



Colour Television

OWNER'S MANUAL

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

Record model number and serial number of the set. See the label attached on the back cover and quote this information to your dealer when you require service.

Model number : _____
Serial number : _____

P/NO : 3828VA0025A (MC41B, 210A/210J/230A TX)



Installation

Power

This TV should be operated in the range of the voltage indicated on the label at the back of the set. Never apply DC power to the set.

Warning

To prevent fire or shock hazard, do not expose the TV to rain or moisture.

Location

Select an area where sunlight or bright artificial light will not shine directly on the screen. For the best results, view in subdued lighting. Care should be taken not to expose the TV to any unnecessary vibration, moisture, dust or heat. Also ensure that the TV is placed in a position to allow a free flow of air through the ventilation holes in the back cover of the set.

Service

Never remove the back cover of the TV as this can expose you to very high voltage and other hazards.

If the TV does not operate properly, unplug it and call your dealer.

Aerial

Connect the aerial to the 75Ω socket on the back of the TV.

If the picture quality is not satisfactory, we advise you to use an outdoor aerial.

Battery

The remote control unit is powered by two AA type batteries. Fully open the cover of the remote control unit so that the battery compartment can be seen. Ensure that the batteries are inserted with correct polarity.



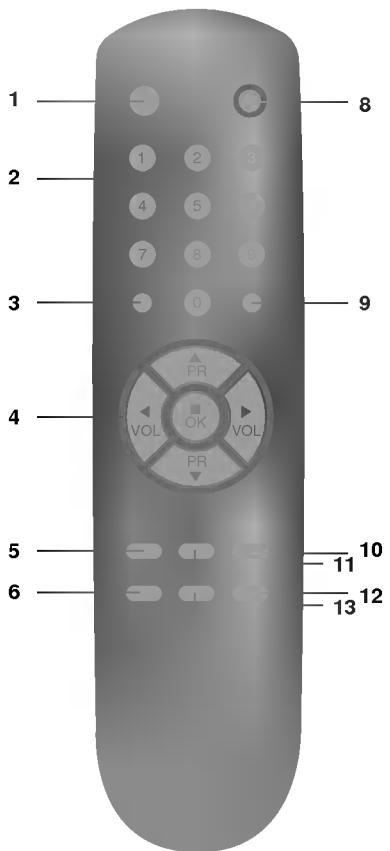
Note : To avoid damage from possible battery leakage, remove the batteries when you will not be using the remote control unit for a fairly long time.

Location and function of the controls

Remote Control Unit

The TV is designed so that all of its functions can be controlled by the REMOTE CONTROL unit. Some functions can be also set with the controls on the FRONT PANEL of the TV.

Before attempting to operate your remote control unit, install the batteries.



1. POWER

To switch the TV to standby mode.

2. NUMBERS

To select program numbers.

3. UNIT

To set either one or double figure.

4. PROGRAM-MENU UP/DOWN

To select the next higher/lower program number or menu item.

VOLUME-MENU UP/DOWN

To control the level of the sound or change the setting of a menu item.

OK

Store the setting of menu items.

5. TV/AV

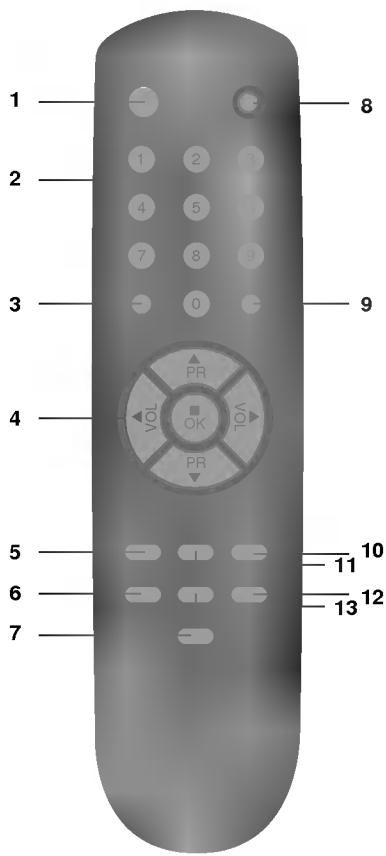
To select TV or audio/video mode.

6. SLEEP

To set the time the TV turned off automatically.

