

User manual S27E591C

The color and the appearance may differ depending on the product, and the specifications are subject to change without prior notice to improve the performance.

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An administration fee may be charged if either

(a) an engineer is called out at your request and there is no defect in the product (i.e. where you have failed to read this user manual).
(b) you bring the unit to a repair center and there is no defect in the product (i.e. where you have failed to read this user manual).

The amount of such administration charge will be advised to you before any work or home visit is carried out.

Icons used in this manual



Cleaning

Exercise care when cleaning as the panel and exterior of advanced LCDs are easily scratched.

Take the following steps when cleaning.



1. Power off the monitor and computer.



2. Disconnect the power cord from the monitor.

3. Wipe the monitor screen using a clean, soft and dry cloth.



Hold the power cable by the plug and do not touch the cable with wet hands. Otherwise, an electric shock may result.



- Do not apply a cleaning agent that contains alcohol, solvent, or surfactant to the monitor.



Do not spray water or detergent directly on the product.



4. Wet a soft and dry cloth in water and wring thoroughly to clean the exterior of the monitor.



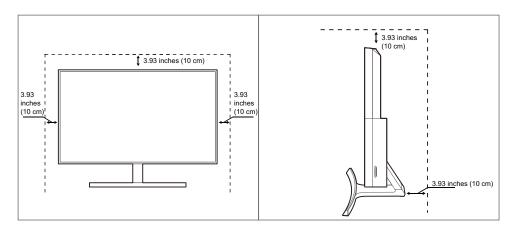
- 5. Connect the power cord to the product after cleaning the product.
- 6. Power on the monitor and computer.

Securing the Installation Space

• Ensure some space around the product for ventilation. An internal temperature rise may cause fire and damage the product. Be sure to allow the amount of space as shown below or greater when installing the product.



The exterior may differ depending on the product.



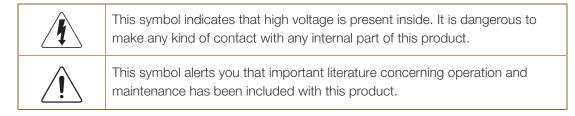
Precautions for storage



Be sure to contact Samsung Customer Service Center (page 88) if the inside of the monitor needs cleaning. (A service fee will be charged.)

Safety Precautions

| Caution |
|---|
| RISK OF ELECTRIC SHOCK DO NOT OPEN |
| Caution: TO REDUCE THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). THERE ARE NO USER SERVICEABLE PARTS INSIDE. REFER ALL SERVICING TO QUALIFIED PERSONNEL. |



Symbols

| 🔥 Warning | A serious or fatal injury may result if instructions are not followed. |
|-----------|--|
| Caution | Personal injury or damage to properties may result if instructions are not followed. |
| \otimes | Activities marked by this symbol are prohibited. |
| | Instructions marked by this symbol must be followed. |

Electricity and Safety



The following images are for reference only. Real-life situations may differ from what is shown in the images.

🔔 Warning



Do not use a damaged power cord or plug, or a loose power socket.

An electric shock or fire may result.



Do not plug many products into the same power socket.

• Otherwise, the socket may overheat and cause a fire.



Do not touch the power plug with wet hands.

• Otherwise, an electric shock may result.



Insert the power plug all the way in so it is not loose.

• An unstable connection may cause a fire.



Ensure you connect the power plug to a grounded power socket. (type 1 insulated devices only).

An electric shock or injury may result.



Do not bend or pull the power cord with force. Do not weigh the power cord down with a heavy object.

A damaged power cord may cause an electric shock or fire.
 Do not place the power cord or product near heat sources.



An electric shock or fire may result.



Remove foreign substances such as dust around the plug pins and power socket with a dry cloth.

Otherwise, a fire may result.

Caution



Do not unplug the power cord when the product is in use.

The product may become damaged by an electric shock.



Do not use the power cord for products other than authorized products supplied by Samsung.

• An electric shock or fire may result.



- Keep the power socket where the power cord is connected unobstructed.
- If any problem occurs in the product, unplug the power cable to completely cut the power to the product.

Power to the product cannot be completely cut off with the power button.

Hold the plug when disconnecting the power cord from the power socket.



An electric shock or fire may result.

Installation and Safety

🚹 Warning



DO NOT PLACE CANDLES, INSECT REPELLANTS OR CIGARETTES ON TOP OF THE PRODUCT. DO NOT INSTALL THE PRODUCT NEAR HEAT SOURCES.

• Otherwise, a fire may result.



Avoid installing the product in a narrow space with bad ventilation, such as a bookshelf or wall closet.

Otherwise, a fire may result due to an increased internal temperature.



Keep the plastic packaging bag for the product in a place that cannot be reached by children.

Children may suffocate.



Do not install the product on an unstable or vibrating surface (insecure shelf, sloped surface, etc.).

- The product may fall and break or cause a personal injury.
- Using the product in an area with excess vibration may damage the product or cause a fire.



Do not install the product in a vehicle or a place exposed to dust, moisture (water drips, etc.), oil, or smoke.



An electric shock or fire may result.



Do not expose the product to direct sunlight, heat, or a hot object such as a stove.

Otherwise, the product lifespan may be reduced, or a fire may result.

Do not install the product within the reach of young children.

The product may fall and injure children.



Edible oil, such as soybean oil, can damage or deform the product. Do not install the product in a kitchen or near a kitchen counter.





Take care not to drop the product when moving it.

Otherwise, product failure or personal injury may result.



Do not set down the product on its front.

The screen may become damaged.



When installing the product on a cabinet or shelf, make sure that the bottom edge of the front of the product is not protruding.

- The product may fall and break or cause a personal injury.
- Install the product only on cabinets or shelves of the right size.



Put down the product carefully.

• The product may fall and break or cause a personal injury.



Installing the product in an unusual place (a place exposed to a lot of fine dust, chemical substances, extreme temperatures or a significant presence of moisture, or a place where the product will operate continuously for an extended period of time) may seriously affect its performance.

Be sure to consult Samsung Customer Service Center (page 88) before installation if you want to install the product at such a place.

Operation and Safety

Warning



High voltage runs through the product. Do not attempt to disassemble, repair, or modify the product on your own.

- An electric shock or fire may result.
- Contact Samsung Customer Service Center (page 88) for repair.



To move the product, first disconnect all the cables from it, including the power cable.

Otherwise, the power cord may be damaged and a fire or electric shock may result.



If the product generates a strange noise, a burning smell, or smoke, remove the power cord immediately and contact Samsung Customer Service Center (page 88).

An electric shock or fire may result.



Do not let children hang from the product or climb on top of it.

• The product may fall, and your child may become injured or seriously harmed.



If the product falls or the exterior is damaged, power off the product, remove the power cord, and contact Samsung Customer Service Center (page 88).

• Otherwise, an electric shock or fire may result.



Do not put a heavy object, toy, or sweets on top of the product.

• The product or heavy objects may fall as children try to reach for the toy or sweets resulting in a serious injury.



If there is a thunderstorm or lightning strike, turn off the power and disconnect the power cable.

An electric shock or fire may result.



Do not drop objects on the product or apply impact.

An electric shock or fire may result.



Do not move the product by pulling the power cord or any cable.

Otherwise, the cable may be damaged and product failure, an electric shock or fire may result.



If a gas leakage is found, do not touch the product or power plug. Also, ventilate the area immediately.



Sparks can cause an explosion or fire.



Do not lift or move the product by pulling the power cord or any cable.

Otherwise, the cable may be damaged and product failure, an electric shock or fire may result.



Do not use or keep combustible spray or an inflammable substance near the product.

An explosion or fire may result.



Ensure the vents are not blocked by tablecloths or curtains.

Otherwise, a fire may result from an increased internal temperature.



Do not insert a metallic object (a chopstick, coin, hair pin, etc.) or inflammable object (paper, match, etc.) into the vent or ports of the product.

- If water or any foreign substance enters the product, be sure to power off the product, remove the power cord, and contact Samsung Customer Service Center (page 88).
- Product failure, an electric shock or fire may result.



Do not place objects containing liquid (vases, pots, bottles, etc) or metallic objects on top of the product.

- If water or any foreign substance enters the product, be sure to power off the product, remove the power cord, and contact Samsung Customer Service Center (page 88).
- Product failure, an electric shock or fire may result.

Caution



Leaving the screen fixed on a stationary image for an extended period of time may cause afterimage burn-in or defective pixels.

If you are not going to use the product for an extended period of time, activate power-saving mode or a moving-picture screen saver.



Disconnect the power cord from the power socket if you do not plan on using the product for an extended period of time (vacation, etc.).

• Otherwise, a fire may result from accumulated dust, overheating, an electric shock, or electric leakage.

Otherwise, Your eyesight may deteriorate.



Otherwise, a fire may result.

Do not put DC power adapters together.

Remove the plastic bag from the DC power adapter before you use it.



Otherwise, a fire may result.

Do not let water enter the DC power device or get the device wet.

Use the product at the recommended resolution and frequency.

- An electric shock or fire may result.
- Avoid using the product outdoors where it can be exposed to rain or snow.
- Be careful not to get the DC power adapter wet when you wash the floor.

Do not put the DC power adapter near to any heating apparatus.



Otherwise, a fire may result.



Keep the DC power adapter in a well-ventilated area.



If you place the AC/DC power adapter so that it is hanging with the cord input facing upwards, water or other foreign substances could enter the Adapter and cause the Adapter to malfunction.

Make sure to rest the AC/DC power adapter flat on a table or the floor.



Looking at the screen too close for an extended period of time can deteriorate your eyesight.



Do not hold the monitor upside-down or move it by holding the stand.

The product may fall and break or cause a personal injury.



Do not use humidifiers or stoves around the product.

An electric shock or fire may result.

Rest your eyes for more than 5 minutes for every 1 hour of product use.



