Previous	



When you select the Set Audio,

Set Audio.	
Sound Mode	 ✓ Standard
Auto Volume	< Off ►
Clear Voice II	< Off ►
Balance	0 < LR >
	Previous



) Make appropriate adjustments. (Refer to p. 154 to 158)

If you don't press any button for a while during the playing, the play information box (as shown in the below) will float as a screen saver.
 The 'Screen Saver'?

Screen saver is to prevent screen pixel damage due to an fixed image remaining on the screen for a extended period of time.

	0	002. B02.mp3 ► 00:31 / 04:04		
--	---	---------------------------------	--	--

NOTE

- ► A damaged or corrupted music does not play but displays 00:00 in playtime.
- A music downloaded from a paid service with copyright protection does not start but displays inappropriate information in playtime.
- ▶ If you press OK, buttons, screen saver is stopped.
- ► The PLAY(►), Pause(II), ■, ►►, ◄◄ buttons on the remote control are also available in this mode.
- ▶ You can use the ▶▶ button to select the next music and the ◄◄ button to select the previous music.

DIVX REGISTRATION CODE

Confirm the DivX registration code number of the TV. Using the registration number, movies can be rented or purchased at www.divx.com/vod.

With a DivX registration code from other TV, playback of rented or purchased DivX file is not allowed. (Only DivX files matched with the registration code of the purchased TV are playable.)



► Movie files are supported as follows

Resolution : under 1920x1080 WxH pixels

Frame rate : under 30 frames/sec(1920x1080), under 60 frames/sec(under 1280x720)

- Video Codec : MPEG 1, MPEG 2, MPEG 4, H.264/AVC, DivX 3.11, DivX 4.12, DivX 5.x, DivX 6, Xvid 1.00, Xvid 1.01, Xvid 1.02, Xvid 1.03, Xvid 1.10-beta1, Xvid 1.10-beta2, JPEG, VC1, Sorenson H.263/H.264
- ► The DRM/*.tp /*.trp file in DLNA server is not played when Movie List is in operation.

DEACTIVATION

The purpose of deactivation is to allow deactivation of devices for users who have activated all the available devices through the web_server and are blocked from activating more devices. DivX VOD allowed the consumer to activate up to 6 devices under one account, but to replace or deactivate any of those devices, the consumer had to contact DivX Support and request deletion. Now with this added feature, consumers will be able to deactivate the device themselves and hence better manage their DivX VOD devices.

MY MEDIA Wovie List Movie List	DivX Reg. Code Deactivation	\geqslant	Deregistration code :
Press OK((()) to view the list of photos in the USB or PC.			



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

GAME

GAME

Allows you to enjoy the games installed on the TV.





• Press the **EXIT** button to return to normal TV viewing.

EPG(ELECTRONIC PROGRAMME GUIDE) (IN DIGITAL MODE)

This system has an Electronic Programme Guide (EPG) to help your navigation through all the possible viewing options.

The EPG supplies information such as programme listings, start and end times for all available services. In addition, detailed information about the programme is often available in the EPG (the availability and amount of these programme details will vary, depending on the particular broadcaster).

This function can be used only when the EPG information is broadcast by broadcasting companies.

You must set the Clock in the Time menu, before using EPG function.

The EPG displays the programme details for 8 days.

DTV 1 TV ONE		₽r. C	hange 🕨 Next	Watch	
Good Morning					
21:00 00:00 Show/Game Sh	DW 16:9 720p 🗉 🛄 HE-AAC				
Sarah Bradley, Steve Gray and Brendon Pongia with regular and special guests. Sarah Bradley, Steve Gray and Brendon Pongia with regular and special curvets				Up Down	
Shows current progra	amme information				
Displayed with a	TV or DTV Programme.	\equiv	Displayed	d with a	Teletext Programme.
Displayed with a	Radio Programme.		Displayed	d with a	Subtitle Programme.
MHEG Displayed with a	MHEG Programme.	*	Displayed	d with a	Scramble Programme.
HE-AAC Displayed with a	HE-AAC Programme.	D D	Displayed	d with a	Dolby Digital Programme.
4:3 Aspect ratio of b	roadcasting programme.	D +	Displayed	d with a	Dolby Digital Plus Programme.
16:9 Aspect ratio of b	roadcasting programme.	576i/p, 7	720p, 1080)i/p : Res	solution of broadcasting programme
Broadcasted pro tion of the progra		not be di	isplayed ir	n Monite	or Out depending on the informa-
APP Displayed with a	MHP Programme.				
Shows next progr	amme information.				
Shows other prog	ramme information.				
	Tyra				
DTV 2 TV2 Tyra 21:00 00:00 Show/Game Show	Record Remind Close	‡Pr. Change	e ∢Now ⊚S	Schedule	
Talk show host Tyra Banks sits down with Keyshia Co Talk show host Tyra Banks sits down with Keyshia Co					
A pop-up window appear.	for record/remind setting	gs			

EPG (ELECTRONIC PROGRAMME GUIDE)

Switch on/off EPG



Switch on or off EPG.

Select a programme



Select desired programme.

Button Function in NOW/NEXT Guide Mode

You can view a programme being broadcasted and one scheduled to follow.



)	Change	EPG	mode.

Enter Manual Timer mode.

E) Enter Schedule List mode.

When 'NOW' is selected, it is moved to selected programme and EPG disappears

When 'NEXT' is selected, a reservation pop-up window appears.

Select NOW or NEXT Programme.

Select the Broadcast Programme.

Page Up/Down.



Button Function in 8 Day Guide Mode



Change EPG mode.

Enter Date setting mode.



Enter Manual Timer mode.

BLUE)

OK ©

Enter Schedule List mode.

When 'Currently broadcasting programme' is selected, it is moved to selected programme and EPG disappears

When 'Future broadcasting programme' is selected, a reservation pop-up window appears.



Select Programme.

Select the Broadcast Programme.



EPG (ELECTRONIC PROGRAMME GUIDE)

Button Function in Date Change Mode



Programme Guide							
That '70s show				25 Nov. 2008 10:05			
ALL	4	Tue. 25 Nov		•			
ALL	14:00	15:	00				
01 YLE TV1	Antigues I	Kungskonsumente					
01 2 YLE TV2	Mint Extra TV2: Farmen The Drum						
🕅 4 TV	The Drum						
0 5 YLE FST	You Call The Hits						
0 6 CNN	Fashion Essentials						
0 8 YLE24	Tänään otsikoissa						
		•					
	Date Change						
Date Exit							

Button Function in Extended Description Box



The detail information on or off.

Text Up/Down.

EXIT

Select Timer Record/Remind setting mode.

) Switch off EPG.

DTV 1 YLE TV1 25 25 Nov. 2008 10:05						
Fia World Touring Car Chanpionship Tue. 25 Nov. 2008 10:05						
Fia Champion Miss Gotto's Haunted house/Cry of The Swamp; Miss Gotto's Haunted house/Cry of The Swamp; Miss Gotto's Haunted house/Cry of The Swamp; Miss Gotto's Haunted house/Cry of The Swamp; Miss Gotto's Haunted house/Cry of The Swamp; Miss Gotto's Haunted house/Cry of The Swamp;						
Remind	Record	Close				

Button Function in Record/Remind Setting Mode

Sets a start or end time, programme for recording, and sets a start time, programme for the reminder with the end time grayed out.

This function is available only when recording equipment that use pin8 recording signalling has been connected to the TV-OUT(AV1) terminal, using a SCART cable.

Recording function is only supported in the Digital mode and not in the Analogue mode.



Μ	anual Timer
Sel	ect the date to schedule. Wed. 12 Aug. 2009 13:46
Sur	. Mon. Tue. Wed. Thu. Fri. Sat
09	Select a schedule type
16	Type Start Time End Time Programme
23	Record 15 : 09 17 : 30 DTV 801 ANTV D Close
30	● OK ♂ Prev.
¢	Move OK
	Programme Guide Schedule List

EPG (ELECTRONIC PROGRAMME GUIDE)

Button Function in Schedule List Mode

If you've created a schedule list, a scheduled programme is displayed at the scheduled time even when you are watching a different programme at the time. Currently recording item cannot be edited or deleted.



Page Up/Down.

Ρ

Schedule List				
	Page1/1		Fri. 6	Apr. 2007 15:09
2007 04 Man Tile Wed The Fit Set Sen	Start Date 6 May	Start Time 16:00	Title Friend1	(1) Friend2 16:00
2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22	6 May	18:00	Friend2	Modify •
23 24 25 26 27 28 29 () Remind				Delete All
DTV 19 Dave (Fri.)06/05/2007 16:00				Close
Move Manual Timer	Modify/I Program	Delete F nme Guide	Page Chang	je of Exit

PICTURE CONTROL

PICTURE SIZE (ASPECT RATIO) CONTROL

You can watch the screen in various picture formats; 16:9, Just Scan, Original, Full Wide, 4:3, 14:9, Zoom and Cinema Zoom.

If a fixed image is displayed on the screen for a long time, that fixed image may become imprinted on the screen and remain visible.

You can adjust the enlarge proportion using $\land \lor$ button.

This function works in the following signal.



• 16:9

The following selection will allow you to adjust the picture horizontally, in linear proportion, to fill the entire screen(useful for viewing 4:3 formatted DVDs).



Just Scan

Following Selection will lead to you view the picture of best quality without loss of original picture in high resolution image.

Note : If there is noise in original Picture, You can see the noise at the edge.



- You can also adjust Aspect Ratio in the PICTURE menu.
- For Zoom Setting, select **14:9**, **Zoom** and **Cinema Zoom** in Ratio Menu. After completing Zoom Setting, the display goes back to Q.Menu.

Original

When your TV receives a wide screen signal it will automatically change to the picture format broadcast.



PICTURE CONTROL

• Full Wide

When TV receives the wide screen signal, it will lead you to adjust the picture horizontally or vertically, in a linear proportion, to fill the entire screen fully. 4:3 and 14:9 video is supported in full screen without any video distortion through DTV input.



PICTURE CONTROL

• 4:3

The following selection will allow you to view a picture with an original 4:3 aspect ratio.



• 14:9

You can view a picture format of 14:9 or a general TV programme in the 14:9 mode. The 14:9 screen is viewed in the same way as in 4:3, but is moved to the up and down.



• Zoom

The following selection will allow you to view the picture without any alteration, while filling the entire screen. However, the top and bottom of the picture will be cropped.



Cinema Zoom

Choose Cinema Zoom when you want to enlarge the picture in correct proportion. Note:When enlarging or reducing the picture, the image may become distorted.



✓ or ▶ button: Adjust enlarge proportion of Cinema Zoom. The adjustment range is 1 to 16.
 ▼ or ▲ button: Move the screen.

- ▶ You can only select 4:3, 16:9 (Wide), 14:9, Zoom/Cinema Zoom in Component mode.
- ► You can only select 4:3, Original, 16:9 (Wide), 14:9, Zoom/Cinema Zoom in HDMI mode.
- ▶ You can only select 4:3, 16:9 (Wide) in RGB-PC, HDMI-PC mode only.
- ► In DTV/HDMI/Component (over 720p) mode, Just Scan is available.
- ► In Analogue/DTV/AV/Scart mode, Full Wide is available.

PICTURE WIZARD

This feature lets you adjust the picture quality of the original image.

Use this to calibrate the screen quality by adjusting the Black and White Level etc. General users can calibrate the screen quality by easily following each stage.

When you adjust the image to Low, Recommended or High, you can see the changed result as an example.

In RGB-PC/HDMI-PC/DVI-PC mode, the changed Colour, Tint and H/V Sharpness values are not applied.