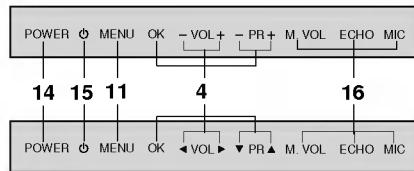
Location and function of the controls

Remote Control Unit



Front Panel

Shown is a simplified representation of front panel.



7. P. STEREO (OPTION)

To get a pseudo stereo sound effect.

8. MUTE

To interrupt temporarily and restore the sound.

9. RECALL

To check the current time and channel.

10. PSM

To call up the picture level settings.

11. MENU

To select the menu pages.

12. PICTURE

To adjust the picture settings.

13. Q. VIEW

To display a channel shown right before quickly.

14. MAIN POWER (POWER/φ)

To switch the TV on and off.

15. POWER/STANDBY INDICATOR

Lights when the TV is turned on or in standby mode.

16. OPTION : For the model with the karaoke function, use three controls below;

MICROPHONE VOLUME KNOB

To adjust the microphone volume level.

ECHO ON/OFF

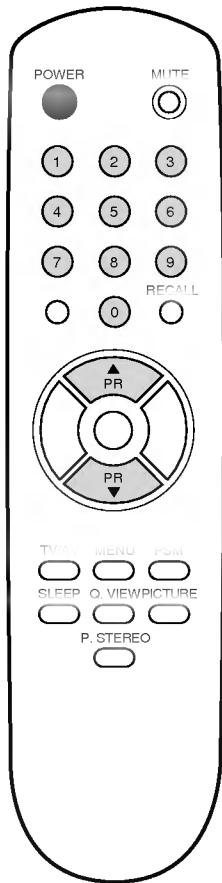
To turn echo sound on or off.

MICROPHONE JACK

Operating the TV

Turning the main power on or off (standby mode)

1. Press the main power button on the TV.
The power/standby indicator lights up in red and shows that the main power is turned on.
In this case, the TV is in standby mode.
2. Press the main power button once more to turn it off.



Turning on the TV from standby mode

1. Press the **POWER** button on the remote control unit. or
2. Press the **▲ / ▼** button.
3. Press one of the number buttons(0 to 9) to select the desired program directly.
4. When it comes up to the time, if you set **ON TIME**.
When the TV is turned on from standby mode, the preset selected program will appear.