Eye fatigue will be relieved.



Do not touch the screen when the product has been turned on for an extended period of time as it will become hot.



Store the small accessories used with the product out of reach of children.



Exercise caution when adjusting the product angle or stand height.

- Otherwise, children's fingers or hands may become stuck and injured.
- Tilting the product excessively may cause it to fall and result in personal injury.

Do not place heavy objects on the product.



Product failure or personal injure may result.

When using headphones or earphones, do not turn the volume too high.

Having the sound too loud may damage your hearing.

Correct posture to use the product



Use the product in the correct posture as follows:

- Straighten your back.
- Allow a distance of 45 to 50 cm between your eye and the screen, and look slightly downward at the screen.

Keep your eyes directly in front of the screen.

- Adjust the angle so light does not reflect on the screen.
- Keep your forearms perpendicular to your upper arms and level with the back of your hands.
- Keep your elbows at about a right angle.
- Adjust the height of the product so you can keep your knees bent at 90 degrees or more, your heels attached to the floor, and your arms lower than your heart.

1.1 Checking the Contents

1.1.1 Checking the Components

- Contact the dealer from whom you purchased the product if any item is missing.
 - The appearance of the components and items sold separately may differ from the image shown.

Components



Quick Setup Guide



User manual (optional)



Power cable (Only provided with the detachable DC power adapter)



HDMI-DVI cable (optional)



Stand base

Components may vary depending on the country.



Warranty card (Not available in some locations)



DC power adapter (Detachable) (optional)



D-SUB cable (optional)



DP cable (optional)



Stand neck



Regulatory guide



DC power adapter (Integrated) (optional)



HDMI cable (optional)



Stereo cable (optional)



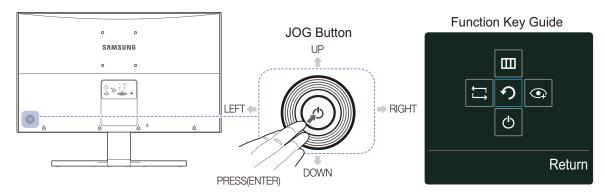


1.2 Parts

1.2.1 Control Panel



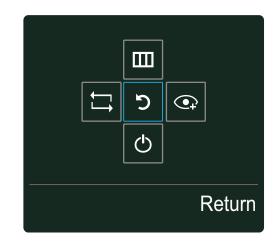
The color and shape of parts may differ from what is shown. Specifications are subject to change without notice to improve quality.



| Icons | Description |
|--------------------|--|
| JOG Button | Multi directional button that helps navigate. The JOG button is located on the rear left side of the product. The button can be used to move up, down, left or right, or as Enter. |
| Function Key Guide | Press the JOG button when the screen is turned on. The Function Key Guide will appear. To access the onscreen menu when the guide is displayed, press the corresponding direction button again. Function Key Guide may vary depending on the function or product model. Please refer to the actual product. |

1.2.2 Function Key Guide

To enter the main menu or to use other items, press the JOG button to display the Function Key Guide. You can exit by pressing the JOG button again.



- UP/DOWN/LEFT/RIGHT: Move to the item you want. The description for each item will appear when the focus changes.
- PRESS(ENTER): The selected item will be applied.

| Icons | Description |
|-------|--|
| Ţ | Selects [] to change the input signal by moving the JOG button in the Function Key Guide screen. A message will appear on the top left corner of the screen if the input signal has been changed. |
| | Selects [III] by moving the JOG button in the Function Key Guide screen. The OSD (On Screen Display) of your Monitor's feature appears. OSD control lock: Maintain the current settings, or lock the OSD control to prevent unintended changes to settings. Enable/Disable: To lock/unlock the OSD control, press the LEFT button for 10 seconds when the main menu displayed. If the OSD control is locked, Brightness and Contrast can be adjusted. Eye Saver Mode is available. System → Power LED On is available. Information can be viewed. |

| Icons | Description |
|-------|--|
| | Select [$$] by moving the JOG button in the Function Key Guide |
| | screen. |
| | Press to enable or disable Eye Saver Mode. |
| • | The items below are not available if the Eye Saver Mode function is enable. |
| | Picture → <u>Game Mode</u>, ^{SAMSUNG}Bright, Brightness, <u>Color</u> |
| | • System → <u>Eco Saving Plus</u> |
| Ċ | Selects [ტ] to turn the Monitor off by moving the JOG button in the Function Key Guide screen. |

Actual models because of functional variation, Function key guide options will be different.

Please run the corresponding function based on the actual icon and description.

When the monitor displays nothing (i.e. Power saving mode or Non-signal mode), 2 direct keys for control source and power could be used as below.

| JOG Button | Power saving/Non-signal mode | |
|----------------------------|------------------------------|--|
| UP | Source Change | |
| Down | - Source on ange | |
| PRESS(ENTER) for 2 seconds | Power Off | |

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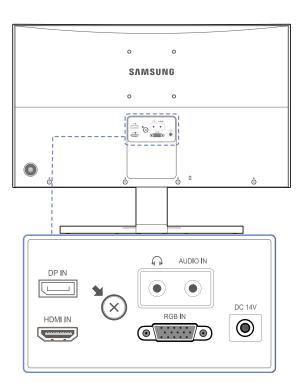
When the monitor displays the Main menu the JOG Button could be used as below.

| JOG Button | Action |
|------------|--|
| UP/DOWN | - Move the option |
| LEFT | Exit the Main menu. Close Sublist without saving value. Value decreases in the slider. |
| RIGHT | Move to next depth.Value increases in the slider. |
| ENTER | Move to next depth.Save the value and close Sublist. |

1.2.3 Reverse Side



The color and shape of parts may differ from what is shown. Specifications are subject to change without notice to improve quality.



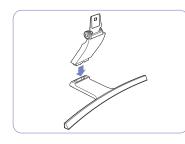
| Port | About ports |
|--------|--|
| | Connects to a PC using a DP cable |
| | Connect to a source device using an HDMI cable. |
| | n Connect to an audio output device such as headphones. [AUDIO IN] Connect to audio input using an audio cable. |
| DC 14V | Connects to the DC power adapter. |
| RGB IN | Connect to a PC using the D-SUB cable. |

1.3 Installation

1.3.1 Attaching the Stand

Before assembling the product, place the product down on a flat and stable surface so that the screen is facing downwards.

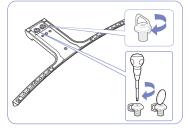
Warning: The product is curved. Placing pressure on the product when on a flat surface may damage the product. When the product is on the ground facing up or down, do not put pressure on it.



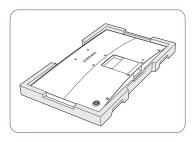
Insert the stand neck into the stand base in the direction shown in the figure.



Check that the stand neck is firmly connected.

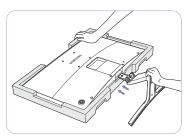


Tightly fasten the connecting screw at the bottom of the stand base.



Place the protective Styrofoam Hold the main body of the (cushion) included in the package on the floor and place the product facing down on the Styrofoam, as shown in the image.

If Styrofoam is unavailable, use a thick sitting mat.



product with your hand as shown by the figure.

Push the assembled stand into the main body in the direction of the arrow as shown in the figure.



- Caution

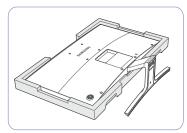
Do not hold the product upside down only by the stand.

1.3.2 Removing the Stand

K

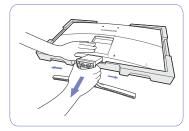
Before assembling the product, place the product down on a flat and stable surface so that the screen is facing downwards.

Warning: The product is curved. Placing pressure on the product when on a flat surface may damage the product. When the product is on the ground facing up or down, do not put pressure on it.

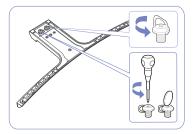


Place the protective Styrofoam (cushion) included in the package on the floor and place the product facing down on the Styrofoam, as shown in the image.

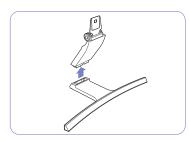
If Styrofoam is unavailable, use a thick sitting mat.



To disassemble the stand from the monitor, make sure to press the lower part of the monitor with one hand, and pull and sway sideways the stand with the other hand, as shown in the picture.



Turn the connecting screw at the bottom of the stand base to separate it.

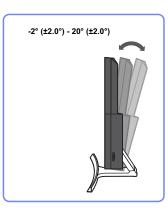


Remove the stand neck from the stand base by pulling it in the direction of the arrow as shown in the figure.

1.3.3 Adjusting the Product Tilt



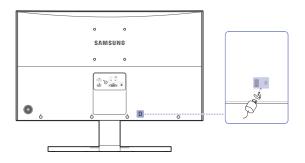
The color and shape of parts may differ from what is shown. Specifications are subject to change without notice to improve quality.



- You can adjust the tilt of your monitor.
- Hold the lower part of the product and adjust the tilt carefully.

1.3.4 Anti-theft Lock

An anti-theft lock allows you to use the product securely even in public places. The locking device shape and locking method depend on the manufacturer. Refer to the user guide provided with your anti-theft locking device for details. The lock device is sold separately.



The color and shape of parts may differ from what is shown. Specifications are subject to change without notice to improve quality.

To lock an anti-theft locking device:

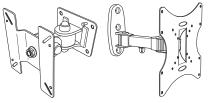
- 1 Fix the cable of your anti-theft locking device to a heavy object such as a desk.
- 2 Put one end of the cable through the loop on the other end.
- 3 Insert the locking device into the anti-theft lock slot at the back of the product.
- 4 Lock the locking device.

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- An anti-theft locking device can be purchased separately.
 - Refer to the user guide provided with your anti-theft locking device for details.
 - Anti-theft locking devices can be purchased at electronics retailers or online.