 \gg







• Press the MENU/EXIT button to return to normal TV viewing.

• Press the **BACK** button to move to the previous menu screen.

PICTURE CONTROL

CORNERGY SAVING

It reduces the TV's power consumption.

LCD TV/LED LCD TV only

The default factory setting is adjusted to the comfortable level to be viewed at home.

You can increase the brightness of your screen by adjusting the **Energy Saving level** or by setting the **Picture Mode**.

When adjusting Energy Saving in MHEG/MHP mode, the Energy Saving setting is applied after MHEG/MHP is finished.

Selecting 'Screen Off' while tuned to a radio station channel will reduce power consumption.



• Press the **BACK** button to move to the previous menu screen.

Plasma TV only

- When you select Screen Off, the screen will be turned off in 3 seconds and Screen Off will start.
- If you adjust "Energy Saving-Auto, Maximum", Backlight feature will not work. (LCD TV/LED LCD TV only)
- If you adjust "Energy Saving-Intelligent Sensor", Sharpness, Colour, Colour Temperature feature will not work. (Plasma TV only)
- You can also adjust this feature by selecting Energy Saving button on the remote control.
- When selecting Auto, Backlight is automatically adjusted through intelligent sensor according to the surrounding condition when intelligent sensor is in the TV. (LCD TV/LED LCD TV only)
PRESET PICTURE SETTINGS

Picture Mode-Preset

Vivid	Strengthen the contrast, brightness, colour and sharpness for vivid picture.
Standard	The most general screen display status.
A문화	Optimizes power consumption. (Plasma TV Only)
Cinema or IHX Cinema IHX Bright Room	Optimizes video for watching movies. This is the specification to optimize TV viewing in Bright Room. (42/47/55LE8***, Plasma TV Only)
Sport	Optimizes video for watching sports events.
Game	Optimizes video for playing games.

Plasma TV only

LCD TV/LED LCD TV only

PICTURE PICTURE 02 Aspect Ratio Aspect Ratio : 16:9 · 16·9 Picture Wizard Picture Wizard U Vivid • eØEnergy Saving : Off • e Energy Saving : Intelligent Se Standard ٢ ٢ Backlight 70 Contrast ITHX Cinema Brightness Contrast 100 THX Bright Room Sharpness Brightness 50 Sport 3 0 Game Expert1 Intelligent Sensor 🔲 Intelligent Sensor Expert2 U Vivid 🔲 Vivid 🗹 Standard 🗹 Standard Cinema THX Bright Room □ Sport Game Sport Expert1 Game Expert1 Expert2 Expert2 (only 42/47/55LE8***) (Except for 42/47/55LE8***) MENU Select PICTURE. MENU Select PICTURE. Select Picture Mode. OK OK ◉ Select Picture Mode. Select Intelligent Sensor, Select Vivid, Standard, APS, ^ Vivid, Standard, OK <u>IHX</u> Cinema, <u>IHX</u> Bright **Cinema(Except for** Room, Sport or Game. 42/47/55LE8***), THX ^ OK Cinema(Only 42/47/55LE8***), **IHX** Bright Room(Only 42/47/55LE8***), Sport or Game.

• Press the MENU/EXIT button to return to normal TV viewing.

PICTURE CONTROL

- **Picture Mode** adjusts the TV for the best picture appearance. Select the preset value in the **Picture Mode** menu based on the programme category.
- When the Intelligent sensor function is on, the most suitable picture is automatically adjusted according to the surrounding conditions.
- You can also adjust Picture Mode in the Q. Menu.
- Intelligent Sensor : Adjusts picture according to the surrounding conditions.
- APS' (Auto Power Saving) : Maximize reducting the power consumption without hurting the picture quality. (Plasma TV Only)
- If you adjust "Picture Mode-IHX" Cinema, IHX Bright Room", "Energy Saving-Intelligent Sensor, Minimum, Medium, Maximum" feature will not work. (Plasma TV Only)
- If you adjust "Picture Mode-IH文 Cinema, IH文 Bright Room", "Energy Saving-Auto, Minimum, Medium, Maximum" feature will not work. (42/47/55LE8*** Only)
- If you adjust "Picture Mode- APS" ", "Energy Saving-Off, Minimum, Medium, Maximum" feature will not work. (Plasma TV only)
- THX **Cinema**(42/47/55LE8***, Plasma TV Only) :This is cinema quality mode to provide you the experience of watching a movie at home.The user will be able enjoy the best level of satisfactory screen quality in any movie without any separate adjustments.Cinema expresses the optimal screen quality when it is darkest.

When selecting **IHX Cinema**, **IHX Bright Room** Aspect ratio changes to Just scan.

• THX **Cinema**(Thomlinson Holman 's Experiment)is the audio and video certification standard of THX established by George Lucas, who directed the movie Star Wars, and Thomlinson. This is the product to be certified in THX display area and guarantees screen quality that exceeds the display standard specification in both hardware and software.

MANUAL PICTURE ADJUSTMENT **Picture Mode-User option**

Backlight (LCD TV/LED LCD TV only)

To control the brightness of the screen, adjust the brightness of LCD panel. Adjusting the backlight when setting the brightness of the set is recommended.

Contrast

Adjusts the signal level between black and white in the picture. You may use Contrast when the bright part of the picture is saturated.

Briahtness

Adjusts the base level of the signal in the picture.

Sharpness

Adjusts the level of crispness in the edges between the light and dark areas of the picture. The lower the level, the softer the image.

Colour

Adjusts intensity of all colours.

Tint

Adjusts the balance between red and green levels. Colour Temp.

Adjust to left direction to make a picture reddish or adjust to right direction to make a picture bluish.

It is not available to use this function in "Intelligent Sensor".

LCD TV/LED LCD TV only



- Press the MENU/EXIT button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

PICTURE CONTROL

Benefits of using Backlight

(LCD TV/LED LCD TV only)

- The electricity consumption is reduced by up to 60 %.
- The black brightness is reduced. (As the black has greater depth, you can enjoy a better quality definition.)
- You can adjust brightness with maintaining original signal resolution.

NOTE

- ► You cannot adjust colour, sharpness and tint in the RGB-PC/HDMI-PC mode.
- When the Expert 1/2 is selected, you can select Backlight, Contrast, Brightness, H Sharpness, V Sharpness, Colour or Tint.

PICTURE IMPROVEMENT TECHNOLOGY

You can calibrate the screen for each Picture Mode or set the video value according to the special video screen.

You can set the video value differently for each input.

To reset to the factory default screen after making adjustments to each video mode, execute the "Picture Reset" function for each Picture Mode.

Image shown may differ from your TV.



LCD TV/LED LCD TV only Plasma TV only



Skin Colour (LCD TV/LED LCD TV only), Noise Reduction, Digital Noise Reduction (LCD TV/LED LCD TV only), Gamma, Black Level, Eye Care (LCD TV/ LED LCD TV only), Real Cinema (LCD TV/LED LCD TV only), Film Mode(Plasma TV only), Colour Gamut, Edge Enhancer (Plasma TV only) or xvYCC. (Refer to p. 145 to 146)



Make appropriate adjustments.

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

PICTURE CONTROL

EXPERT PICTURE CONTROL

By segmenting categories, **Expert1** and **Expert2** provide more categories which users can set as they see fit, offering the optimal picture quality for users.

This may also be used to help a professional optimize the TV performance using specific videos.

	PICTURE		ŵ Move ⊙ OK		Ţ	PICTURE		Dynamic Contrast	◀ Medium ▶	Dynamic Contrast	✓ Off ►
(Aspect Ratio	: 16:9			()		• H 3	Noise Reduction	Medium	Noise Reduction	Off
	 Picture Wizard 		Intelligent Sensor				• V \$	Digital Noise Neudolion	Medium	Gamma	Medium
\odot	• e	: Off	Uivid 🗌		\odot		• Co	DIACK LEVEI	Auto	Black Level	Auto
3			Standard	\gg	2		• Tin	Real Cinema	On	Film Mode	Off
6			Cinema Cinema		6		• Exp • Pic	Colour Comut	EBU	Colour Gamut	Standard
		Contrast				• TruMotion	: Off	Edua Eshanaa	High	Edge Enhancer	Off
		Brightness	—			Screen	. 01	xvYCC	Auto	xvYCC	Auto
0		H Sharpne	Expert1		0	0010011		Expert Pattern	Off	Expert Pattern	Off
			Expert2								
								Close		Clos	
								Close			e

LCD TV/LED LCD TV only

Plasma TV only



- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Image shown may differ from your TV.

PICTURE CONTROL

*This feature is not available for all models.

Dynamic Contrast (Off/Low/Medium(LCD TV/LED LCD TV only)/ High)	 Adjusts the contrast to keep it at the best level according to the brightness of the screen. The picture is improved by making bright parts brighter and dark parts darker.
Dynamic Colour (Off/Low/ Medium(Plasma TV only) /High)	 Adjusts screen colours so that they look livelier, richer and clearer. This fea- ture enhances hue, saturation and luminance so that red, blue, green and white look more vivid.
Skin Colour (-5 to 5)	 Adjusts skin colour of the picture so that user can set his favourite skin colour.
Noise Reduction (Off/Low/Medium/High/ Auto(In Analogue Mode Only))	 Reduces screen noise without compromising video quality.
Digital Noise Reduction (Low/Medium/High/Off)	 Reduces noise regarding MPEG compressed video.
Gamma (Advanced Control: Low/Medium/High Expert Control: 1.9/2.2/2.4)	 You can adjust brightness of dark area and middle gray level area of the picture. Low/1.9 : Makes dark and middle gray level area of the picture brighter. Medium/2.2 : Expresses original picture levels. High/2.4: Makes dark and middle gray level area of the picture darker. When Antenna is used as input signal, it is set to Medium and deactivated. (Plasma TV only)
Black Level (Low/High/Auto)	 Low : The picture of the screen gets darker. High : The picture of the screen gets brighter. Auto : Sets black level of the screen to High or Low automatically according to the input signal level. This function enables to select 'Low' or 'High' in the following mode: AV(NTSC-M), HDMI or Component. Otherwise, 'Black level' is set to 'Auto'.
Clear White (Off/Low/High)	Makes the white area of the screen brighter and clearer.
Eye Care (Low/High/Off)	 *This feature is not available for all models. Adjusts the brightness of the screen automatically to the best level for eyes when the screen is too bright. This feature is disable in "Picture Mode-Vivid, Cinema, Expert1, Expert2, Intelligent Sensor".
Real Cinema(LCD TV/ LED LCD TV only)/ Film Mode (Plasma TV only) (On/Off)	 You can watch a cinema-like video by eliminating judder effect. Uses this function when you watch film-originated movie contents. This function can work when TruMotion is off.