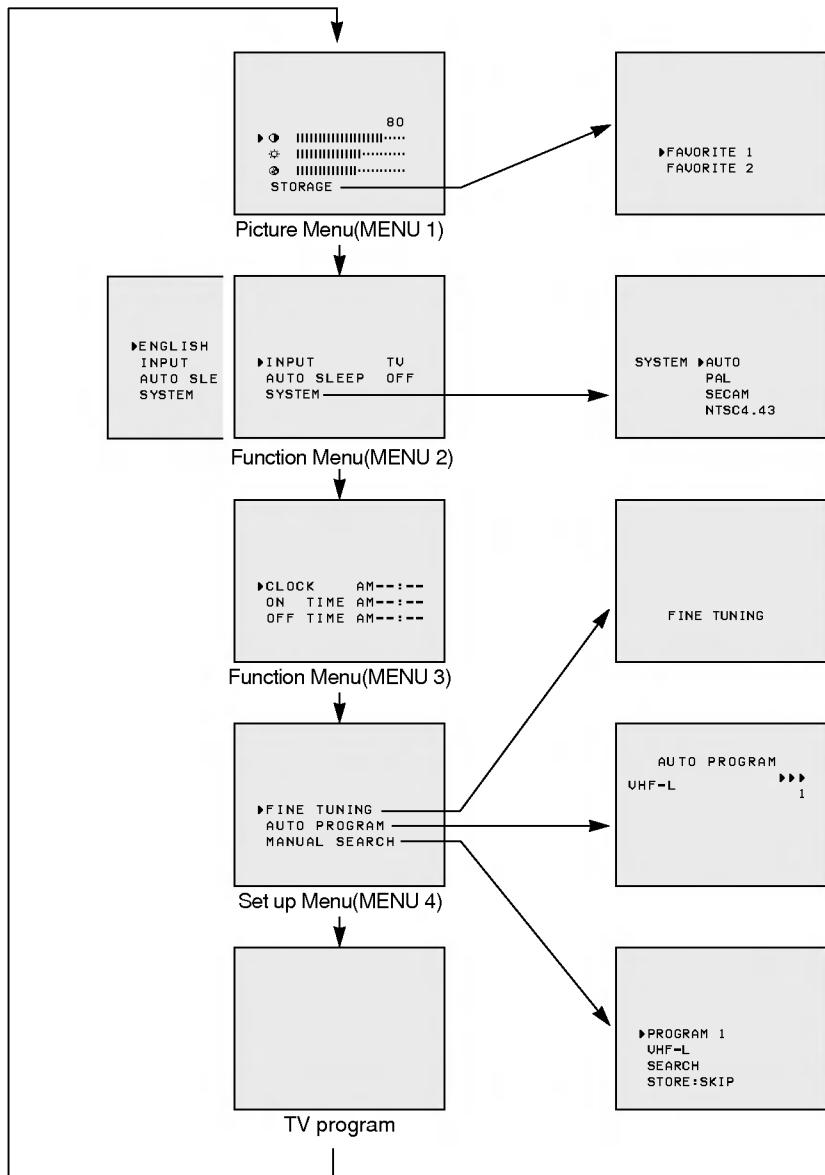
Selecting standby mode

The TV can be put into standby mode in three ways:

1. Press the **POWER** button on the remote control unit. or
2. If you set **OFF TIME**, when it comes up to the time, the TV is put into standby mode. or
3. In AUTO SLEEP ON, approximately 10 minutes after a TV station stops broadcasting('close-down') the TV switches automatically to standby mode.

On-Screen menus

The TV is equipped with a menu-based user guidance system for setting the on-screen display language and for storing the TV channels and for various other useful functions.



Note : In certain models, the display TETRIS is displayed in MENU 2.

On-Screen menus

Calling up the menu

1. Press the **MENU** button repeatedly to display the menu 1 to 4.
2. Press the **▲ / ▼** button to select the item of a menu.
The selected item is magenta and the others are green.
3. Press the **◀ / ▶** button to change the setting of an item.
4. Press the **OK** button to store the setting of item or display the sub-menu.

Note :

- a. In AV mode, menu 4 is not displayed.
- b. When the NTSC color system is received, **NTSC** appears in menu 1.
- c. When you press the **MENU** button after a menu disappears, the last selected menu is displayed.
If no menu is selected, menu 1 is always displayed at first.
- d. The displayed menu will automatically disappear from the screen if you don't press any button within 10 seconds.

Changing language on the screen (option)

If your set has two on-screen display languages, you can select between two languages. After having made a choice, the messages on the screen will appear in the respective languages. It is therefore recommended to make this choice at first.

1. In menu 2, press the **◀ / ▶** button to select the on-screen language.
2. Press the **OK** button or wait a minute.

Changing the input mode

1. To switch directly

Press the **TV/AV** button on the remote control unit.

TV/AV is a toggle button that turns the mode either **TV** or **AV** each time you press it.

2. To use the menu

In menu 2, press the **▲ / ▼** button to select **INPUT**.

Press the **◀ / ▶** button to select the desired input mode.

Changing the reception color system

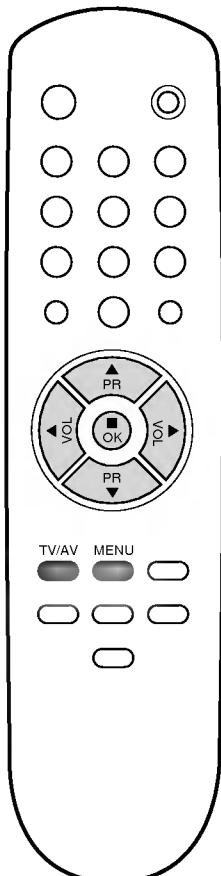
Normally set the color system to **AUTO**.

If the reception color system is not correct - if the picture turns red or blue - change it.

1. In menu 2, press the **▲ / ▼** button to select **SYSTEM**.
2. Press the **◀ / ▶** button. The sub-menu will be displayed.
3. Press the **▲ / ▼** button to select the correct color system.

Note :

- a. In the models which can't receive the SECAM color system, the display **SECAM** does not appear.
- b. **NTSC 3.58** can only be displayed and selected for the NTSC color system.



Setting up TV channels

Storing channels automatically

1. In menu 4, press the **▲ / ▼** button until **AUTO PROGRAM** is selected.
2. Press the **OK** button to begin auto programming.

The TV programs which can be received in the area where you live are stored in memory.