1.3.5 Installing the Wall Mount

Installing the Wall Mount Kit



The wall mount kit allows you to mount the product on the wall.

Purchase a compatible wall-mount kit to use with the product.

For detailed information on installing the wall mount, see the instructions provided with the wall mount.

We recommend you contact a technician for assistance when installing the wall mount bracket.

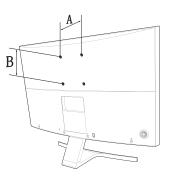
Samsung Electronics is not responsible for any damage to the product or injury to yourself or others if you elect to install the wall mount on your own.

Wall Mount Kit Specifications (VESA)

- Install your wall mount on a solid wall perpendicular to the floor. Before attaching the wall mount to surfaces other than plaster board, please contact your nearest dealer for additional information. If you install the product on a slanted wall, it may fall and result in severe personal injury. Samsung wall mount kits contain a detailed installation manual and all parts necessary for assembly are provided.
- K

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- For wall mounts that do not comply with the VESA standard screw specifications, the length of the screws may differ depending on the wall mount specifications.
- Do not fasten the screws too firmly. This may damage the product or cause the product to fall, leading to personal injury. Samsung is not liable for these kinds of accidents.
- Samsung is not liable for product damage or personal injury when a non-VESA or non-specified wall mount is used or the consumer fails to follow the product installation instructions.
- Do not mount the product at more than a 15 degree tilt.
- Always have two people mount the product on a wall.
- Standard dimensions for wall mount kits are shown in the table below.



Unit: mm (inches)

| Model name | VESA screw hole specs (A * B) in millimeters | Standard Screw | Quantity | |
|------------|---|----------------|----------|--|
| S27E591C | 100 x 100 (3.9 x 3.9) | M4 | 4 | |

Do not install your Wall Mount Kit while your product is turned on. It may result in personal injury due to electric shock.

2.1 Before Connecting

2.1.1 Pre-connection Checkpoints

- Before connecting a source device, read the user manual provided with it.
 The number and locations of ports on source devices may differ from device to device.
- Do not connect the power cable until all connections are completed.
 Connecting the power cable during connection may damage the product.
- Check the types of ports at the back of the product you want to connect.

2.2 Connecting and Using a PC

2.2.1 Connecting to a PC

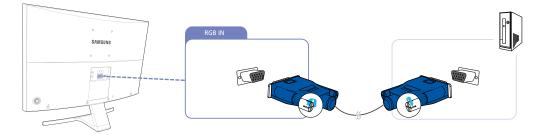
- Select a connection method suitable for your PC.
- ß

Connecting parts may differ in different products.

Connection Using the D-SUB Cable (Analog Type)



Do not connect the power cable before connecting all other cables. Ensure you connect a source device first before connecting the power cable.



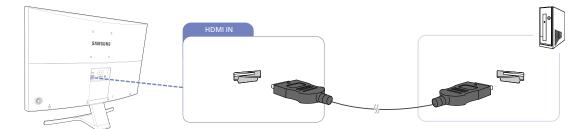
- 1 Connect the D-SUB cable to the [RGB IN] port on the back of the product and the RGB port on the PC.
- 2 Connect the DC power adapter to the product and a power socket. Next, turn on the power switch on the PC. (For details, refer to "2.2.2 Connecting the Power".)
- 3 Change the input source to **Analog** controlling the JOG button UP/DOWN, when input source is not set.



Connection Using the HDMI Cable

K

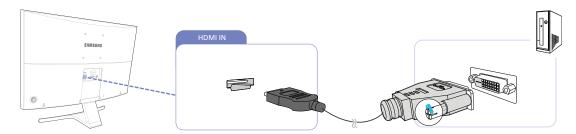
Do not connect the power cable before connecting all other cables. Ensure you connect a source device first before connecting the power cable.



- 1 Connect the HDMI cable to the [HDMI IN] port on the back of the product and the HDMI port on the PC.
- 2 Connect the DC power adapter to the product and a power socket. Next, turn on the power switch on the PC. (For details, refer to "2.2.2 Connecting the Power".)
- 3 Change the input source to HDMI controlling the JOG button UP/DOWN, when input source is not set.
- When connecting an HDMI cable, use the cable that came with the components of the monitor. If you use an HDMI cable other than provided by Samsung, the image quality may be degraded.

Connection Using an HDMI-DVI Cable

Do not connect the power cable before connecting all other cables. Ensure you connect a source device first before connecting the power cable.



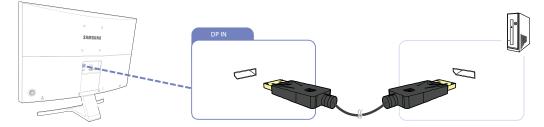
- 1 Connect the HDMI-DVI cable to the [HDMI IN] port on the back of the product and the DVI port on the PC.
- 2 Connect the DC power adapter to the product and a power socket. Next, turn on the power switch on the PC. (For details, refer to "2.2.2 Connecting the Power".)
- 3 Change the input source to HDMI controlling the JOG button UP/DOWN, when input source is not set.



Connecting and Using a Source Device

Connection Using an DP Cable

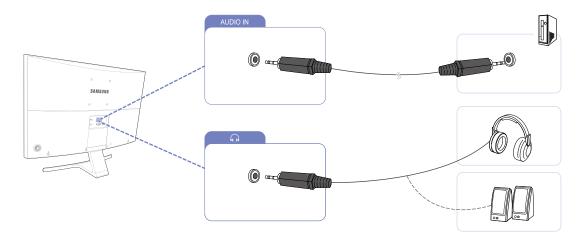
- Do not connect the power cable before connecting all other cables. Ensure you connect a source device first before connecting the power cable.
 - A DP cable shorter under 1.5m in length is recommended. Using a cable longer than 1.5m can affect the picture quality.



- 1 Connect the DP cable to the [DP IN] port on the back of the product and the DP port on the PC.
- 2 Connect the DC power adapter to the product and a power socket. Next, turn on the power switch on the PC. (For details, refer to "2.2.2 Connecting the Power".)
- 3 Change the input source to **DisplayPort** controlling the JOG button UP/DOWN, when input source is not set.

Connecting to Headphones or Speakers

Do not connect the power cable before connecting all other cables. Ensure you connect a source device first before connecting the power cable.



1 Connect an audio output device such as headphones to $[\Omega]$ port on the product.

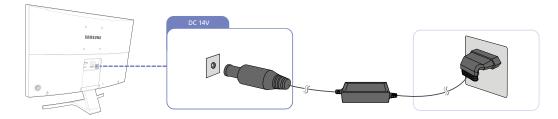


2.2.2 Connecting the Power

- Connecting parts may differ in different products.
 - The exterior may differ depending on the product.

Power connection using integrated DC power adapter

• Connect the DC power adapter to [DC 14V] port on the back of the product and to the power outlet.



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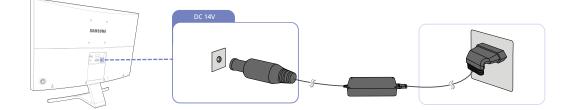
The input voltage is switched automatically.

Power connection using detachable DC power adapter

• Connect the power cable to the DC power adapter.

Then, connect the DC power adapter to the [DC 14V] port on the back of the product.

Next, connect the power cable to the power outlet.





The input voltage is switched automatically.



Connecting and Using a Source Device

Changing the sound settings on Windows

 $\mathsf{Control}\;\mathsf{Panel}\;\to\;\mathsf{Audio}\;\to\;\mathsf{Speaker}\;\to\;\mathsf{Speaker}\;\mathsf{Setup}$

| Remote Desktop Connection | Computer | | | 4 Inter Carea Faul |
|--|----------------------|---|---|--------------------------|
| Microsoft Word 2010 | Control Panel | | st your computer's settings | |
| | Devices and Printers | | Action Center | Verify Legition • |
| Wireless Display Manager | Default Programs | | 10.2557 | Backup and Restore |
| Microsoft Office Excel 2007 | Help and Support | 4 | BitLocker Drive Encryption | Color Management |
| 1 3 | | | Credential Manager | Date and Time |
| All Programs | | | Default Programs | Desktop Gadgets |
| Search programs and files | Shut down • | | Device Manager | eta Devices and Printers |
| 🙈 i 🔉 🔗 o 📫 | | | Display | Ease of Access Center |
| | | | | |
| Sound Playback Recording Sounds Communications | | |] Speaker Setup | |
| Playback Recording Sounds Communications Select a playback device below to modify its set | | | 3) Speaker Setup | |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD HDMI Output AMD HDMI Output AMD HDMI Output AMD HDMI Output AMD HDMI Output | lings: | | Choose your configuration | |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD HDMI Output AMD Plint Derintition Audio Device | lings: | | | |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD HDMI Output AMD HDMI Output AMD High Orfinition Audio Device Default Concent Default Concent Device Concent 20671 SmartAudio HD | lings: | • | Choose your configuration Select the speaker setup below that is the configuration on your computer. Judio channels: Mono Steepe | mostlike |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD HDMI Output AMD HDMI Output AMD High Orfinition Audio Device Default Concent Default Concent Device Concent 20671 SmartAudio HD | lings: | | Choose your configuration lated the genetic setup below that is the configuration on your computer. Nuclear the setup of t | mostlike |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD HDMI Output AMD HDMI Output AMD High Orfinition Audio Device Default Concent Default Concent Device Concent 20671 SmartAudio HD | lings: | | Choose your configuration letter the peaker setup below that is the configuration on your computer. Nanco Quadraphones Summand 3.5 Summand 3.5 Summand 3.5 Summand | mostlike |
| Playback Recording Sounds Communications Select a playback device below to modify its sett AMD High Definition Audio Device Fortunt Cence Speaker Concessint 20671 Smarthutine HB | Ings | | Choose your configuration lated the genetic setup below that is the configuration on your computer. Nuclear the setup of t | mostlike |

- Check the cable connection between the product and PC, and ensure the connectors are locked. (Refer to "2.2 Connecting and Using a PC")
- 2 For a monitor connected via HDMI, set PC/AV Mode to either PC or AV. (Refer to "5.4 PC/AV Mode")



2.2.3 Driver Installation

- You can set the optimum resolution and frequency for this product by installing the corresponding drivers.
 - An installation driver is contained on the CD supplied with the product.
 - If the file provided is faulty, visit the Samsung homepage (http://www.samsung.com/) and download the file.
- 1 Insert the user manual CD provided with the product into the CD-ROM drive.
- 2 Click "Windows Driver".
- 3 Follow the instructions given on the screen to proceed with installation.
- 4 Select your product model from the list of models.

| 1. PADEON | 9550 : Plug o | and Play M | onitor | | | |
|--------------|---------------|------------|-----------|------------|---------|--|
| | Select | the monito | r which y | ou want to | install | |
| Samsung ···· | | | | | | |
| Samsung | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |
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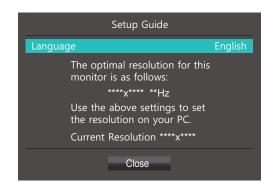
5 Go to Display Properties and check that the resolution and refresh rate are appropriate. Refer to your Windows OS manual for further details.