PICTURE CONTROL

Colour Gamut (LCD TV/LED LCD TV : Advanced Control & Plasma TV : Advanced Control/ Expert Control) (Wide/Standard)	 Standard : Mode to use original colour area regardless of the display characteristics. Wide: Mode to use maximum colour area of the TV display.
Colour Gamut (LCD TV/LED LCD TV : Expert Control) (EBU/SMPTE/BT709/ Wide/Standard)	 Standard : Mode to use original colour area regardless of the display characteristics. Wide : Mode to use maximum colour area of the TV display. EBU : Mode to display EBU colour area. SMPTE : Mode to display SMPTE colour area. BT709 : Mode to display BT709 colour area.
Edge Enhancer (LCD TV/LED LCD TV :Off/Low/High Plasma TV:On/Off)	 Makes the edge of the picture clearer and distinctive. This function can use in "Picture Mode-Expert." (LCD TV/LED LCD TV only)
xvYCC (Auto/off/on)	 *This feature is not available for all models. This is the function to express richer colour. This function is enabled in "Picture mode - Cinema, Expert" when xvYCC signal is inputted through HDMI
Expert Pattern (Off/Pattern1/Pattern2) Colour Filter (Off/Red/Green/Blue)	 This is the pattern necessary for checking the picture of Digital TV. This function is enabled in "Picture Mode - Expert" when you watch DTV. This is the function to filter the specific colours of the video. You can use the RGB filter to set colour saturation and hue accurately.
Colour Temperature (Medium/Warm/Cool)	 This is the function to adjust the overall colour of the screen to the feeling you want. a. • Method : 2 Points Pattern: Inner, Outer Red/Green/Blue Contrast, Red/Green/Blue Brightness: The adjustment range is -50 to +50. b. • Method : 10 point IRE(LCD TV/LED LCD TV), 20 Point IRE(Plasma TV) Pattern: Inner / Outer IRE (Institute of Radio Engineers) is the unit to display the size of the video signal and can be set among 10, 20, 30 to 100(LCD TV/LED LCD TV), 5, 10, 15 to 100(Plasma TV). You can adjust Red, Green or Blue according to each setting. Luminance: This function displays calculated luminance value for 2.2 gamma. You can input luminance value you want at 100 IRE, than the target luminance value for 2.2 gamma is displayed at every 10 steps from 10 IRE to 90 IRE. (LCD TV/LED LCD TV) Red/Green/Blue: The adjustment range is -50 to +50.
Colour Management System	 As the tool used by the experts to make adjustments by using the test patterns, this does not affect other colours but can be used to selectively adjust the 6 colour areas (Red/Green/Blue/Cyan/Magenta/Yellow). Colour difference may not be distinctive even when you make the adjustments for the general video. Adjusts Red/Green/Blue/Yellow/Cyan/Magenta. Red/Green/Blue/Yellow/Cyan, Magenta Colour : The adjustment range is -30 to +30. Red/Green/Blue/Yellow/Cyan/Magenta Tint : The adjustment range is -30 to +30. This feature is disable in RGB-PC and HDMI (PC) mode.

PICTURE RESET

Settings of the selected picture modes return to the default factory settings.





- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

PICTURE CONTROL

PICTURE CONTROL

TRUMOTION (LCD TV/LED LCD TV ONLY)

It is used for the best picture quality without any motion blur or judder when you enter a quick image or Film Source.

High : Provide smoother picture movement.

Low : Provide smooth picture movement. Use this setting for standard use.

Off : Turn off TruMotion Operation.

User : User can adjust Judder and Blur level in TruMotion Operation, separately.

- Judder : Adjust noise of the screen.
- Blur : Adjust after-image of the screen.

This feature is disable in RGB-PC,HDMI-PC mode. If you enable "TruMotion", noise may appear on the screen. If this occurs, set "TruMotion" to "Off".

If you select "Picture Mode-Game ", set "TruMotion" to "Off".





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

LED LOCAL DIMMING

(Only 42/47/55LE5***, 42/47/55LE7***, 42/47/55LE8***, 42/47LX6***)

After analyzing the signal of the input video by areas of the screen, it adjusts the backlight to improve the contrast ratio.





PICTURE CONTROL

POWER INDICATOR (LCD TV/LED LCD TV ONLY)

Adjust the power/standby indicator light on the front of the TV.

Standby Light

Determines whether to set the indicator light on the front of the TV to **On** or **Off** in standby mode.

Power Light

Determines whether to set the indicator light on the front of the TV to **On** or **Off** when the power turns on.

If you select 3D mode, Power indicator is turned off automatically.





• Press the **MENU/EXIT** button to return to normal TV viewing.

IMAGE STICKING MINIMIZATION (ISM) METHOD

(PLASMA TV ONLY)

A frozen or still picture displayed on the screen for prolonged periods will result in a ghost image remaining even when you change the image. Avoid allowing a fixed image to remain on the screen for prolonged periods.

White Wash

White wash removes permanent images from the screen.

Note: An excessive permanent image may be impossible to clear entirely with White Wash.

Orbiter

Orbiter may help prevent ghost images. However, it is best not to allow any fixed image to remain on the screen. To avoid a permanent image on the screen, the screen will move every 2 minutes.

Colour Wash

The color block with the screen moved a little and the white pattern are alternately displayed. It is difficult to sense the afterimage occurred while the temporary afterimage is removed and the colour pattern is operating.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

PICTURE CONTROL

MODE SETTING

We recommend setting the TV to "**Home Use** " mode for the best picture in your home environment. "**Store Demo** " mode is an optimal setting for displaying at stores.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

It is not possible to use **Demo Mode** in **Home Use** mode.

In Store Demo, Demo Mode is automatically set to On.

Once **Demo Mode** is set to **Off** in **Store Demo**, **Demo Mode** does not run and only the screen is reset.

The screen is reset automatically after 5 minutes in Demo Mode.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

AUTO VOLUME LEVELER

Auto Volume automatically remains on the same level of volume if you change programmes.

Because each broadcasting station has its own signal conditions, volume adjustment may be needed every time the programme is changed. This feature allows users to enjoy stable volume levels by making automatic adjustments for each programme.

If sound quality or volume is not at the level you want, it is recommended to use a separate home theater system or amp to cope with different user environments.

\bigcirc	AUDIO	¢	≻ Move ⊙ OK		\bigcirc	AUDIO		♠ Move	
9	Auto Volume	: Off	ê		<u>()</u>	Auto Volume	: Off	off ⊡ On	
	Clear Voice II	: Off 🗬 3				Clear Voice II	: Off		
٥	Balance		0 LR		0	 Balance 		0 LR	
	Sound Mode	: Standard		<i>>></i>		Sound Mode	: Standard		
2		Infinite Sound	: Off		2		Infinite Sou	ind : Off	
		Treble	50		•		Treble	50	
		Bass	50				Bass	50	
0		• Reset			0		• Reset		



Select AUDIO.

Select Auto Volume.

Select On or Off.

• Press the **MENU/EXIT** button to return to normal TV viewing.

CLEAR VOICE II

By differentiating the human sound range from others, it helps users listen to human voices better.





Adjustment for Clear Voice Level With selecting On



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

PRESET SOUND SETTINGS-SOUND MODE

You can select your preferred sound setting; Standard, Music, Cinema, Sport or Game and you can also adjust the Treble, Bass.

Sound Mode lets you enjoy the best sound without any Special adjustment as the TV sets the appropriate sound options based on the programme content.

Standard, Music, Cinema, Sport and Game are preset for optimum sound quality at the factory.

- **Standard** Offers standard-quality sound.
- Music Optimizes sound for listening to music.
- **Cinema** Optimizes sound for watching movies.
- **Sport** Optimizes sound for watching sports events.
- Game Optimizes sound for playing games.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

SOUND & LANGUAGE CONTROL

SOUND SETTING ADJUSTMENT -USER MODE

Auto Volume	: Off		Auto Volume	: Off	
Clear Voice II	: Off 💘 3		Clear Voice II	: Off 🕡 3	
Balance	0 LR		Balance		Standard(User)
Sound Mode	: Standard(User) 🌼	\gg	Sound Mode	: Standard(Use	🗖 Music
	Infinite Sound : Off		0	 Infinite Sound 	Cinema
6	• Treble 50		•	Treble	Sport
	• Bass 50			Bass	🔲 Game
8	• Reset		8	• Reset	

MENU Select AUDIO. OK Select Sound Mode. OK © Game. OK

Select Standard, Music, Cinema, Sport or

Select Treble or Bass.

Set the desired sound level.

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

INFINITE SOUND

Select this option to sound realistic.



Infinite Sound : Infinite Sound is a patented LG proprietary sound processing technology that strives immersive 5.1 surround sound impression with front two loudspeakers.

- Press the MENU/EXIT button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

BALANCE

You can adjust the sound balance of the speakers to preferred levels.





SOUND & LANGUAGE CONTROL

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

Close

TV SPEAKERS ON/ OFF SETUP

You can adjust the TV internal speaker status.

In **AV**, **COMPONENT**, **RGB** and **HDMI1** with HDMI to DVI cable, the TV speaker can be operational even when there is no video signal.

If you wish to use an external Hi-Fi system, turn off the TV's internal speakers.

AUDIO	↔ Move ⊚ OK		\odot	AUDIO		û Move ⊚ OK
Sound Mode	: Standard			Sound Mode	: Standard	
	Infinite Sound : Off				Infinite Soun	d : Off
	• Treble 50	\sim	0		Treble	50
	• Bass 50				Bass	50
	• Reset				Reset	
Digital Audio Out	: PCM		0	Digital Audio Out	: PCM	Off
TV Speaker	: On 🏮			• TV Speaker	: On	− ⊡ Oπ − ⊠ On
DTV Audio Setting	: Auto		0	DTV Audio Setting	: Auto	l⊠ On



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

NOTE

- When the TV speaker is turned off while the Simplink home theater is operating, the sound output automatically switches to the Home theater speaker, but when the TV speaker is turned on, the sound output the TV speaker.
- ▶ Some menus in AUDIO are disabled when TV Speaker is set to Off.

DTV AUDIO SETTING (IN DIGITAL MODE ONLY)

When different audio types exist in an input signal, this function allows you to select the audio type you want.

O AUDIO					
• Sound Mode	: Standard		• Sound Mode	: Standard	
	Infinite Sound : Off			Infinite So	ound : Off
0	Treble 50	\geq	0	Treble	50
e	• Bass 50	-	2	Bass	50
	• Reset			Reset	⊠ Auto
 Digital Audio Out 	: PCM		Digital Audio Out	: PCM	HE-AAC
• TV Speaker	: On		• TV Speaker	: On	Dolby Digital+
 DTV Audio Setting 	g : Auto 🎄		 DTV Audio Settin 	g : Auto	Dolby Digital
					I MPEG



Select AUDIO.

Select DTV Audio Setting.

Select Auto, HE-AAC, Dolby Digital +, Dolby Digital or MPEG.

- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.
- Auto: Automatically outputs in the order HE-AAC > Dolby Digital + > Dolby Digital > MPEG. (Except for Italy)

Auto: Automatically outputs in the order HE-AAC > Dolby Digital+ > MPEG > Dolby Digital. (Only Italy)

HE-AAC, Dolby Digital +, Dolby Digital, MPEG: Allows users to select the audio type they want.
 ex) If MPEG is selected, MPEG is always outputted.

If MPEG is not supported, another audio type is set in that order.

• Refer to p. 167 to 168 (Audio Language Selection)

SELECTING DIGITAL AUDIO OUT

This function allows you to select your preferred Digital Audio Output.

When Dolby Digital is available, selecting Auto in the Digital Audio Out menu will set SPDIF(Sony Philips Digital InterFace) output to Dolby Digital.

If Auto is selected in the digital audio out menu when Dolby Digital is not available, SPDIF output will be PCM(Pulse-code modulation).

Even if both Dolby Digital and Audio language have been set in a channel which broadcast Dolby Digital Audio, only Dolby Digital will be played.





DIGITAL PLUS	Manufactured under license from Dolby Laboratories. Dolby and the double-D symbol are trademarks of Dolby Laboratories.		
 There is a possibility that when HDMI mode, 			

 There is a possibility that when HDMI mode, some DVD players do not make SPDIF sound. At that time, set the output of the digital audio of the DVD player to PCM. (In HDMI, Dolby Digital Plus is not supported).