Once all TV programs have been stored in memory, the program number 1 will be displayed on the screen.

You can check if which channels are in memory by pressing the **▲ / ▼** button.

To stop autoprogramming, press the **OK** button.

Note :

*If the undesired channel is stored or the stored channel is not clear, you can skip the program number. In the sub-menu of **MANUAL SEARCH**, select the desired program number and **SKIP**.*

Manual search

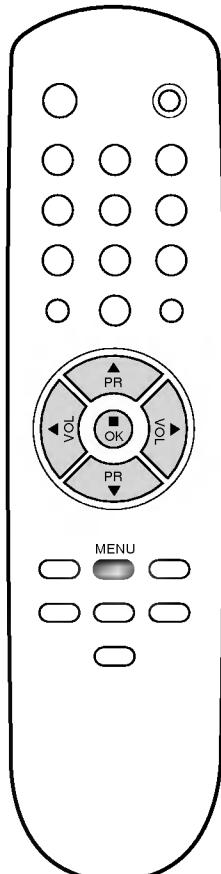
We recommend that you use **AUTO PROGRAM** for tuning and storing the programs. However you also have an option for performing program tuning procedures with the manual search function.

1. In menu 4, press the **▲ / ▼** button until **MANUAL SEARCH** is selected.
2. Press the **OK** button to display the sub-menu.
3. Press the **◀ / ▶** button to select the desired program number.
You can select one of all program numbers(0 to 79).
4. Press the **▲ / ▼** button to select the band selection item.
5. Press the **◀ / ▶** button to select the proper band.
(VHF-L, VHF-H, UHF)
6. Press the **▲ / ▼** button to select **SEARCH**.
7. Press the **▶** button.
After searching a program, the sub-menu gets back.
8. Press the **▲ / ▼** button to select **STORE : SKIP**.
9. If you want to store it, press the **◀** button.
The program number remains in green and **STORE** appears for a few seconds at its right side.
10. If you don't want to store it, press the **▶** button.
The program number is turned into cyan and **SKIP** appears.
11. Press the **OK** button and the on-screen display will disappear.

Channel copy

You can copy the current viewing channel into a desired program number.

After performing manual search steps 1, 2, 3, 8 and 9, press the **OK** button. The current shown channel is copied into the selected program number.



Setting up TV channels

Fine tuning

The TV will be automatically tuned to the best picture sharpness.
Therefore normally you won't need to carry out fine tuning.

It may only be necessary to carry out fine tuning, if reception is poor.

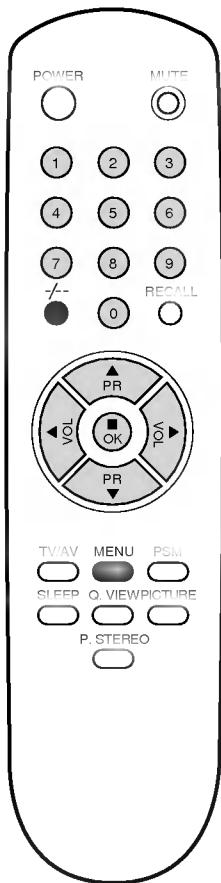
1. In menu 4, press the **OK** button. The sub-menu will appear.
2. Press the **◀ / ▶** button to get the optimum sound and picture quality while the message **FINE TUNING** is displayed.
Each time you press the **▶** button, the mark **▶▶▶** is blinking on the screen. Otherwise pressing the **◀** button shows **◀◀◀**.
3. Press the **OK** button to store the finetune.
The message **STORED** appears for a few seconds.

Note :

In this function, the stored program number is yellow.

Selecting TV channels

1. Press the **▲** button for a higher program number and the **▼** button for a lower.
2. Press one-(0 to 9) or two-(10 to 79) digit program number to select the desired TV channel directly.
If necessary, press the **-/-** button to set the program number of one or double figure at first.



Adjusting the picture and the volume

Adjusting the picture settings

1. Press the **PICTURE** or the **MENU** button.
2. Press the **PICTURE** or the **▲ / ▼** button to select the item you want to adjust. (● contrast, ○ brightness, ○ color, △ tint)
3. Press the **◀** button to decrease or the **▶** button to increase the level.
4. Press the **▲ / ▼** button to select **STORAGE**.
5. Press the **◀ / ▶** button. The sub-menu will be displayed.
6. Press the **▲ / ▼** button to select either **FAVORITE 1** or **FAVORITE 2**.
7. Press the **OK** button to store the adjusted levels in **FAVORITE 1** or **FAVORITE 2** you select. The message **STORED** will be displayed.