Connecting and Using a Source Device

2.2.4 Setting Optimum Resolution

An information message about setting optimum resolution will appear if you power on the product for the first time after purchase.

Select a language on the product and change the resolution on your PC to the optimum setting.



- 1 Press the JOG button to display the language settings menu.
- 2 To hide the message, move to Close with the JOG button. Next, press the JOG button.
 - If the optimum resolution is not selected, the message will appear up to three times for a specified time even when the product is turned off and on again.
 - The optimum resolution can also be selected in **Control Panel** on your PC.



Screen Setup

Configure the screen settings such as brightness.

A detailed description of each function is provided. Refer to your product for details.

3.1 SAMSUNG MAGIC Bright

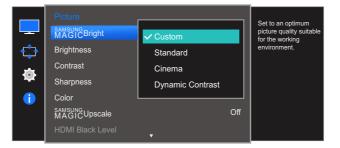
This menu provides an optimum picture quality suitable for the environment where the product will be used.

- This menu is not available when Eco Saving Plus is enabled.
 - This menu is not available when <u>Game Mode</u> is enabled.
 - This menu is not available when Eye Saver Mode is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

You can customize the brightness to suit your preferences.

3.1.1 Configuring SAMSUNG MAGIC Bright

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **MAGICBright** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- Custom: Customize the contrast and brightness as required.
- Standard: Obtain a picture quality suitable for editing documents or using Internet.
- Cinema: Obtain the brightness and sharpness of TVs suitable for enjoying video and DVD content.
- Dynamic Contrast: Obtain balanced brightness through automatic contrast adjustment.

| - | Picture SAMSUNG Brightness Contrast Sharpness | ✓ Dynamic Standard Movie Custom | | Set to an optimum picture quality suitable for the working environment. |
|---|---|--|----|--|
| | Color SAMSUNG MAGICUpscale HDMI Black Level | 0 • | ff | |

When the external input is connected through HDMI or DP and PC/AV Mode is set to AV,

SAMSUNG Bright has four automatic picture settings (Dynamic, Standard, Movie and Custom) that are preset at the factory. You can activate either Dynamic, Standard, Movie or Custom. You can select Custom which automatically recalls your personalized picture settings.

- **Dynamic**: Select this mode to view a sharper image than in **Standard** mode.
- **Standard**: Select this mode when the surroundings are bright. This also provides a sharp image.
- Movie: Select this mode when the surroundings are dark. This will save power and reduce eye fatigue.
- Custom: Select this mode when you want to adjust the image according to your preferences.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

3.2 Brightness

You can adjust the general brightness of the picture. (Range: 0~100)

A higher value will make the picture appear brighter.

- This menu is not available when MAGICBright is set to Dynamic Contrast mode.
 - This menu is not available when **<u>Eco Saving Plus</u>** is enabled.
 - This menu is not available when **Eye Saver Mode** is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.2.1 Configuring Brightness

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Brightness** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| — + | Picture ^{SAMSUNG} Bright Brightness | Custom 100 | Adjust the brightness level. Values closer to 100 mean a brighter screen. |
|---------------|--|------------|--|
| 100 | Contrast | 75 | |
| | Sharpness | 60 | |
| | Color | | |
| | MAGICUpscale | Off | |
| | HDMI Black Level | | |

- 4 Adjust the **Brightness** controlling the JOG button LEFT/RIGHT.
- 5 The selected option will be applied.

3.3 Contrast

Adjust the contrast between the objects and background. (Range: 0~100)

A higher value will increase the contrast to make the object appear clearer.

- This option is not available when MAGICBright is in Cinema or Dynamic Contrast mode.
 - This menu is not available when <u>Game Mode</u> is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.3.1 Configuring Contrast

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to Contrast controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| — ¢ | Picture SAMSUNG MAGICBright Brightness | C | ustom 100 | Adjust the contrast level. Values closer to 100 mean a bigger light/dark contrast. |
|---------------|---|-------|--------------|--|
| Ō | Contrast | | 75 | |
| | Sharpness | | 60 | |
| | Color | | ► | |
| | MAGICUpscale | | Off | |
| | HDMI Black Level | | | |

- 4 Adjust the **Contrast** controlling the JOG button LEFT/RIGHT.
- 5 The selected option will be applied.

3.4 Sharpness

Make the outline of objects more clear or blurry. (Range: 0~100)

A higher value will make the outline of objects clearer.

- This option is not available when MAGICBright is in Cinema or Dynamic Contrast mode.
 - This menu is not available when MAGICUpscale is in Mode1 or Mode2.
 - This menu is not available when <u>Game Mode</u> is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.4.1 Configuring Sharpness

- 1 When the Function Key Guide appears, select [I]] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Sharpness** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| • • • | Picture MAGICBright Brightness Contrast Sharpness | _ | Custom 100 75 60 | Adjust the sharpness of the picture. Values closer to 100 mean a sharper image. |
|-------------|---|---|---------------------------|--|
| 1 | Color SAMSUNG MAGICUpscale HDMI Black Level | | ► Off | |

- 4 Adjust the **Sharpness** controlling the JOG button LEFT/RIGHT.
- 5 The selected option will be applied.

3.5 Color

A detailed description of each function is provided. Refer to your product for details.

Adjust the tint of the screen. This menu is not available when MAGICBright is set to Cinema or Dynamic Contrast mode. This menu is not available when Game Mode or Eye Saver Mode is enabled.



The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.5.1 Configuring Red

Adjust the value of the color red in the picture. (Range: 0~100)

A higher value will increase the intensity of the color.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Color** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Red controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| Picture MAGICBright Brightness Contrast Sharpness Color SAMSUNGUpscale HDMI Black Level | Custon 10 7: 60 0 | | color |
|--|-------------------------------|---|----------------------|
| Color Red Green Blue Color Tone Gamma | 50 50 Norma Mode | Values clo mean grea intensity fo | level. ser to 100 |

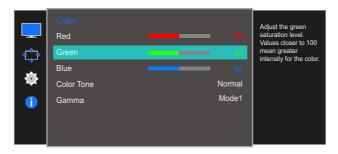
- 5 Adjust the **Red** controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.

3.5.2 Configuring Green

Adjust the value of the color green in the picture. (Range: 0~100)

A higher value will increase the intensity of the color.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Color** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Green controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 5 Adjust the **Green** controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.



3.5.3 Configuring Blue

Adjust the value of the color blue in the picture. (Range: 0~100)

A higher value will increase the intensity of the color.

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Color** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Blue controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 5 Adjust the **Blue** controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.

3.5.4 Configuring the Color Tone Settings

Adjust the general color tone of the picture.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Color** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Color Tone controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- Cool 2: Set the color temperature to be cooler than Cool 1.
- Cool 1: Set the color temperature to be cooler than Normal mode.
- **Normal**: Display the standard color tone.
- Warm 1: Set the color temperature to be warmer than Normal mode.
- Warm 2: Set the color temperature to be warmer than Warm 1.
- **Custom**: Customize the color tone.
- When the external input is connected through HDMI, DP and <u>PC/AV Mode</u> is set to AV, Color Tone has four color temperature settings (Cool, Normal, Warm and Custom).
- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

3.5.5 Configuring Gamma

Adjust the mid-range brightness (Gamma) of the picture.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Color** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Gamma controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | Color Red Green Blue | = | 50 50 50 | Adjust the middle level of luminance. |
|---------|-------------------------------|----------------|----------------|---------------------------------------|
| ∲ () | Color Tone Gamma | ✓ Mode1 | | |
| | | Mode2 Mode3 | | |
| | | | | |

- Mode1
- Mode2
- Mode3
- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

3.6 SAMSUNG MAGIC Upscale

MAGIC Upscale function can enhance the layers of the picture details and the vividness of the picture.

- The function has more obvious effects on low-resolution pictures.
 - This menu is not available when MAGICBright is in Cinema or Dynamic Contrast mode.
 - This menu is not available when <u>Game Mode</u> is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.6.1 Configuring SAMSUNG MAGIC Upscale

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **MAGICUpscale** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | Picture SAMSUNG MAGICBright Brightness Contrast | Custom 100 75 | Enhance picture detail and vividness. |
|---|---|-------------------------|--|
| • | Sharpness Color SAMSUNG MAGICUpscale HDMI Black Level | ✓ Off Mode1 Mode2 | |

Comparing with Mode1, Mode2 has a stronger effect.

- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

3.7 HDMI Black Level

If a DVD player or set-top box is connected to the product via HDMI, image quality degradation (contrast/ color degradation, black level, etc.) may occur, depending on the connected source device. In such case, HDMI Black Level can be used to adjust the image quality. If this is the case, correct the degraded picture quality using HDMI Black Level.

- This function is only available in **HDMI** mode.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.7.1 Configuring the HDMI Black Level Settings

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to HDMI Black Level controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| Picture SAMSUNG Brightness Contrast Sharpness | Custom 100 75 60 | Optimize HDMI picture brightness and contrast by adjusting the black level of the video signal. |
|---|---------------------------|--|
| Color MAGICUpscale HDMI Black Level | Normal | |

- Normal: Select this mode when there is no contrast ratio degradation.
- Low: Select this mode to reduce the black level and increase the white level when there is a contrast ratio degradation.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.
 - **HDMI Black Level** may not be compatible with some source devices.

3

3.8 Eye Saver Mode

Set to an optimum picture quality suitable for eye relaxation.

TÜV Rheinland "Low Blue Light Content" is a certification for products which meet requirements for lower blue light levels. When **Eye Saver Mode** is '**On**', the blue light that wavelength is around 400nm will decrease, and it will provide an optimum picture quality suitable for eye relaxation. At the same time, the blue light level is lower than in the default settings, and it was tested by TÜV Rheinland and certified as it met the requirements of TÜV Rheinland "Low Blue Light Content" standards.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.8.1 Configuring Eye Saver Mode

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Eye Saver Mode** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | Eye Saver Mode | ✔ Off | Set to an optimum picture quality suitable for eye |
|----------|-------------------|-------|--|
| Ċ | Game Mode | On | relaxation. |
| <u> </u> | Response Time | L | -1 |
| • | Picture Size | Wic | le |
| 1 | Screen Adjustment | | ▶ |
| | | | |
| | | | |

- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

3.9 Game Mode

Configure the product screen settings for game mode.

Use this feature when playing games on a PC or when a game console such as PlayStation[™] or Xbox[™] is connected.

- ß
- This menu is not available when **Eye Saver Mode** is enabled.
- The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.9.1 Configuring Game Mode

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Game Mode** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | Picture Eye Saver Mode | • | Optimizes image settings for playing |
|-------------|---------------------------|-----------|---|
| € _+ | Game Mode | ✔ Off | games. |
| | Response Time | On | |
| | Picture Size | Always On | |
| 1 | Screen Adjustment | ► | |
| | | | |
| | | | |

- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.
- Game Mode turns Off when the monitor turns on, power-saving mode activates, or the input source changes.
 - If you want to keep Game Mode enabled all the time, select Always On.

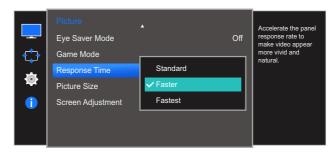
3.10 Response Time

Accelerate the panel response rate to make video appear more vivid and natural.

- It is best to set **Response Time** to **Standard** or **Faster** when you are not viewing a movie.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.10.1 Configuring the Response Time

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Response Time** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

3.11 Picture Size

Change the picture size.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

3.11.1 Changing the Picture Size

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Picture Size** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

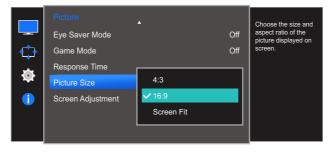
| | Picture Eye Saver Mode Game Mode Response Time Picture Size | Auto | Off Off | Choose the size and aspect ratio of the picture displayed on screen. |
|---|---|--------|------------|---|
| • | Screen Adjustment | ✓ Wide | | |

In PC mode

- Auto: Display the picture according to the aspect ratio of the input source.
- Wide: Display the picture in full screen regardless of the aspect ratio of the input source.



In AV mode



- **4:3**: Display the picture with an aspect ratio of 4:3. Suitable for videos and standard broadcasts.
- **16:9**: Display the picture with an aspect ratio of 16:9.
- Screen Fit: Display the picture with the original aspect ratio without cutting off.
 - Changing the screen size is available when the following conditions are satisfied.
 - The function may not be supported depending on the ports provided with the product.
 - A digital output device is connected using the HDMI cable.
 - A digital output device is connected using the DP cable.
 - The input signal is 480p, 576p, 720p, or 1080p and monitor can display normally (Not every model can support all of these signals.).
 - This can only be set when the external input is connected through HDMI, DP and <u>PC/AV Mode</u> is set to AV.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.



3.12.1 Configuring H-Position & V-Position

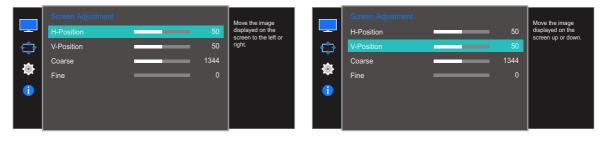
H-Position: Move the screen to the left or right.

V-Position: Move the screen up or down.

- This menu is available in **Analog** mode only.
 - This menu is only available when Image Size is set to Screen Fit in AV Mode. When a 480P or 576P or 720P or 1080P signal is input in AV mode and the monitor can display normally, select Screen Fit to adjust horizontal position in 0-6 levels.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.
- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Screen Adjustment** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to the H-Position or V-Position controlling the JOG button UP/DOWN and press the JOG button.

The following screen will appear.





- 5 Adjust the H-Position or V-Position controlling the JOG button LEFT/RIGHT and press the JOG button.
- 6 The selected option will be applied.

3.12.2 Adjusting Coarse

Adjust the screen frequency.

- This menu is available in Analog mode only.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.
- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to Screen Adjustment controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Coarse controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | Screen Adjustment | | Adjust the screen |
|----------|-------------------|------|-------------------|
| | H-Position | 50 | frequency. |
| C | V-Position | 50 | |
| • | Coarse | 1344 | |
| P | Fine | | |
| 1 | | | |
| | | | |
| | | | |

- 5 Adjust the Coarse controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.

3.12.3 Adjusting Fine

Fine-adjust the screen to obtain a vivid picture.

- This menu is available in **Analog** mode only.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.
- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **Picture** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Screen Adjustment** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to **Fine** controlling the JOG button UP/DOWN and press the JOG button.

The following screen will appear.

| | Screen Adjustment | | Fine-tune the screen |
|----------|-------------------|----------|-------------------------|
| | H-Position | 50 | to get a vivid picture. |
| (1) | V-Position | 50 | |
| . | Coarse | 1344 | |
| 1 | Fine | 0 | |
| | | | |
| | | | |
| | | | |

- 5 Adjust the **Fine** controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.

Coordinating OSD

A detailed description of each function is provided. Refer to your product for details.

4.1 Transparency

Set the transparency for the menu windows.

4.1.1 Changing Transparency

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **OnScreen Display** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Transparency** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.



4.2 Position

H-Position: Move the menu position to the left or right.

V-Position: Move the menu position up or down.

4.2.1 Configuring H-Position & V-Position

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **OnScreen Display** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Position** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to the H-Position or V-Position controlling the JOG button UP/DOWN and press the JOG button.

The following screen will appear.





- 5 Adjust the **H-Position** or **V-Position** controlling the JOG button LEFT/RIGHT and press the JOG button.
- 6 The selected option will be applied.

4.3 Language

Set the menu language.

- A change to the language setting will only be applied to the onscreen menu display.
 - It will not be applied to other functions on your PC.

4.3.1 Configuring Language

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **OnScreen Display** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to Language controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| OnScreen Display Transparency Or | | Set the menu language. |
|--------------------------------------|---|---------------------------|
| Position Language Display Time | Deutsch Carlos Español Français Italiano | |

- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

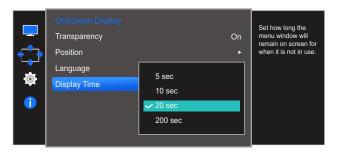
4.4 Display Time

Set the on-screen display (OSD) menu to automatically disappear if the menu is not used for a specified period of time.

Display Time can be used to specify the time after which you want the OSD menu to disappear.

4.4.1 Configuring Display Time

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **OnScreen Display** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Display Time** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

Setup and Reset

A detailed description of each function is provided. Refer to your product for details.

5.1 Sound

Select a **Sound** mode suitable for the environment where the product will be used.

5.1.1 Configuring Volume

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Sound** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Volume controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | • | |
|---|-------------|--|
| | Off | |
| | • | |
| | • | |
| | Auto | |
| A | cceleration | |
| _ | Stand-by | |
| | ŗ | Off • Auto Acceleration Stand-by |

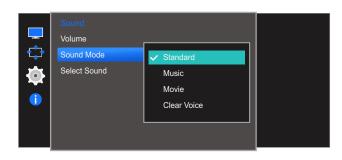


- 5 Move the JOG button LEFT/RIGHT to adjust the Volume.
- 6 The selected option will be applied.

5.1.2 Configuring Sound Mode

This menu is not available when the earphone is connected to the monitor.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Sound** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Sound Mode controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

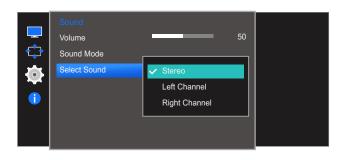


- **Standard**: Selects the normal sound mode.
- **Music**: Emphasizes music over voices.
- **Movie**: Provides the best sound for movies.
- Clear Voice: Emphasizes voices over other sounds.
- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

5.1.3 Configuring Select Sound

This menu is not available when the earphone is connected to the monitor.