Item	Audio Input	Digital Audio output
Auto(Speaker On)	MPEG Dolby Digital Dolby Digital Plus HE-AAC	PCM Dolby Digital Dolby Digital PCM
Auto(Speaker Off)	MPEG Dolby Digital Dolby Digital Plus HE-AAC	PCM Dolby Digital Dolby Digital Dolby Digital
PCM	All	PCM

- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

AUDIO RESET

Settings of the selected Sound Mode return to the default factory settings.







• Press the MENU/EXIT button to return to normal TV viewing.

AUDIO DESCRIPTION (IN DIGITAL MODE ONLY)

This function is for the blind, and provides explanatory audio describing the current situation in a TV programme in addition to the basic audio.

When Audio Description On is selected, basic audio and Audio Description are provided only for those programmes that have Audio Description included.

Volume Changes the Audio Description volume

Beep Beeps when a programme with Audio Description information is selected





Adjustment for Audio Description Volume With selecting On



- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

|/||

STEREO/DUAL RECEPTION (IN ANALOGUE MODE ONLY)

When a programme is selected, the sound information for the station appears with the programme number and station name.



Broadcast	On Screen Display
Mono	MONO
Stereo	STEREO
Dual	DUAL I, DUAL II, DUAL I+II

Mono sound selection

If the stereo signal is weak in stereo reception, you can switch to mono. In mono reception, the clarity of sound is improved.

Language selection for dual language broadcast

If a programme can be received in two languages (dual language), you can switch to DUAL I, DUAL II or DUAL I+II.

- **DUAL I** Sends the primary broadcast language to the loudspeakers.
- **DUAL II** Sends the secondary broadcast language to the loudspeakers.
- DUAL I+II Sends a separate language to each loudspeaker.

NICAM RECEPTION (IN ANALOGUE MODE ONLY)

If the TV is equipped with a receiver for NICAM reception, high quality NICAM (Near Instantaneous Companding Audio Multiplex) digital sound can be received.

Sound output can be selected according to the type of broadcast received.



SPEAKER SOUND OUTPUT SELECTION

In AV, Component, RGB and HDMI mode, you can select output sound for the left and right loudspeakers.

Select the sound output.

- L+R: Audio signal from audio L input is sent to the left loudspeaker and audio signal from audio R input is sent to the right loudspeaker.
- L+L: Audio signal from audio L input is sent to left and right loudspeakers.
- **R+R:** Audio signal from audio R input is sent to left and right loudspeakers.

ON-SCREEN MENU LANGUAGE / COUNTRY SELECTION

The installation guide menu appears on the TV screen when it is switched on for the first time.



Select your desired language.

Select your country. (Except for 32/37/42/47/55LE59**, 32/37/42/47/55LE79**, 42/47/55LE89**, 32/37/42/47/55LD69**, 32/42/47LD79**, 32/37/42LD89**, 42/47LX69**, 50/60PK59*, 50/60PK79**, 50/60PK99**)

* If you want to change Language/ Country selection



(Except for 32/37/42/47/55LE59**, 32/37/42/47/55LE79**, 42/47/55LE89**, 32/37/42/47/55LD69**, 32/42/47LD79**, 32/37/42LD89**, 42/47LX69**, 50/60PK59*, 50/60PK79**, 50/60PK99**)

- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

- If you do not finish the set-up Installation Guide by pressing BACK or if you time out on the OSD (On Screen Display) the installation menu will continuously appear until the set up is completed whenever the TV is switched on.
- If you select the wrong local country, teletext may not appear correctly on the screen and some problems may occur during teletext operation.
- ▶ The CI (Common Interface) function may not be applied based on country broadcasting circumstances.
- ► DTV mode control buttons may not function based on country broadcasting circumstances.
- In country that Digital broadcasting regulation isn't fixed, some DTV function may not work depending on digital broadcasting circumstances.
- ► The Country Setting "UK" should only be activated in UK.
- If the country setting is set to "--", European terrestrial digital standard broadcasting programmes are available, but some DTV functions may not work properly.

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LANGUAGE SELECTION

The Audio function allows selection of a preferred language.

If audio data in a selected language is not broadcast, the default language audio will be played.

Use the Subtitle function when two or more subtitle languages are broadcast. If subtitle data in a selected language is not broadcast, the default language subtitle will be displayed.

When the languages you selected as the primary for Audio Language and Subtitle Language and Text Language are not supported, you can select language in secondary category.

In Digital mode, use the Text language function when two or more Text languages are broadcast. If teletext data in a selected language is not broadcast, the default Text language page will be displayed.



< Audio Language Selection >

When two or more audio languages are broadcast, you can select the audio language.

Select Audio or Audio Language.

Select an audio language.

< Subtitle Language Selection >

- When two or more subtitle languages are broadcast, you can select the subtitle language with the SUBTITLE button on the remote control.
- \blacktriangleright Press the $\land \lor$ button to select a subtitle language.

Audio	Audio Language OSD Information					
Display	Status					
N.A	Not Available					
MPEG	MPEG Audio					
D D	Dolby Digital Audio					
Po	Audio for "Visual Impaired"					
ABC	Audio for "Hearing Impaired"					
D+	Dolby Digital Plus Audio					
HE-AAC	HE-AAC Audio					

Subtitle Language OSD Information

, , , , , , , , , , , , , , , , , , ,			
Display	Status		
N.A	Not Available		
ТХТ	Teletext Subtitle		
ABC	Subtitle for "Hard of Hearing"		

- The audio/subtitles can be displayed in a simpler form with 1 to 3 characters broadcast by the service provider.
- When you select supplementary Audio (Audio for "Visual/Hearing Impaired") the TV may output a part of the Main audio.

TIME SETTING

CLOCK SETUP

The clock is set automatically when receiving a digital signal in **Auto** mode. You can set the clock manually in **Manual** mode.

You must set the time correctly before using on/off timer function.

The TV time is set by the time offset information based on Time Zone and GMT (Greenwich Mean Time) which is received with the broadcast signal and the time is set automatically by a digital signal.

When if the city name in Time Zone is changed into offset, you can change time by 1 hour.

Time Zone menu can be changed in Auto mode.





• Press the MENU/EXIT button to return to normal TV viewing.

TIME SETTING

AUTO ON/OFF TIME SETTING

The Off time function automatically switches the TV to standby at a preset time. Two hours after the TV is switched on by the on time function it will automatically switch back to standby mode unless a button has been pressed.

The Off time function overrides the On time function if both are set to the same time. The TV must be in standby mode for the On time to work.





- Press the **MENU/EXIT** button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

SLEEP TIMER SETTING

You do not have to remember to switch the TV off before you go to sleep. The sleep timer automatically switches the TV to standby after the preset time has elapsed.



• When you switch the TV off, the preset sleep timer is cancelled.

• You can also adjust Sleep Timer in the TIME menu.

PARENTAL CONTROL / RATINGS

SET PASSWORD & LOCK SYSTEM

Enter the password, press '0', '0', '0', '0' on the remote control handset. When France is selected for Country, password is not '0', '0', '0', '0' but '1','2','3','4'. When France is selected for Country, password cannot be set as '0', '0', '0', '0'.

If a channel is locked, enter the password to unlock it temporarily.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the BACK button to move to the previous menu screen.

BLOCK PROGRAMME

Blocks any programme that you do not want to watch or that you do not want your children to watch.

It is available to use this function in Lock System "On".

Enter a password to watch a blocked programme.



or				
Programme Edit Favourite Group : 💼				
Cable DTV	Cable Radio Ca	ble TV		
1 Nine Digital	2 Nine Digital HD	3 Nine Guide		
4 7 Digital	5 7 HD Digital	6 7 Digital 1		
7 7 Digital2	8 7 Digital3	9 7 Guide		
Pr. Change	ition P 🗘 Page Change	Previous		
Block/Unblock				

Page Change

Block/Unblock

Ċ

τv

3 Nine Guide

Previous

6 7 Digital 1

9 7 Guide



PARENTAL CONTROL / RATINGS

PARENTAL CONTROL (IN DIGITAL MODE ONLY)

This function operates according to information from the broadcasting station. Therefore if the signal has incorrect information, this function does not operate.

A password is required to gain access to this menu.

This set is programmed to remember which option it was last set to even if you switch the set off.

Prevents children from watching certain adult's TV programmes, according to the ratings limit set.

Enter a password to watch a blocked programme.

Rating differs by country.





• Press the MENU/EXIT button to return to normal TV viewing.
EXTERNAL INPUT BLOCKING

Enables you to block an input.

It is available to use this function in Lock System "On".



Image shown may differ from your TV.

6	LOCK		• AV1	 Off ►
6	Set Password		• AV2	Off
	 Lock System 	: On	Component	Off
\odot		 Block Progra 		Off
2		Parental Gui	• HDMI1	Off
	Key Lock	Input Block : Off	• HDMI2	Off
	e noy Look	. 01	• HDMI3	Off
8			• HDMI4	Off
			(Close



- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

PARENTAL CONTROL / RATINGS

KEY LOCK

This feature can be used to prevent unauthorized viewing by locking out the front panel controls, so that it can only be used with the remote control.

This TV is programmed to remember which option it was last set to even if you turn the TV off.





- Press the MENU/EXIT button to return to normal TV viewing.
- Press the **BACK** button to move to the previous menu screen.

TELETEXT

This feature is not available in all countries.

Teletext is a free service broadcast by most TV stations which gives up-to-theminute information on news, weather, television programmes, share prices and many other topics.

The teletext decoder of this TV can support the SIMPLE, TOP and FASTEXT systems. SIMPLE (standard teletext) consists of a number of pages which are selected by directly entering the corresponding page number. TOP and FASTEXT are more modern methods allowing quick and easy selection of teletext information.

SWITCH ON/OFF

Press the **TEXT** button to switch to teletext. The initial page or last page viewed appears on the screen.

Two page numbers, TV station name, date and time are displayed on the screen headline. The first page number indicates your selection, while the second shows the current page displayed.

Press the TEXT button to switch off teletext. The previous mode reappears.

(Image shown may differ from your TV.)



SIMPLE TEXT

Page selection

- Enter the desired page number as a three digit number with the NUMBER buttons. If during selection you press a wrong number, you must complete the three digit number and then re-enter the correct page number.
- 2 The $P \land \lor$ button can be used to select the preceding or following page.

TELETEXT

TOP TEXT

The user guide displays four fields-red, green, yellow and blue at the bottom of the screen. The yellow field denotes the next group and the blue field indicates the next block.

Block / group / page selection

- With the blue button you can progress from block to block.
- **2** Use the yellow button to proceed to the next group with automatic overflow to the next block.
- With the green button you can proceed to the next existing page with automatic overflow to the next group.
- Alternatively the P ^ button can be used.

The red button returns to the previous selection. Alternatively the P \sim button can be used.

Direct page selection

As with SIMPLE teletext mode, you can select a page by entering it as a three digit number using the NUMBER buttons in TOP mode.

FASTEXT

The teletext pages are colour coded along the bottom of the screen and are selected by pressing the corresponding coloured button.

Page selection

- **1** Press the **T.OPT** button and then use $\land \lor$ button to select $\exists i d$ menu. Display the index page.
- You can select the pages which are colour coded along the bottom line with corresponding coloured buttons.
- S AS with SIMPLE teletext mode, you can select a page by entering its three digit page number with the NUMBER buttons in FASTEXT mode.
- 4 The $P \land \lor$ button can be used to select the preceding or following page.

SPECIAL TELETEXT FUNCTIONS

- Press the **T. OPT** button and then use $\land \lor$ button to select the **Text Option** menu.
- In UK(In digital mode), T. OPT button does not work.