- 1 When the Function Key Guide appears, select [III] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Sound** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Select Sound controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



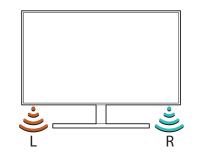
- **Stereo**: Enable the sound both from the left and right speakers.
- Left Channel: Set the left and right speakers to play only the left channel of the sound source.
- **Right Channel**: Set the left and right speakers to play only the right channel of the sound source.
- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

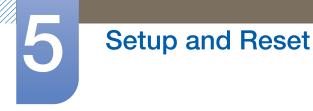


If using a single monitor

1 Go to the select sound mode menu and select Stereo.



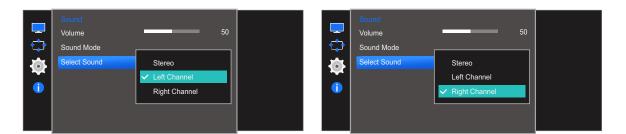


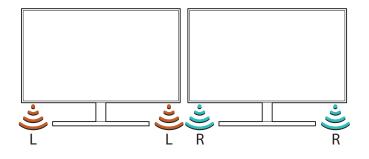


If using two monitors

- Check the cable connection between the product and PC, and ensure the connectors are locked. (Refer to "2.2 Connecting and Using a PC")
- When the monitor is connected to the PC through HDMI, set PC/AV Mode to DVI PC. (Refer to "5.4 PC/AV Mode")
- 3 Connect an earphone distributor to the [AUDIO OUT] port on your PC, then use a stereo cable to connect the earphone distributor to the [AUDIO IN] port on the monitor.
- 4 Go to the select sound mode menu.

Select Left Channel for the monitor on your left. Select Right Channel for the monitor on your right.

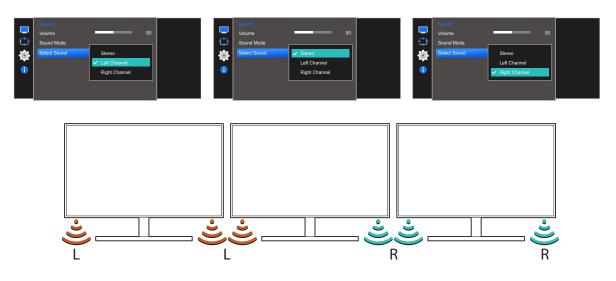




If using three monitors or more

1 Go to the select sound mode menu.

Select Left Channel for the monitor on your left. Select Stereo for the monitor in the middle. Select Right Channel for the monitor on your right.





To use multiple monitors, connect the monitors to your PC via HDMI or D-sub cables. ("2.2 Connecting and Using a PC")

5.2 Eco Saving Plus

The **Eco Saving Plus** function reduces power consumption by controlling the electric current used by the monitor panel.

- This menu is not available when MAGICBright is in Dynamic Contrast mode.
 - This menu is not available when Game Mode is enabled.
 - This menu is not available when Eye Saver Mode is enabled.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.2.1 Configuring Eco Saving Plus

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Eco Saving Plus** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- Off: Deactivate the Eco Saving Plus function.
- Auto: The power consumption will automatically be reduced by about 10% over the current setting.

(The reduction of power consumption depends on the customer screen brightness condition.)

- Low: The power consumption will be reduced by 25% over the default setting.
- High: The power consumption will be reduced by 50% over the default setting.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

5.3 Off Timer

K

You can set the product to automatically turn off.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.3.1 Configuring Off Timer

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Off Timer** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Off Timer controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| ■ | System Sound Eco Saving Plus Off Timer PC/AV Mode Source Detection Key Repeat Time Power LED On |) Off) Auto Acceleration Stand-by | Enable or disable the Off Timer. |
|---|--|---|-------------------------------------|
| | Off Timer Off Timer Turn Off After | ✓ Off On | Enable or disable the Off Timer. |

- Off: Deactivate the off timer so that the product does not power off automatically.
- On: Activate the off timer so that the product powers off automatically.
- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

5.3.2 Configuring Turn Off After

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Off Timer** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to Turn Off After controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- 5 Adjust the Turn Off After controlling the JOG button LEFT/RIGHT.
- 6 The selected option will be applied.
- The off timer can be set within a range of 1 to 23 hours. The product will automatically power off after the specified number of hours.
 - This option is only available when Off Timer is set to On.
 - For products for the market in some regions, the Off Timer is set to automatically activate 4 hours after the product powers on. This is done in accordance with power supply regulations. If you do not want the timer to activate, go to MENU → System and set Off Timer to Off.

5.4 PC/AV Mode

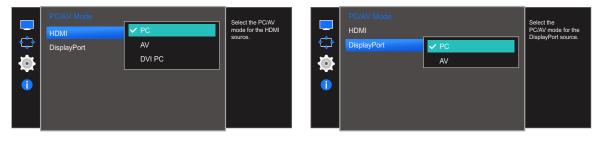
Set **PC/AV Mode** to **AV**. The picture size will be enlarged. This option is useful when you view a movie.

- This function does not support **Analog** mode.
 - Supplied for the wide models only such as 16:9 or 16:10.
 - If the monitor (when set to HDMI or DisplayPort) is in power saving mode or is displaying the message Check Signal Cable, press the MENU button to display the On Screen Display(OSD). You can select PC or AV.
 - The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.4.1 Configuring PC/AV Mode

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **PC/AV Mode** controlling the JOG button UP/DOWN and press the JOG button.
- 4 Move to the HDMI or Display Port controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.





- 5 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 6 The selected option will be applied.

5.5 Source Detection

You can activate Source Detection.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.5.1 Configuring Source Detection

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to Source Detection controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| ■ | System Sound Eco Saving Plus Off Timer | ► Off ► | Decide how input sources will be detected. |
|---|---|----------------|--|
| • | PC/AV Mode Source Detection Key Repeat Time Power LED On | Auto Manual | |

- Auto: The input source is automatically recognized.
- Manual: Manually select an input source.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

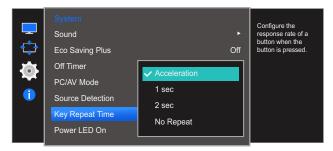
5.6 Key Repeat Time

Control the response rate of a button when the button is pressed.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.6.1 Configuring Key Repeat Time

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Key Repeat Time** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.



- Acceleration, 1 sec, or 2 sec can be selected. If No Repeat is selected, a command responds only once when a button is pressed.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

5.7 Power LED On

Configure the settings to enable or disable the power LED located at the lower part of the product.

5.7.1 Configuring Power LED On

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Power LED On** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| System Sound | | Set the status of the power LED. |
|------------------|--|-------------------------------------|
| Eco Saving Plus | Off | |
| Off Timer | | |
| PC/AV Mode | | |
| Source Detection | | |
| Key Repeat Time | | |
| Power LED On | ✓ Stand-by | |
| | Sound Eco Saving Plus Off Timer PC/AV Mode Source Detection Key Repeat Time | Sound |

- Working: The power LED is on when the product is turned on.
- Stand-by: The power LED is on when the product is turned off.
- 4 Move to the desired option controlling the JOG button UP/DOWN and press the JOG button.
- 5 The selected option will be applied.

5.8 Reset All

Return all the settings for the product to the default factory settings.

The functions available on the monitor may vary depending on the model. Refer to the actual product.

5.8.1 Initializing Settings (Reset All)

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to **System** controlling the JOG button UP/DOWN and press the JOG button.
- 3 Move to **Reset All** controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.

| | /stem | | Return all the settings for the product to the default factory settings. |
|--|-------|---|---|
| | | All the menu settings will be reset to default. Are you sure you want to reset? Yes No | |

- 4 Move to the desired option controlling the JOG button LEFT/RIGHT and press the JOG button.
- 5 The selected option will be applied.



A detailed description of each function is provided. Refer to your product for details.

6.1 Information

View the current input source, frequency and resolution.

6.1.1 Displaying Information

- 1 When the Function Key Guide appears, select [m] by moving the JOG button UP. Next, press the JOG button.
- 2 Move to Information controlling the JOG button UP/DOWN and press the JOG button. The following screen will appear.





The displayed menu items may vary depending on the model.

6.2 Configuring Brightness, Contrast and Sharpness from the Initial Screen

Adjust the Brightness, Contrast and Sharpness by moving the JOG button.

Brightness :

- This menu is not available when MAGICBright is set to Dynamic Contrast mode.
- This menu is not available when <u>Eco Saving Plus</u> is enabled.
- This menu is not available when **Eye Saver Mode** is enabled.

Contrast :

- This option is not available when **SAMSUNG**Bright is in Cinema or Dynamic Contrast mode.
- This menu is not available when <u>Game Mode</u> is enabled.

Sharpness :

- This option is not available when **MAGIC**Bright is in Cinema or Dynamic Contrast mode.
- This menu is not available when Game Mode or MAGIC Upscale is enabled.
- 1 When you control the JOG button UP, the following screen will appear.

| Sharpness | |
|--------------------------------|-----|
| Brightness 🔺 | 100 |
| ✓ Contrast | |

- 2 Move to **Brightness** \rightarrow **Contrast** \rightarrow **Sharpness** controlling the JOG button UP/DOWN.
- 3 Move the JOG button LEFT/RIGHT to adjust the Brightness, Contrast or Sharpness setting.

6.3 Configuring Volume in the Initial Screen

6.3.1 Volume

K

Adjust the Volume by moving the JOG button.

1 When you control the JOG button LEFT/RIGHT, the following screen will appear.



2 Move the JOG button LEFT/RIGHT to adjust the Volume.

Move the JOG button down to enable Mute. The following screen will appear on the product.



Mute is disabled when you adjust the monitor volume by moving the JOG button left or right.

Mute can also be disabled when the monitor turns on or power-saving mode activates.

If the audio quality of a connected input device is poor, the Auto Mute function on the product may mute the sound or cause choppy audio when applying the headphones.
 Set the input volume for the input device to at least 20% and control the volume using the volume control (JOG button LEFT/RIGHT) on the product.

What is Auto Mute?

The function mutes the audio to improve sound effect when there is sound noise or when the input signal is weak, usually due to a problem with the volume of an input device.

7.1 Easy Setting Box



"Easy Setting Box" enables users to use the monitor by partitioning multiple sections.

7.1.1 Installing the Software

- 1 Insert the installation CD into the CD-ROM drive.
- 2 Select the "Easy Setting Box" setup program.
 - If the pop-up screen for the software installation does not appear on the main screen, find and double-click the "Easy Setting Box" setup file on the CD-ROM.
- 3 When the Installation Wizard appears, click Next.
- 4 Follow the instructions given on the screen to proceed with installation.
 - The software may not work properly if you do not restart the computer after the installation.
 - The "Easy Setting Box" icon may not appear depending on the computer system and the product specifications.
 - If the shortcut icon does not appear, press the F5 key.

Restrictions and Problems with the Installation ("Easy Setting Box")

The "Easy Setting Box" installation may be affected by the Graphics Card, Motherboard and the Networking Environment.

System Requirements

OS

- Windows XP 32Bit/64Bit
- Windows Vista 32Bit/64Bit
- Windows 7 32Bit/64Bit
- Windows 8 32Bit/64Bit

Hardware

- At least 32MB of memory
- At least 60MB of free space on the hard disk drive



7.1.2 Removing the Software

Click Start, select Settings/Control Panel, and then double-click Add or Remove Programs.

Select "Easy Setting Box" from the program list and click the Add/Delete button.

8.1 Requirements Before Contacting Samsung Customer Service Center

8.1.1 Testing the Product



Before calling Samsung Customer Service Center, test your product as follows. If the problem persists, contact Samsung Customer Service Center.

Check if your product is operating normally by using the product test function.

If the screen is turned off and the power indicator blinks even though the product is properly connected to a PC, perform a self-diagnosis test.

- 1 Power off both the PC and product.
- 2 Disconnect the cables from the product.
- 3 Power on the product.
- 4 If the message **Check Signal Cable** appears, the product is working normally.



If the screen remains blank, check the PC system, video controller and cable.

8.1.2 Checking the Resolution and Frequency

For a mode that exceeds the supported resolution (refer to "9.3 Standard Signal Mode Table"), the message **Not Optimum Mode** will appear for a short time.

8.1.3 Check the following.

Installation issue (PC mode)

| Issues | Solutions |
|--|---|
| The screen keeps switching on and off. | Check the cable connection between the product and PC, and ensure the connectors are locked. (Refer to "2.2 Connecting and Using a PC") |



Troubleshooting Guide

Screen issue

| Issues | Solutions | |
|--|---|--|
| The power LED is off. The screen will not switch on. | Check that the power cable is connected properly. (Refer to "2.2 Connecting and Using a PC") | |
| The message Check Signal Cable appears. | Check that the cable is properly connected to the product. (Refer to "2.2 Connecting and Using a PC") | |
| | Check that the device connected to the product is powered on. | |
| Not Optimum Mode is displayed. | This message appears when the signal from the graphics card exceeds the maximum resolution or frequency for the product. | |
| | Change the maximum resolution and frequency to suit the product performance, referring to Standard Signal Mode Table (page 86). | |
| The images on the screen look distorted. | Check the cable connection to the product (Refer to "2.2 Connecting and Using a PC") | |
| The screen is not clear. The screen is blurry. | Adjust Coarse (page 53) and Fine (page 54). | |
| | Remove any accessories (video extension cable, etc.) and try again. | |
| | Set the resolution and frequency to the recommended level. | |
| The screen appears unstable and shaky. There are shadows or ghost images left on the screen. | Check that the resolution and frequency for the PC are within the range of resolution and frequency compatible with the product. Next, if required, change the settings, referring to Standard Signal Mode Table (page 86) in this manual and the Information menu on the product. | |
| The screen is too bright. The screen is too dark. | Adjust Brightness (page 37) and Contrast (page 38). | |
| Screen color is inconsistent. | Change the Color settings. (Refer to "3.5 Color") | |
| The colors on the screen have a shadow and are distorted. | Change the Color settings. (Refer to "3.5 Color") | |
| White does not really look white. | Change the Color settings. (Refer to "3.5 Color") | |



| Issues | Solutions |
|--|---|
| There is no image on the screen and the power LED blinks every 0.5 to 1 second. | The product is operating in power-saving mode. |
| | Press any key on the keyboard or move the mouse to return to normal operating mode. |

Sound issue

| Issues | Solutions | |
|-----------------------------------|---|--|
| There is no sound. | Check the connection of the audio cable or adjust the volume. | |
| | Check the volume. | |
| The volume is too low. | Adjust the volume. | |
| | If the volume is still low after turning it up to the maximum level, adjust the volume on your PC sound card or software program. | |
| Sound cannot be played in stereo. | Check that the correct sound mode (page 60) is selected. | |

Source device issue

| Issues | Solutions |
|---|---|
| A beeping sound is heard when my PC is booting. | If a beeping sound is heard when your PC is booting, have your PC serviced. |

The LED lights on the frame of the product may be seen depending on the user's viewing angle.

The light is harmless to people and has no bearing on product features and performance. The product is safe to use.

8.2 Q & A

| Question | Answer | | |
|---------------------------------|--|--|--|
| How can I change the frequency? | Set the frequency on your graphics card. Windows XP: Go to Control Panel → Appearance and Themes → Display → Settings → Advanced → Monitor, and adjust Refresh rate under Monitor settings. | | |
| | Windows ME/2000: Go to Control Panel → Display → Settings → Advanced → Monitor, and adjust Refresh rate under Monitor settings. | | |
| | Windows Vista: Go to Control Panel → Appearance and Personalization → Personalization → Display Settings → Advanced Settings → Monitor, and adjust Refresh rate under Monitor settings. | | |
| | Windows 7: Go to Control Panel → Appearance and Personalization → Display → Screen Resolution → Advanced settings → Monitor, and adjust Refresh rate under Monitor settings. | | |
| | Windows 8: Go to Settings → Control Panel → Appearance and Personalization → Display → Screen Resolution → Advanced settings → Monitor, and adjust Refresh rate under Monitor settings. | | |
| | Windows 10: Go to Settings → System → Display → Advanced display settings → Display adapter properties → Monitor, and adjust Screen refresh rate under Monitor settings. | | |

Troubleshooting Guide

| Question | Answer | | |
|----------------------------------|--|--|--|
| How can I change the resolution? | Windows XP: Go to Control Panel → Appearance and Themes → Display → Settings, and adjust the resolution. | | |
| | Windows ME/2000: Go to Control Panel → Display → Settings, and adjust the resolution. | | |
| | Windows Vista: Go to Control Panel → Appearance and Personalization → Personalize → Display Settings, and adjust the resolution. | | |
| | Windows 7: Go to Control Panel → Appearance and Personalization → Display → Adjust Resolution, and adjust the resolution. | | |
| | • Windows 8: Go to Settings → Control Panel → Appearance and Personalization → Display → Adjust Resolution, and adjust the resolution. | | |
| | Windows 10: Go to Settings → System → Display → Advanced display settings, and adjust the resolution. | | |
| How do I set power-saving mode? | Windows XP: Set power-saving mode in Control Panel → Appearance and Themes → Display → Screen Saver Settings → Power options or BIOS SETUP on the PC. | | |
| | Windows ME/2000: Set power-saving mode in Control Panel → Display → Screen Saver Settings → Power options or BIOS SETUP on the PC. | | |
| | Windows Vista: Set power-saving mode in Control Panel → Appearance and Personalization → Personalize → Screen Saver Settings → Power options or BIOS SETUP on the PC. | | |
| | Windows 7: Set power-saving mode in Control Panel → Appearance and Personalization → Personalize → Screen Saver Settings → Power options or BIOS SETUP on the PC. | | |
| | Windows 8: Set power-saving mode in Settings → Control Panel → Appearance and Personalization → Personalize → Screen Saver Settings → Power options or BIOS SETUP on the PC. | | |
| | Windows 10: Set power-saving mode in Settings → Personalization → Lock screen → Screen timeout settings → Power & sleep or BIOS SETUP on the PC. | | |



Refer to the user manual for your PC or graphics card for further instructions on adjustment.

9.1 General

| Model Name | | S27E591C | |
|-----------------------|---------------|--|--|
| Panel | Size | 27 Inches (68 cm) | |
| | Display area | 597.888 mm (H) x 336.312 mm (V) | |
| | | 23.539 Inches (H) x 13.241 Inches (V) | |
| | Pixel Pitch | 0.3114 mm (H) x 0.3114 mm (V) | |
| | | 0.01226 Inches (H) x 0.01226 Inches (V) | |
| Power Supply | | AC 100 - 240 V – (+/- 10%), 50/60 Hz ± 3 Hz | |
| | | Refer to the label at the back of the product as the standard voltage can vary in different countries. | |
| Dimensions | Without Stand | 623.2 x 365.7 x 59.9 mm | |
| (W x H x D) / Weight | | 24.5 x 14.4 x 2.4 Inches | |
| | With Stand | 623.2 x 463.0 x 181.6 mm / 5.65 kg | |
| | | 24.5 x 18.2 x 7.1 Inches / 12.5 lbs | |
| VESA Mounting Interfa | ace | 100 x 100 mm | |
| | | 3.9 x 3.9 Inches | |
| | | (For use with Specialty(Arm) Mounting hardware.) | |
| Environmental | Operating | Temperature : 50°F – 104°F (10°C – 40°C) | |
| considerations | | Humidity : 10% – 80%, non-condensing | |
| | Storage | Temperature : -4°F – 113°F (-20°C – 45°C) | |
| | | Humidity : 5% – 95%, non-condensing | |

👩 Plug-and-Play

This monitor can be installed and used with any Plug-and-Play compatible systems. Two-way data exchange between the monitor and PC system optimizes the monitor settings. Monitor installation takes place automatically. However, you can customize the installation settings if desired.