Index

Select the each index page.



Time

When viewing a TV programme, select this menu to display the time at the top right hand corner of the screen.

In the teletext mode, press this button to select a sub page number. The sub page number is displayed at the bottom of the screen. To hold or change the sub page, press the RED/GREEN, <> or NUMBER buttons.



Hold

Stops the automatic page change which will occur if a teletext page consists of 2 or more sub pages. The number of sub pages and the sub page displayed is, usually, shown on the screen below the time. When this menu is selected the stop symbol is displayed at the top left-hand corner of the screen and the automatic page change is inactive.



Reveal

Select this menu to display concealed information, such as solutions to riddles or puzzles.



Update

Displays the TV picture on the screen while waiting for a new teletext page. The display will appear at the top left hand corner of the screen. When the updated page is available then display will change to the page number. Select this menu again to view the updated teletext page.

Text Option			
≣i Index			
E Time			
E Hold			
E? Reveal			
EX Update			
Close			

DIGITAL TELETEXT

*This function works in UK, Ireland only.

The TV gives you access to digital teletext which is greatly improved in various aspects such as text, graphics etc.

This digital teletext can access special digital teletext services and specific services which broadcast digital teletext.

TELETEXT WITHIN DIGITAL SERVICE

1

Press the numeric or $\mathbf{P} \land \lor$ button to select a digital service which broadcasts digital teletext.

2

3

Follow the indications on digital teletext and move onto the next step by pressing **TEXT**, **OK**, $\land \lor < \Rightarrow$, **RED**, **GREEN**, **YELLOW**, **BLUE** or **NUMBER** buttons and etc..

To change digital teletext service, select a different service by the numeric or $\mathbf{P} \land \lor$ button.



TELETEXT IN DIGITAL SERVICE

Press the numeric or $\mathbf{P} \land \lor$ button to select a certain service which broadcasts digital teletext.



1

Press the **TEXT** or coloured button to switch on teletext.



Follow the indications on digital teletext and move onto the next step by pressing **OK**, $\land \lor \lt >$, **RED**, **GREEN**, **YELLOW**, **BLUE** or **NUMBER** buttons and so on.



Some services may allow you to access text services by pressing the **RED** button.



TROUBLESHOOTING

The TV does not operate properly.				
The remote control does not work	 Check to see if there is any object between the TV and the remote control causing an obstruction. Ensure you are pointing the remote control directly at the TV. Ensure that the batteries are installed with correct polarity (+ to +, - to -). 			
	Install new batteries.			
	Is the sleep timer set?			
Power is suddenly	Check the power control settings. Has the Power supply been interrupted.			
turned off	If the TV is switched on and there is no input signal, it will switch off auto- matically after 15 minutes.			

The video function does not work.			
	 Check whether the TV is switched on. 		
	 Try another channel. The problem may be with the broadcast. 		
No picture & No sound	Is the power cord inserted correctly into the mains?		
	 Check your antenna direction and/or location. 		
	 Test the mains outlet by plugging another TV into the same outlet. 		
Picture appears slowly after switching on	 This is normal, the image is muted during the TV startup process. Please contact your service centre, if the picture has not appeared after five minutes. 		
	 Adjust Colour in menu option. 		
No or poor colour	 Allow a sufficient distance between the TV and the VCR. 		
or poor picture	 Try another channel. The problem may be with the broadcast. 		
	Are the video cables installed properly?		
	 Activate any function to restore the brightness of the picture. 		
Horizontal/vertical bars or picture shaking	Check for local interference such as an electrical appliance or power tool.		
Poor reception on	 Station or cable channel experiencing problems, tune to another station. 		
some channels	 Station signal is weak, reposition the antenna to receive weaker stations. 		
Some channels	 Check for sources of possible interference. 		
Lines or streaks	 Check antenna (Change the position of the antenna). 		
in pictures			
No picture	Check that your HDMI cable is High Speed HDMI Cable.		
when connecting HDMI	If the HDMI cables are not High Speed HDMI Cable, flickering or no screen display can result. Please use the High Speed HDMI Cable.		

The audio function does not work.				
Picture OK & No sound	 Press the ∠ + or - button. Sound muted? Press MUTE button. Try another channel. The problem may be with the broadcast. Are the audio cables installed properly? 			
No output from one of the speakers	 Adjust Balance in menu option. 			
Unusual sound from inside the TV	A change in ambient humidity or temperature may result in an unusual noise when the TV is switched on or off and does not indicate a fault with the TV.			
No sound when con- necting HDMI or USB	 Check HDMI cable is High Speed HDMI Cable. Check USB cable over version 2.0. *This feature is not available for all models. 			

There is a problem in PC mode. (Only PC mode applied)				
The signal is out of range (Invalid format)	 Adjust resolution, horizontal frequency, or vertical frequency. Check the input source. 			
Vertical bar or stripe on background & Horizontal Noise & Incorrect position	 Use Auto configure or adjust clock, phase, or H/V position. (Option) 			
Screen colour is unstable or single colour	Check the signal cable.Reinstall the PC video card.			

There is a problem with PICTURE settings.

When the user chang-	
es the picture settings,	It means that the TV is currently set to Store Demo mode.
the TV automatically	To switch to Home use mode you should do the followings:
converts back to the	From the TV Menu, choose OPTION -> Choose Mode Setting -> Choose
initial settings after a	Home use. Now, you have completed switching to the Home use mode.
certain period of time.	

MAINTENANCE

Early malfunctions can be prevented. Careful and regular cleaning can prolong the life of your new TV.

Caution: Be sure to switch the power off and unplug the power cord before you begin any cleaning.

Cleaning the Screen

A good way to keep the dust off your screen for a while is to wet a soft cloth in a mixture of lukewarm water and a little fabric softener or dish washing detergent. Wring the cloth until it is almost dry, and then use it to wipe the screen.



Ensure there is no excess water on the screen. Allow any water or dampness to evaporate before switching on.

Cleaning the Cabinet

- To remove dirt or dust, wipe the cabinet with a soft, dry, lint-free cloth.
- Do not to use a wet cloth.

Extended Absence

CAUTION

If you expect to leave your TV dormant for prolonged periods (such as a holiday), unplug the power cord to protect against possible damage from lightning or power surges.

PRODUCT SPECIFICATIONS

MODELS		32LE5***		
		32LE5500-ZA / 32LE550N-ZA 32LE5800-ZA / 32LE5900-ZA	32LE5510-ZB / 32LE551N-ZB 32LE5810-ZB / 32LE5910-ZB	
Dimensions (Width x Height x	with stand	784.6 mm x 558.1 mm x 221.0 mm	784.6 mm x 558.1 mm x 221.0 mm	
Depth)	without stand	784.6 mm x 499.5 mm x 39.9 mm	784.6 mm x 499.5 mm x 39.9 mm	
Weight	with stand without stand	12.7 kg 10.5 kg	12.7 kg 10.5 kg	
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 130 W	AC 100-240 V~ 50 / 60 Hz 130 W	
		37LE	5***	
MOE	DELS	37LE5500-ZA / 37LE550N-ZA 37LE5800-ZA / 37LE5900-ZA	37LE5510-ZB / 37LE551N-ZB 37LE5810-ZB / 37LE5910-ZB	
Dimensions (Width x Height x	with stand	905.0 mm x 630.0 mm x 270.0 mm	905.0 mm x 630.0 mm x 270.0 mm	
Depth)	without stand	905.0 mm x 568.0 mm x 39.9 mm	905.0 mm x 568.0 mm x 39.9 mm	
Weight	with stand without stand	15.6 kg 12.8 kg	15.6 kg 12.8 kg	
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 140 W	AC 100-240 V~ 50 / 60 Hz 140 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm		
	Operating Temperature	0 °C to 40 °C		
Environment condition	Operating Humidity	Less than 80 %		
	Storage Temperature	-20 °C to 60° C		
	Storage Humidity	Less than 85 %		
Supported movie files		Refer to p. 96 to 97		

MODELS		42LE5***	
		42LE5500-ZA / 42LE550N-ZA 42LE5800-ZA / 42LE5900-ZA	42LE5510-ZB / 42LE551N-ZB 42LE5810-ZB / 42LE5910-ZB
Dimensions (Width x Height x	with stand	1016.0 mm x 692.0 mm x 270.0 mm	1016.0 mm x 692.0 mm x 270.0 mm
Depth)	without stand	1016.0 mm x 630.0 mm x 29.3 mm	1016.0 mm x 630.0 mm x 29.3 mm
Weight	with stand without stand	19.5 kg 16.7 kg	19.5 kg 16.7 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 150 W	AC 100-240 V~ 50 / 60 Hz 150 W
		47LE	5***
MOE	DELS	47LE5500-ZA / 47LE550N-ZA 47LE5800-ZA / 47LE5900-ZA	47LE5510-ZB / 47LE5 51N-ZB 47LE5810-ZB / 47LE5910-ZB
Dimensions (Width x Height x	with stand	1126.6 mm x 757.9 mm x 284.4 mm	1126.6 mm x 757.9 mm x 284.4 mm
Depth)	without stand	1126.6 mm x 692.0 mm x 29.3 mm	1126.6 mm x 692.0 mm x 29.3 mm
Weight	with stand without stand	22.9 kg 19.6 kg	22.9 kg 19.6 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 170 W	AC 100-240 V~ 50 / 60 Hz 170 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Operating Temperature		0 °C to 40 °C	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to p. 96 to 97	

MODELS		55LE5***		
		55LE5500-ZA / 55LE550N-ZA 55LE5800-ZA / 55LE5900-ZA	55LE5510-ZB / 55LE551N-ZB 55LE5810-ZB / 55LE5910-ZB	
Dimensions (Width x Height x	with stand	1306.0 mm x 867.0 mm x 345.0 mm	1306.0 mm x 867.0 mm x 345.0 mm	
Depth)	without stand	1306.0 mm x 797.0 mm x 30.7 mm	1306.0 mm x 797.0 mm x 30.7 mm	
Weight	with stand without stand	34.5 kg 28.8 kg	34.5 kg 28.8 kg	
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 200 W	AC 100-240 V~ 50 / 60 Hz 200 W	
		42LX6***	47LX6***	
MOE	DELS	42LX6500-ZD / 42LX650N-ZD 42LX6800-ZD / 42LX6900-ZD	47LX6500-ZD / 47LX650N-ZD 47LX6800-ZD / 47LX6900-ZD	
Dimensions (Width x Height x	with stand	1016.0 mm x 692.0 mm x 270.0 mm	1126.6 mm x 757.9 mm x 284.4 mm	
Depth)	without stand	1016.0 mm x 630.0 mm x 29.3 mm	1126.6 mm x 692.0 mm x 29.3 mm	
Weight	with stand without stand	19.5 kg 16.7 kg	22.9 kg 19.6 kg	
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 160 W	AC 100-240 V~ 50 / 60 Hz 180 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm		
Operating Temperature		0 °C to 40 °C		
Environment condition	Operating Humidity	Less than 80 %		
	Storage Temperature	-20 °C to 60° C		
	Storage Humidity	Less than 85 %		
Supported movie files		Refer to p. 96 to 97		

MODELS		32LE7***	
		32LE7500-ZA / 32LE750N-ZA 32LE7800-ZA / 32LE7900-ZA	32LE7510-ZB / 32LE751N-ZB 32LE7810-ZB / 32LE7910-ZB
Dimensions (Width x Height x	with stand	786.4 mm x 556.2 mm x 221.0 mm	786.4 mm x 556.2 mm x 221.0 mm
Depth)	without stand	786.4 mm x 500.4 mm x 39.9 mm	786.4 mm x 500.4 mm x 39.9 mm
Weight	with stand without stand	14.8 kg 11.7 kg	14.8 kg 11.7 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 130 W	AC 100-240 V~ 50 / 60 Hz 130 W
		37LE	7***
MOE	DELS	37LE7500-ZA / 37LE750N-ZA 37LE7800-ZA / 37LE7900-ZA	37LE7510-ZB / 37LE751N-ZB 37LE7810-ZB / 37LE7910-ZB
Dimensions (Width x Height x	with stand	907.4 mm x 628.3 mm x 269.8 mm	907.4 mm x 628.3 mm x 269.8 mm
Depth)	without stand	907.4 mm x 569.0 mm x 39.9 mm	907.4 mm x 569.0 mm x 39.9 mm
Weight	with stand without stand	18.8 kg 14.7 kg	18.8 kg 14.7 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 140 W	AC 100-240 V~ 50 / 60 Hz 140 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Operating Temperature		0 °C to 40 °C	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to p. 96 to 97	

MODELS		42LE7***	
		42LE7500-ZA / 42LE750N-ZA 42LE7800-ZA / 42LE7900-ZA	42LE7510-ZB / 42LE751N-ZB 42LE7810-ZB / 42LE7910-ZB
Dimensions (Width x Height x	with stand	1018.2 mm x 692.5 mm x 269.8 mm	1018.2 mm x 692.5 mm x 269.8 mm
Depth)	without stand	1018.2 mm x 630.7 mm x 29.3 mm	1018.2 mm x 630.7 mm x 29.3 mm
Weight	with stand without stand	23.2 kg 19.1 kg	23.2 kg 19.1 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 150 W	AC 100-240 V~ 50 / 60 Hz 150 W
		47LE	7***
MOE	DELS	47LE7500-ZA / 47LE750N-ZA 47LE7800-ZA / 47LE7900-ZA	47LE7510-ZB / 47LE751N-ZB 47LE7810-ZB / 47LE7910-ZB
Dimensions (Width x Height x	with stand	1128.6 mm x 758.5 mm x 284.4 mm	1128.6 mm x 758.5 mm x 284.4 mm
Depth)	without stand	1128.6 mm x 693.3 mm x 29.8 mm	1128.6 mm x 693.3 mm x 29.8 mm
Weight	with stand without stand	27.5 kg 23.0 kg	27.5 kg 23.0 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz AC 100-240 V~ 50 / 60 Hz 170 W 170 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.	0 mm x 5.0 mm
Environment condition	Operating Temperature Operating Humidity	0 °C to 40 °C Less than 80 %	
	Storage Temperature Storage Humidity	-20 °C to 60° C Less than 85 %	
Supported movie files		Refer to p	. 96 to 97

		55LE7***	
MODELS		55LE7500-ZA / 55LE750N-ZA 55LE7800-ZA / 55LE7900-ZA	55LE7510-ZB / 55LE751N-ZB 55LE7810-ZB / 55LE7910-ZB
Dimensions (Width x Height x	with stand	1306.0 mm x 868.1 mm x 328.0 mm	1306.0 mm x 868.1 mm x 328.0 mm
Depth)	without stand	1306.0 mm x 797.4 mm x 31.2 mm	1306.0 mm x 797.4 mm x 31.2 mm
Weight	with stand without stand	39.6 kg 33.5 kg	39.6 kg 33.5 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 200 W AC 100-240 V~ 50 / 60 Hz 200 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Operating 0 °C to 40 °C Temperature			
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to p	. 96 to 97

MODELS		42LE8***	
MOL	DELS	42LE8500-ZA / 42LE850N-ZA 42LE8800-ZA / 42LE8900-ZA	42LE8510-ZB / 42LE851N-ZB 42LE8810-ZB / 42LE8910-ZB
Dimensions (Width x Height x	with stand	1013.3 mm x 705.8 mm x 235.5 mm	1013.3 mm x 705.8 mm x 235.5 mm
Depth)	without stand	1013.3 mm x 645.8 mm x 34.5 mm	1013.3 mm x 645.8 mm x 34.5 mm
Weight	with stand without stand	27.2 kg 23.1 kg	27.2 kg 23.1 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 160 W	AC 100-240 V~ 50 / 60 Hz 160 W
		47LE	8***
MOE	DELS	47LE8500-ZA / 47LE850N-ZA 47LE8800-ZA / 47LE8900-ZA	47LE8510-ZB / 47LE851N-ZB 47LE8810-ZB / 47LE8910-ZB
Dimensions (Width x Height x	with stand	1122.6 mm x 769.3 mm x 275.0 mm	1122.6 mm x 769.3 mm x 275.0 mm
Depth)	without stand	1122.6 mm x 707.3 mm x 34.5 mm	1122.6 mm x 707.3 mm x 34.5 mm
Weight	with stand without stand	31.6 kg 27.0 kg	31.6 kg 27.0 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 170 W	AC 100-240 V~ 50 / 60 Hz 170 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
	Operating Temperature	0 °C to 40 °C	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C t	o 60° C
	Storage Humidity	Less that	an 85 %
Supported movie files		Refer to p	. 96 to 97

MODELS		55LE8***	
		55LE8500-ZA / 55LE850N-ZA 55LE8800-ZA / 55LE8900-ZA	55LE8510-ZB / 55LE851N-ZB 55LE8810-ZB / 55LE8910-ZB
Dimensions (Width x Height x	with stand	1292.6 mm x 875.4 mm x 311.9 mm	1292.6 mm x 875.4 mm x 311.9 mm
Depth)	without stand	1292.6 mm x 802.9 mm x 34.5 mm	1292.6 mm x 802.9 mm x 34.5 mm
Weight	with stand without stand	43.8 kg 35.8 kg	43.8 kg 35.8 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 230 W 230 W 230 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Operating Temperature		0 °C to 40 °C Less than 80 %	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to p	. 96 to 97

MODELS		32LD6***	
		32LD650-ZC / 32LD650N-ZC 32LD680-ZC / 32LD690-ZB	32LD651-ZB / 32LD651N-ZB 32LD681-ZB / 32LD691-ZB
Dimensions (Width x Height x	with stand	797.0 mm x 555.0 mm x 207.0 mm	797.0 mm x 555.0 mm x 207.0 mm
Depth)	without stand	797.0 mm x 495.0 mm x 73.8 mm	797.0 mm x 495.0 mm x 73.8 mm
Weight	with stand without stand	9.8 kg 8.7 kg	9.8 kg 8.7 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 150 W	AC 100-240 V~ 50 / 60 Hz 150 W
		37LC	06***
MOE	DELS	37LD650-ZC / 37LD650N-ZC 37LD680-ZC / 37LD690-ZB	37LD651-ZB / 37LD651N-ZB 37LD681-ZB / 37LD691-ZB
Dimensions (Width x Height x	with stand	916.0 mm x 625.0 mm x 261.0 mm	916.0 mm x 625.0 mm x 261.0 mm
Depth)	without stand	916.0 mm x 560.0 mm x 77.7 mm	916.0 mm x 560.0 mm x 77.7 mm
Weight	with stand without stand	12.8 kg 11.2 kg	12.8 kg 11.2 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz AC 100-240 V~ 50 / 60 Hz 170 W 170 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
	Operating Temperature	0 °C to 40 °C	
Environment condition	Operating Humidity	Less that	an 80 %
	Storage Temperature	-20 °C t	o 60° C
	Storage Humidity	Less that	an 85 %
Supported movie files		Refer to p	. 96 to 97

MODELS		42L[06***
		42LD650-ZC / 42LD650N-ZC 42LD680-ZC / 42LD690-ZB	42LD651-ZB / 42LD651N-ZB 42LD681-ZB / 42LD691-ZB
Dimensions (Width x Height x	with stand	1024.0 mm x 685.0 mm x 261.0 mm	1024.0 mm x 685.0 mm x 261.0 mm
Depth)	without stand	1024.0 mm x 621.0 mm x 76.8 mm	1024.0 mm x 621.0 mm x 76.8 mm
Weight	with stand without stand	15.5 kg 13.9 kg	15.5 kg 13.9 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 210 W	AC 100-240 V~ 50 / 60 Hz 210 W
		47L[)6***
MOE	DELS	47LD650-ZC / 47LD650N-ZC 47LD680-ZC / 47LD690-ZB	47LD651-ZB / 47LD651N-ZB 47LD681-ZB / 47LD691-ZB
Dimensions (Width x Height x	with stand	1137.0 mm x 758.0 mm x 270.0 mm	1137.0 mm x 758.0 mm x 270.0 mm
Depth)	without stand	1137.0 mm x 685.0 mm x 76.8 mm	1137.0 mm x 685.0 mm x 76.8 mm
Weight	with stand without stand	20.3 kg 18.3 kg	20.3 kg 18.3 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 250 W	AC 100-240 V~ 50 / 60 Hz 250 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
	Operating Temperature	0 °C to 40 °C	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less that	an 85 %
Supported movie files		Refer to p	. 96 to 97

MODELS		55LD6***	
		55LD650-ZC / 55LD650N-ZC 55LD680-ZC / 55LD690-ZB	55LD651-ZB / 55LD651N-ZB 55LD681-ZB / 55LD691-ZB
Dimensions (Width x Height x	with stand	1329.0 mm x 872.0 mm x 330.0 mm	1329.0 mm x 872.0 mm x 330.0 mm
Depth)	without stand	1329.0 mm x 796.0 mm x 96.5 mm	1329.0 mm x 796.0 mm x 96.5 mm
Weight	with stand without stand	33.0 kg 29.8 kg	33.0 kg 29.8 kg
Power requirement		AC 100-240 V~ 50 / 60 Hz AC 100-240 V~ 50 / 6	
Power Consumption		340 W	340 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Environment condition	Operating Temperature Operating Humidity	0 °C to 40 °C Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to p	o. 96 to 97

MODELS		32LD7***	
		32LD750-ZA / 32LD750N-ZA 32LD780-ZA / 32LD790-ZA	32LD751-ZB / 32LD751N-ZB 32LD781-ZB / 32LD791-ZB / 32LD752-ZD
Dimensions (Width x Height x	with stand	804.0 mm x 567.0 mm x 212.0 mm	804.0 mm x 567.0 mm x 212.0 mm
Depth)	without stand	804.0 mm x 510.0 mm x 73.8 mm	804.0 mm x 510.0 mm x 73.8 mm
Weight	with stand without stand	10.2 kg 8.8 kg	10.2 kg 8.8 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 150 W	AC 100-240 V~ 50 / 60 Hz 150 W
		42LI	D7***
MOE	DELS	42LD750-ZA / 42LD750N-ZA 42LD780-ZA / 42LD790-ZA	42LD751-ZB / 42LD751N-ZB 42LD781-ZB / 42LD791-ZB / 42LD752-ZD
Dimensions (Width x Height x	with stand	1032.0 mm x 700.0 mm x 260.0 mm	1032.0 mm x 700.0 mm x 260.0 mm
Depth)	without stand	1032.0 mm x 639.0 mm x 76.8 mm	1032.0 mm x 639.0 mm x 76.8 mm
Weight	with stand without stand	16.5 kg 13.8 kg	16.5 kg 13.8 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 210 W AC 100-240 V~ 50 / 60 Hz 210 W	
CI Module Size (Width x Height x Depth)		100.0 mm x 55	.0 mm x 5.0 mm
	Operating Temperature	0 °C to 40 °C	
Environment condition	Operating Humidity	Less than 80 %	
	Storage Temperature	-20 °C	to 60° C
	Storage Humidity	Less th	an 85 %
Supported movie files		Refer to p	o. 96 to 97