Panel Dots (Pixels)

Due to the nature of the manufacturing of this product, approximately 1 pixel per million (1ppm) may be brighter or darker on the LCD panel. This does not affect product performance.



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The above specifications are subject to change without notice to improve quality.

This device is a Class B digital apparatus.



(USA only)

9

Dispose unwanted electronics through an approved recycler.

To find the nearest recycling location, go to our website:

www.samsung.com/recyclingdirect or call, (877) 278 - 0799

9.2 PowerSaver

The power-saving function of this product reduces power consumption by switching off the screen and changing the color of the power LED if the product is not used for a specified period of time. The power is not turned off in power-saving mode. To switch the screen back on, press any key on the keyboard or move the mouse. Power-saving mode functions only when the product is connected to a PC that has a power-saving function.

| PowerSaver | Energy Star Test Condition | Power saving mode | Power off (Power button) |
|-------------------|-------------------------------|-------------------|-----------------------------|
| Power Indicator | Off | Blinking | On |
| Power Consumption | 24 W | Typical 0.3 W | Less than 0.3 W |

ß

The displayed power consumption level can vary in different operating conditions or when settings are changed.

• ENERGY STAR[®] is a US registered mark of the United States Environmental Protection Agency. Energy Star power is measured with the test method in the current Energy Star[®] Standard.

• To reduce the power consumption to 0, disconnect the power cord. Disconnect the power cable if you will not be using the product for an extended period of time (during vacation, etc.)

9.3 Standard Signal Mode Table

- This product can be set to only one resolution for each screen size to obtain the optimum picture quality due to the nature of the panel. Therefore, a resolution other than the specified resolution may degrade the picture quality. To avoid this, it is recommended that you select the optimum resolution specified for the screen size of your product.
 - Check the frequency when you exchange a CDT monitor (connected to a PC) for an LCD monitor. If the LCD monitor does not support 85 Hz, change the vertical frequency to 60 Hz using the CDT monitor before you exchange it with the LCD monitor.

| Synchronization | Horizontal Frequency 30 – 81 kHz | |
|-----------------|----------------------------------|---------------------|
| | Vertical Frequency | 56 – 72 Hz |
| Resolution | Optimum Resolution | 1920 x 1080 @ 60 Hz |
| | Maximum Resolution | 1920 x 1080 @ 60 Hz |

If a signal that belongs to the following standard signal modes is transmitted from your PC, the screen will automatically be adjusted. If the signal transmitted from the PC does not belong to the standard signal modes, the screen may be blank even though the power LED turns on. In such a case, change the settings according to the following table by referring to the graphics card user manual.

| Resolution | Horizontal Frequency (kHz) | Vertical Frequency (Hz) | Pixel Clock (MHz) | Sync Polarity (H/V) |
|-----------------------|----------------------------------|-------------------------------|----------------------|------------------------|
| IBM, 720 x 400 | 31.469 | 70.087 | 28.322 | -/+ |
| MAC, 640 x 480 | 35.000 | 66.667 | 30.240 | -/- |
| VESA, 640 x 480 | 31.469 | 59.940 | 25.175 | -/- |
| VESA, 800 x 600 | 35.156 | 56.250 | 36.000 | +/+ |
| VESA, 800 x 600 | 37.879 | 60.317 | 40.000 | +/+ |
| VESA, 1024 x 768 | 48.363 | 60.004 | 65.000 | -/- |
| VESA, 1024 x 768 | 56.476 | 70.069 | 75.000 | -/- |
| VESA, 1280 x 720 | 45.000 | 60.000 | 74.250 | +/+ |
| VESA, 1280 x 800 | 49.702 | 59.810 | 83.500 | -/+ |
| VESA, 1280 x 1024 | 63.981 | 60.020 | 108.000 | +/+ |
| VESA, 1440 x 900 | 55.935 | 59.887 | 106.500 | -/+ |
| VESA, 1600 x 900 (RB) | 60.000 | 60.000 | 108.000 | +/+ |
| VESA, 1680 x 1050 | 65.290 | 59.954 | 146.250 | -/+ |
| VESA, 1920 x 1080 | 67.500 | 60.000 | 148.500 | +/+ |



Specifications

Horizontal Frequency

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The time required to scan a single line from the left to the right side of the screen is called a horizontal cycle. The reciprocal number of a horizontal cycle is called horizontal frequency. Horizontal frequency is measured in kHz.

• Vertical Frequency

Repeating the same picture dozens of times per second allows you to view natural pictures. The repeat frequency is called "vertical frequency" or "refresh rate" and is indicated in Hz.

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| COLOMBIA | Bogotá 600 12 72 Gratis desde cualquier parte del país 01 8000 112 112 ó desde su celular #SAM(726) | http://www.samsung.com/co/ support |
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| TURKEY | 444 77 11 | http://www.samsung.com/tr/ support |
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Appendix

Responsibility for the Pay Service (Cost to Customers)



When the service is requested, in spite of in warranty, we may charge you for a visit from a service technician in the following cases.

Not a product defect

Cleaning of the product, Adjustment, Explanation, Re-installation and etc.

- If a service technician gives instructions on how to use product or simply adjusts options without disassembling product.
- If a defect is caused by external environmental factors. (Internet, Antenna, Wired Signal, etc.)
- If a product is reinstalled or devices are connected additionally after installing the purchased product for the first time.
- If a product is reinstalled to move to a different spot or to move to a different house.
- If customer requests instructions on how to use because of another company's product.
- If customer requests instructions on how to use the network or another company's program.
- If customer requests software installation and setup for the product.
- If a service technician removes/cleans dusts or foreign materials inside of the product.
- If customer requests an installation additionally after purchasing a product through home-shopping or online.

A Product damage caused by customer's fault

Product damage caused by customer's mishandling or wrong repair

If a product damage is caused by;

- external impact or drop.
- use of supplies or separately sold product unspecified by Samsung.
- repair from a person besides an engineer of outsourcing service company or partner of Samsung Electronics Co., Ltd.
- remodeling or repairing the product by customer.
- using it with incorrect voltage or non-authorised electrical connections.
- not following the "cautions" in User Manual.

Others

- If product fails by natural disaster. (lightning, fire, earthquake, flood damage, etc)
- If consumable components are all used up. (Battery, Toner, Fluorescent lights, Head, Vibrator, Lamp, Filter, Ribbon, etc.)



If customer requests a service in case the product has no defect, service fee may be charged. So please read User Manual first.

Correct Disposal

Correct Disposal of This Product (Waste Electrical & Electronic Equipment)



(Applicable in countries with separate collection systems)

This marking on the product, accessories or literature indicates that the product and its electronic accessories (e.g. charger, headset, USB cable) should not be disposed of with other household waste at the end of their working life. To prevent possible harm to the environment or human health from uncontrolled waste disposal, please separate these items from other types of waste and recycle them responsibly to promote the sustainable reuse of material resources.

Household users should contact either the retailer where they purchased this product, or their local government office, for details of where and how they can take these items for environmentally safe recycling.

Business users should contact their supplier and check the terms and conditions of the purchase contract. This product and its electronic accessories should not be mixed with other commercial wastes for disposal.

Terminology

OSD (On Screen Display)

On screen display (OSD) allows you to customize on-screen settings to optimize the picture quality as required. You can change the screen brightness, tint, size and many other settings using menus displayed on the screen.

Gamma

The Gamma menu adjusts the grey scale that represents middle tones on the screen. Adjusting the brightness brightens the whole screen, but adjusting Gamma only brightens the medium brightness.

Grey scale

Scale refers to levels of color intensity that show variations of color change from darker areas to brighter areas on the screen. Changes to the screen brightness are expressed with black and white variation, and grey scale refers to the medium area between black and white. Changing the grey scale through Gamma adjustment will change the medium brightness on the screen.

Scanning rate

Scanning rate, or refresh rate, refers to the frequency of screen refreshes. Screen data is transmitted as it refreshes to display an image, although the refreshing is invisible to the naked eye. The number of screen refreshes is called scanning rate and is measured in Hz. A scanning rate of 60 Hz means that the screen refreshes 60 times per second. The screen scanning rate depends on the performance of the graphics cards in your PC and monitor.

Horizontal Frequency

Characters or images displayed on the monitor screen consist of numerous dots (pixels). Pixels are transmitted in horizontal lines, which are then arranged vertically to create an image. The horizontal frequency is measured in kHz and represents how many times horizontal lines per second are transmitted and displayed on the monitor screen. A horizontal frequency of 85 means that the horizontal lines that make up an image are transmitted 85000 times per second. The horizontal frequency is indicated in 85 kHz.

Vertical Frequency

One image is made of numerous horizontal lines. The vertical frequency is measured in Hz and represents how many images can be created per second by those horizontal lines. A vertical frequency of 60 means that an image is transmitted 60 times per second. The vertical frequency is also called "refresh rate" and affects screen flicker.

Appendix

Resolution

Resolution is the number of horizontal pixels and vertical pixels that form a screen. It represents the level of display detail.

A higher resolution displays a greater amount of information on the screen and is suitable for performing multiple tasks at the same time.

E.g. A resolution of 1920 x 1080 consists of 1920 horizontal pixels (horizontal resolution) and 1080 vertical lines (vertical resolution).

E.g. A resolution of 1920 x 1200 consists of 1920 horizontal pixels (horizontal resolution) and 1,200 vertical lines (vertical resolution).

Plug & Play

The Plug & Play feature allows the automatic exchange of information between a monitor and PC to produce an optimum display environment.

The monitor uses VESA DDC (international standard) to execute Plug & Play.

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