MODELS		47LD7***	
		47LD750-ZA / 47LD750N-ZA 47LD780-ZA / 47LD790-ZA	47LD751-ZB / 47LD751N-ZB 47LD781-ZB / 47LD791-ZB / 47LD752-ZD
Dimensions (Width x Height x	with stand	1144.0 mm x 764.0 mm x 260.0 mm	1144.0 mm x 764.0 mm x 260.0 mm
Depth)	without stand	1144.0 mm x 704.0 mm x 76.8 mm	1144.0 mm x 704.0 mm x 76.8 mm
Weight	with stand without stand	20.9 kg 18.2 kg	20.9 kg 18.2 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 250 W	AC 100-240 V~ 50 / 60 Hz 250 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
Environment condition	Operating Temperature Operating Humidity	0 °C to 40 °C Less than 80 %	
	Storage Temperature	-20 °C to 60° C	
	Storage Humidity	Less than 85 %	
Supported movie files		Refer to	p. 96 to 97

MODELS		32LD8*** 32LD840-ZA / 32LD840N-ZA 32LD880-ZA / 32LD890-ZA
Dimensions (Width x Height x	with stand	803.0 mm x 568.0 mm x 212.0 mm
Depth)	without stand	803.0 mm x 502.0 mm x 73.4 mm
Weight	with stand without stand	10.0 kg 8.6 kg
Power requirement Power Consumption		AC 100-240 V~ 50 / 60 Hz 150 W
		37LD8***
MOE	DELS	37LD840-ZA / 37LD840N-ZA 37LD880-ZA / 37LD890-ZA
Dimensions (Width x Height x	with stand	922.0 mm x 640.0 mm x 260.0 mm
Depth)	without stand	922.0 mm x 568.0 mm x 77.3 mm
Weight	with stand without stand	13.9 kg 11.3 kg
Power requirement		AC 100-240 V~ 50 / 60 Hz
Power Consumption		170 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm
	Operating Temperature	0 °C to 40 °C
Environment condition	Operating Humidity	Less than 80 %
	Storage Temperature	-20 °C to 60° C
	Storage Humidity	Less than 85 %
Supported movie files		Refer to p. 96 to 97

MODELS		42LD8***
MODELS		42LD840-ZA / 42LD840N-ZA 42LD880-ZA / 42LD890-ZA
Dimensions (Width x Height x Depth)	with stand	1030.0 mm x 701.0 mm x 260.0 mm
Deptity	without stand	1030.0 mm x 628.0 mm x 76.4 mm
Weight	with stand without stand	16.5 kg 13.9 kg
Power requirement		AC 100-240 V~ 50 / 60 Hz
Power Consumption		210 W
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm
	Operating Temperature	0 °C to 40 °C
Environment condition	Operating Humidity	Less than 80 %
	Storage Temperature	-20 °C to 60° C
	Storage Humidity	Less than 85 %
Supported movie files		Refer to p. 96 to 97

MODELS		50PK5**	60PK5**
		50PK590-ZE	60PK590-ZE
Dimensions (Width x Height x	with stand	1171.4 mm x 786.2 mm x 309.7 mm	1392.0 mm x 915.0 mm x 384.0 mm
Depth)	without stand	1171.4 mm x 724.4 mm x 55.3 mm	1392.0 mm x 852.0 mm x 55.3 mm
Weight	with stand without stand	31.0 kg 28.6 kg	45.9 kg 41.4 kg
		50PK7***	60PK7***
MODELS		50PK760-ZC / 50PK760N-ZC 50PK780-ZC / 50PK790-ZC	60PK760-ZC / 60PK760N-ZC 60PK780-ZC / 60PK790-ZC
Dimensions (Width x Height x	with stand	1184.0 mm x 801.0 mm x 294.5 mm	1402.8 mm x 934.3 mm x 384.0 mm
Depth)	without stand	1184.0 mm x 738.5 mm x 52.4 mm	1402.8 mm x 866.8 mm x 52.4 mm
Weight	with stand without stand	34.5 kg 29.9 kg	50.3 kg 42.7 kg
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm	
	Operating Temperature	0 °C to 40 °C	
Environment condition	Operating Humidity	Less that	an 80 %
	Storage Temperature	-20 °C t	o 60° C
	Storage Humidity	Less that	an 85 %
Supported movie files		Refer to p. 96 to 97	

• For the power supply and power consumption, refer to the label attached to the product.

MOE	DELS	50PK9*** 50PK950-ZA / 50PK960-ZA 50PK950N-ZA / 50PK980-ZA 50PK990-ZA	60PK9*** 60PK950-ZA / 60PK960-ZA 60PK950N-ZA / 60PK980-ZA 60PK990-ZA		
Dimensions (Width x Height x	with stand	1190.0 mm x 804.5 mm x 294.5 mm	1408.8 mm x 937.9 mm x 384.0 mm		
Depth)	without stand	1190.0 mm x 737.0 mm x 52.4 mm	1408.8 mm x 860.7 mm x 52.4 mm		
Weight	with stand without stand	34.8 kg 30.2 kg	50.9 kg 43.3 kg		
CI Module Size (Width x Height x Depth)		100.0 mm x 55.0 mm x 5.0 mm			
Operating Temperature Environment condition Operating Humidity		0 °C to 40 °C Less than 80 %			
	Storage Temperature Storage Humidity	-20 °C to 60° C Less than 85 %			
Supported movie files		Refer to p. 96 to 97			

• For the power supply and power consumption, refer to the label attached to the product.

	Digital TV	Analogue TV	
Tolovision System	DVB-T	PAL/SECAM B/G/D/K, PAL I/II,	
Television System	DVB-C	SECAM L/L'	
Drogramma Cavaraga		VHF: E2 to E12, UHF: E21 to E69,	
Programme Coverage	VHF, UHF	CATV: S1 to S20, HYPER: S21 to S47	
External Antenna Impedance	75 Ω	75 Ω	

IR CODES

*This feature is not available for all models.

Code (Hexa)	Function	Note		
95	Energy Saving	R/C BUTTON		
08	POWER	R/C BUTTON(POWER ON/OFF)		
0B	INPUT	R/C BUTTON		
79	RATIO	R/C BUTTON		
F0	TV/RAD	R/C BUTTON		
45	Q.MENU	R/C BUTTON		
43	MENU	R/C BUTTON		
AB	GUIDE	R/C BUTTON		
40	Up (^)	R/C BUTTON		
41	Down (\sc)	R/C BUTTON		
07	Left (<)	R/C BUTTON		
06	Right (>)	R/C BUTTON		
44	OK()	R/C BUTTON		
28	BACK	R/C BUTTON		
5B	EXIT	R/C BUTTON		
AA	INFO	R/C BUTTON		
30	AV MODE	R/C BUTTON		
02	⊿+	R/C BUTTON		
03	⊿-	R/C BUTTON		
1E	FAV (MARK) (CHAR/NUM)	R/C BUTTON		
09	MUTE (DELETE)	R/C BUTTON		
00	P ^	R/C BUTTON		
01	P∨	R/C BUTTON		
10 to 19	Number Key 0 to 9	R/C BUTTON		
53	LIST	R/C BUTTON		
1A	Q.VIEW	R/C BUTTON		
72	RED Key	R/C BUTTON		
71	GREEN Key	R/C BUTTON		
63	YELLOW Key	R/C BUTTON		
61	BLUE Key(L/R SELECT)	R/C BUTTON		
20	TEXT	R/C BUTTON		
21	T.OPT(T.Option)	R/C BUTTON		
39	SUBTITLE	R/C BUTTON		
7E	SIMPLINK	R/C BUTTON		
91	AD	R/C BUTTON		
B1		R/C BUTTON		
B0	•	R/C BUTTON		
BA	II(FREEZE:Plasma TV only)	R/C BUTTON		
8F	••	R/C BUTTON		
8E	>>	R/C BUTTON		
59	NetCast	R/C BUTTON		
58	@	R/C BUTTON		
DC	3D	R/C BUTTON		
9F	APP/*	R/C BUTTON		

EXTERNAL CONTROL DEVICE SETUP

RS-232C Setup

Connect the RS-232C (serial port) input jack to an external control device (such as a computer or an A/V control system) to control the product's functions externally.

Connect the serial port of the control device to the RS-232C jack on the product back panel.

Note: RS-232C connection cables are not supplied with the product.



Type of Connector; D-Sub 9-Pin Male

No.	Pin Name	
1	No connection	
2	RXD (Receive data)	
3	TXD (Transmit data)	
4	DTR (DTE side ready)	
5	GND	
6	DSR (DCE side ready)	
7	RTS (Ready to send)	
8	CTS (Clear to send)	69
9	No Connection	

RS-232C Configurations

7-Wire C	Configurations	(Standard I	RS-232C cable)	3-Wire	e Configuratio	ons(Not sta	ndard)
	PC	TV			PC	TV	
RXD	2		TXD	RXD	2 •	— • 3	TXD
TXD	3	2	RXD	TXD	3 •	- 2	RXD
GND	5	— 5	GND	GND	5 •	• 5	GND
DTR	4 •	— • 6	DSR	DTR	4	6	DTR
DSR	6 •	— • 4	DTR	DSR	6	4	DSR
RTS	7 •		CTS	RTS	7	7	RTS
CTS	8 •	• 7	RTS	CTS	8	8	CTS
	D-Sub 9	D-Sub 9			D-Sub 9	D-Sub 9	

Set ID

Use this function to specify a set ID number. Refer to 'Real Data Mapping'. ► **p.207**





Select **OPTION**.

Select Set ID.

Adjust **Set ID** to choose the desired TV ID number. The adjustment range of SET ID is 1 to 99.

• Press the BACK button to move to the previous menu screen.

Communication Parameters

- Baud rate : 9600 bps (UART)
- Data length : 8 bits
- Parity : None
- Stop bit : 1 bit
- Communication code : ASCII code

Command Reference List

	COMMAND 1	COMMAND 2	DATA (Hexadecimal)
01. Power	k	а	00 to 01
02. Aspect Ratio	k	С	Refer to p. 205
03. Screen Mute	k	d	Refer to p. 205
04. Volume Mute	k	е	00 to 01
05. Volume Control	k	f	00 to 64
06. Contrast	k	g	00 to 64
07. Brightness	k	h	00 to 64
08. Colour	k	i	00 to 64
09. Tint	k	j	00 to 64
10. Sharpness	k	k	00 to 64
11. OSD Select	k	I	00 to 01
12. Remote control lock mode	k	m	00 to 01
13. Treble	k	r	00 to 64
14. Bass	k	S	00 to 64
15. Balance	k	t	00 to 64
16. Colour Temperature	х	u	00 to 64
17. ISM Method	j	р	Refer to p. 207
18. Energy Saving	j	q	00 to 05
19. Auto Configuration	j	u	01
20. Tune Command	m	а	Refer to p. 207
21. Programme Add/Skip	m	b	00 to 01
22. Key	m	С	Key Code
23. Control Back Light	m	g	00 to 64
24. Input select (Main)	х	b	Refer to p. 208

* Note : During USB operations such as DivX or EMF, all commands except Power(ka) and Key(mc) are not executed and treated as NG.

■ Use a crossed (reverse) cable.

Transmission / Receiving Protocol <u>Transmission</u>

[Command1][Command2][][Set ID][][Data][Cr]

	10		
*	[Command 1]:	First command to control the TV. (j, k, m or x)
	[Command 2 [Set ID]		Second command to control the TV. You can adjust the set ID to choose desired monitor ID number in option menu. Adjustment range is 1 to 99. When selecting Set ID '0', every con- nected set is controlled. Set ID is indicated as decimal (1 to 99) on menu and as Hexa decimal (0x0 to 0x63) on transmission/receiving proto- col.
*	[DATA]	:	To transmit command data. Transmit 'FF' data to read status of com- mand.
*	[Cr]	:	Carriage Return ASCII code '0x0D'
*	[]	:	ASCII code 'space (0x20)'

OK Acknowledgement

[Command2][][Set ID][][OK][Data][x]

* The set transmits ACK (acknowledgement) based on this format when receiving normal data. At this time, if the data is data read mode, it indicates present status data. If the data is data write mode, it returns the data of the PC computer.

Error Acknowledgement

[Command2][][Set ID][][NG][Data][x]

* The set transmits ACK (acknowledgement) based on this format when receiving abnormal data from non-viable functions or communication errors.

Data 00: Illegal Code

01. Power (Command: k a)

► To control Power On/Off of the set. <u>Transmission</u>

[k][a][][Set ID][][Data][Cr] Data 00 : Power Off 01 : Power On Ack

[a][][Set ID][][OK/NG][Data][x]

► To show Power On/Off. *Transmission*

[k][a][][Set ID][][FF][Cr]

<u>Ack</u>

[a][][Set ID][][OK/NG][Data][x]

- * Similarly, if other functions transmit '0xFF' data based on this format, Acknowledgement data feed back presents status about each function.
- * OK Ack., Error Ack. and other message may display on the screen when TV is power On.

02. Aspect Ratio (Command: k c) (Main Picture Size)

To adjust the screen format. (Main picture format) You can also adjust the screen format using the Aspect Ratio in the Q.MENU. or PICTURE menu.

<u>Transmission</u>

[k][c][][Set ID][][Data][Cr]

 Data
 01 : Normal screen (4:3)
 07 : 14:9

 02 : Wide screen (16:9)
 09 : Just Scan

 04 : Zoom
 0B : Full Wide

 06 : Original
 10 to 1F : Cinema Zoom 1 to 16

<u>Ack</u>

[c][][Set ID][][OK/NG][Data][x]

- * Using the PC input, you select either 16:9 or 4:3 screen aspect ratio.
- In DTV/HDMI (1080i 50 Hz / 60 Hz, 720p 50Hz / 60 Hz, 1080p 24 Hz / 30 Hz / 50 Hz / 60 Hz), Component(720p, 1080i, 1080p 50 Hz / 60 Hz) mode, Just Scan is available.
- * **Full Wide** is supported only for Digital, Analogue, AV.

03. Screen Mute (Command: k d)

► To select screen mute on/off.

Transmission

[k][d][][Set ID][][Data][Cr]

- Data 00 : Screen mute off (Picture on) Video mute off
 - 01: Screen mute on (Picture off)
 - 10: Video mute on

<u>Ack</u>

[d][][Set ID][][OK/NG][Data][x]

* In case of video mute on only, TV will display On Screen Display(OSD). But, in case of Screen mute on, TV will not display OSD.

04. Volume Mute (Command: k e)

To control volume mute on/off.
 You can also adjust mute using the MUTE button on remote control.

<u>Transmission</u>

[k][e][][Set ID][][Data][Cr]

Data 00 : Volume mute on (Volume off)

01 : Volume mute off (Volume on)

<u>Ack</u>

[e][][Set ID][][OK/NG][Data][x]

05. Volume Control (Command: k f)

To adjust volume. You can also adjust volume with the VOLUME buttons on remote control.

<u>Transmission</u>

[k][f][][Set ID][][Data][Cr]

Data Min : 00 to Max : 64

* Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[f][][Set ID][][OK/NG][Data][x]

06. Contrast (Command: k g)

To adjust screen contrast.

You can also adjust contrast in the PICTURE menu. Transmission

[k][g][][Set ID][][Data][Cr]

Data Min : 00 to Max : 64

* Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[g][][Set ID][][OK/NG][Data][x]

07. Brightness (Command: k h)

 To adjust screen brightness. You can also adjust brightness in the PICTURE menu.

<u>Transmission</u>

[k][h][][Set ID][][Data][Cr]

Data Min: 00 to Max: 64

* Refer to 'Real data mapping 1'. See page 207. <u>Ack</u>

[h][][Set ID][][OK/NG][Data][x]

08. Colour (Command: k i)

To adjust the screen colour.

You can also adjust colour in the PICTURE menu. <u>Transmission</u>

[k][i][][Set ID][][Data][Cr]

Data Min: 00 to Max: 64

* Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[i][][Set ID][][OK/NG][Data][x]

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09. Tint (Command: k j)

To adjust the screen tint.

You can also adjust tint in the PICTURE menu.

<u>Transmission</u>

[k][j][][Set ID][][Data][Cr]

Data Red : 00 to Green : 64

* Refer to 'Real data mapping 1'. See page 207. Ack

[j][][Set ID][][OK/NG][Data][x]

10. Sharpness (Command: k k)

► To adjust the screen sharpness. You can also adjust sharpness in the PICTURE menu.

<u>Transmission</u>

[k][k][][Set ID][][Data][Cr]

Data Min : 00 to Max : 64 * Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[k][][Set ID][][OK/NG][Data][x]

11. OSD Select (Command: k I)

 To select OSD (On Screen Display) on/off when controlling remotely.

Transmission

[k][l][][Set ID][][Data][Cr] Data 00 : OSD off 01 : OSD on

<u>Ack</u>

[I][][Set ID][][OK/NG][Data][x]

12. Remote control lock mode (Command: k m)

To lock the front panel controls on the monitor and remote control.

Transmission

[k][m][][Set ID][][Data][Cr] Data 00 : Lock off 01 : Lock on

<u>Ack</u>

[m][][Set ID][][OK/NG][Data][x]

- * If you are not using the remote control, use this mode.
- When main power is on/off, external control lock is released.
- * In the standby mode, if key lock is on, TV will not turn on by power on key of IR & Local Key.

13. Treble (Command: k r)

To adjust treble. You can also adjust treble in the AUDIO menu. Transmission

[k][r][][Set ID][][Data][Cr]

Data Min: 00 to Max: 64

* Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[r][][Set ID][][OK/NG][Data][x]

14. Bass (Command: k s)

 To adjust bass. You can also adjust bass in the AUDIO menu.

<u>Transmission</u>

[k][s][][Set ID][][Data][Cr]

Data Min : 00 to Max : 64 * Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[s][][Set ID][][OK/NG][Data][x]

15. Balance (Command: k t)

- To adjust balance.
- You can also adjust balance in the AUDIO menu. *Transmission*

[k][t][][Set ID][][Data][Cr]

Data Min: 00 to Max: 64

* Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[t][][Set ID][][OK/NG][Data][x]

16. Colour Temperature (Command: x u)

To adjust colour temperature. You can also adjust Colour Temperature in the PICTURE menu.

Transmission

[x][u][][Set ID][][Data][Cr]

Data Min : 00 to Max : 64 * Refer to 'Real data mapping 1'. See page 207.

<u>Ack</u>

[u][][Set ID][][OK/NG][Data][x]

APPENDIX

17. ISM Method (Command: j p) (Plasma TV only)

 To control the ISM method. You can also adjust ISM Method in OPTION menu.

<u>Transmission</u>

[j][p][][Set ID][][Data][Cr]

Data 02: Orbiter

- 04: White wash
- 08: Normal
- 20: Colour Wash

<u>Ack</u>

[p][][Set ID][][OK/NG][Data][x]

18. Energy Saving (Command: j q)

To reduce the power consumption of the TV. You can also adjust Energy Saving in PICTURE menu.

Transmission

[j][q][][Set ID][][Data][Cr]

	wer Fun		U		Level				Description
7	6	5	4		3	2	1	0	
0	0	0	0	Low Power	0	0	0	0	Off
0	0	0	0	Low Power	0	0	0	1	Minimum
0	0	0	0	Low Power	0	0	1	0	Medium
0	0	0	0	Low Power	0	0	1	1	Maximum
0	0	0	0	Low Power	0	1	0	0	Auto (LCD TV/LED LCD TV only)
0	0	0	0	Low Power	0	1	0	1	Screen Off
0	0	0	0	Low Power	0	1	0	0	Intelligent Sensor (Plasma TV only)

<u>Ack</u>

[q][][Set ID][][OK/NG][Data][x]

19. Auto Configure(Command: j u)

To adjust picture position and minimize image shaking automatically. It works only in RGB (PC) mode. <u>Transmission</u>

[j][u][][Set ID][][Data][Cr]

Data 01: To set

<u>Ack</u>

[u][][Set ID][][OK/NG][Data][x]

20. Tune Command (Command: m a)

► Select channel to following physical number. <u>Transmission</u>

[m][a][][Set ID][][Data0][][Data1][][Data2][Cr] Data00 : High channel data Data01 : Low channel data ex. No. 47 -> 00 2F (2FH) No. 394 -> 01 8A (18AH), DTV No. 0 -> Don't care

Data02 : 0x00 : Analogue Main 0x10 : DTV Main 0x20 : Radio

Channel data range Analogue - Min: 00 to Max: 63 (0 to 99) Digital - Min: 00 to Max: 3E7 (0 to 999) (Except For Sweden, Finland, Norway, Denmark, Ireland) Digital - Min: 00 to Max: 270F (0 to 9999) (Only Sweden, Finland, Norway, Denmark, Ireland)

<u>Ack</u>

[a][][Set ID][][OK/NG][Data][x]

Data Min: 00 to Max: 7DH

21. Programme Add/Skip(Command: m b)

► To set skip status for the current Programme. <u>Transmission</u>

[m][b][][Set ID][][Data][Cr] Data 00 : Skip 01 : Add

<u>Ack</u>

[b][][Set ID][][OK/NG][Data][x]

 Real 	data mapping 1
00:	Step 0
:	
A :	Step 10 (Set ID 10)
:	
F :	Step 15 (Set ID 15)
10 :	Step 16 (Set ID 16)
:	
64 :	Step 100
:	
6E :	Step 110
÷	
73 :	Step 115
74 :	Step 116
:	
CF :	Step 199
:	
FE :	Step 254
FF:	Step 255

APPENDIX

22. Key(Command: m c)

► To send IR remote key code. <u>*Transmission*</u>

[m][c][][Set ID][][Data][Cr] Data Key code - Refer to page 201.

<u>Ack</u>

[c][][Set ID][][OK/NG][Data][x]

23. Control Back Light (Command: m g) (LCD TV/LED LCD TV only)

► To Control the back light. <u>*Transmission*</u>

[m][g][][Set ID][][Data][Cr] Data : data Min: 00 to Max: 64

<u>Ack</u>

[g][][Set ID][][OK/NG][Data][x]

24. Input select (Command: x b) (Main Picture Input)

► To select input source for main picture. <u>Transmission</u>

[x][b][][Set ID][][Data][Cr] Data Structure

MSB

0	0	0	0	0	0	0	0
	Tytern	al Inn	+	L	onut N	lumbe	

LSB

	xterna	aimp	ui—	
E	xterna	al Inp	ut	Data
0	0	0	0	DTV
0	0	0	1	Analogue
0	0	1	0	AV
0	1	0	0	Component
0	1	1	0	RGB
1	0	0	0	
0	1	1	1	
1	0	0	0	HDMI
1	0	0	1	
1	0	1	0	

Input Number				Data
0	0	0	0	Input1
0	0	0	1	Input2
0	0	1	0	Input3
0	0	1	1	Input4

<u>Ack</u>

[b][][Set ID][][OK/NG][Data][x]

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Version 1.1

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