Note :

- a. △(tint) can only be displayed and adjusted for the NTSC color system.
- b. The **FAVORITE 1** and **FAVORITE 2** picture status have been initially adjusted for daytime and night-time respectively.

PSM(Picture Status Memory)

You can call up the picture status storing in **FAVORITE 1** or **FAVORITE 2**.

1. Press the **PSM** button until the desired message is displayed. Three messages are displayed as the following order.

► **FAVORITE 1** —► **FAVORITE 2** —► **STANDARD** —

2. Press the **OK** button or wait a minute when the message you want to select is displayed on the screen.

Note :

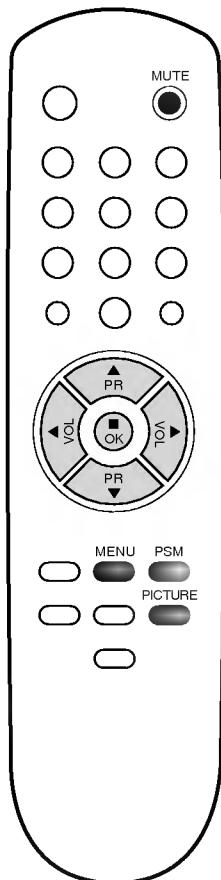
The preset standard picture status have 80 percent for the amount contrast, 60 for the brightness, 50 for the color intensity and 50 for the tint. They cannot be changed.

Adjusting the volume

Press the **▶** button to increase or the **◀** button to decrease the volume level.

Temporarily interrupting the sound

1. Press the **MUTE** button. The message **MUTE** is displayed on the screen and the sound is temporarily interrupted.
2. Press the **MUTE** button again or the **◀ / ▶** button to get the sound back. The message **MUTE** is removed from the screen.



Setting the time

Clock

This menu item is for keeping the current time and allowing operation of the on time and the off time functions.

The clock employs the 12-hour system(0:00 to 12:00).

1. In menu 3, press the **◀ / ▶** button to select the hour position.
2. Press the **▲ / ▼** button to set the hour.

when the **▲** button is pressed

►AM-- ▶AMI2 ▶AMI ----- AMI1 ▶ PMI2 ▶ PMI ----- PMI1 ▶

when the **▼** button is pressed

3. Press the **◀ / ▶** button to select the minute position.

4. Press the **▲ / ▼** button to set the minute.

when the **▲** button is pressed

► 00 ▶ 01 ▶ 02 ----- 58 ▶ 59 ▶

when the **▼** button is pressed

Press the **OK** button, and the on-screen display disappears.

On pressing the **OK** button, the clock begins to operate.

Note :

If the main power is interrupted, the clock stops.

*When the main power is later restored, the clock will show **AM---**.*

Reset the clock to make available the on time and the off time functions.

On time and off time

These functions automatically turns the TV(power) on or off at the set time. You have to set the clock before you use these functions.

1. In menu 3, press the **▲ / ▼** button to select **ON TIME** or **OFF TIME**.
2. To set the on or the off time, repeat the above steps 1 to 4.

Note :

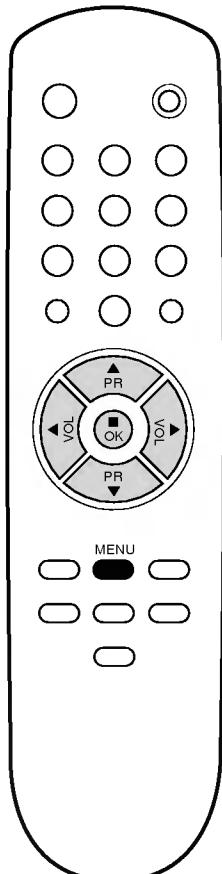
a. If both ON TIME and OFF TIME are set to the same time, OFF TIME has priority.

b. When the TV is turned on by the setting on time, if no button is pressed within 2 hours, the TV automatically switches to standby mode.

c. If the power is already on when the setting on time occurs, the preset selected program will appear.

d. OFF TIME cannot turn the main power off.

Also, ON TIME or OFF TIME only works when the main power is on. If the main power is turned off, you have to reset the clock, the on time and the off time.

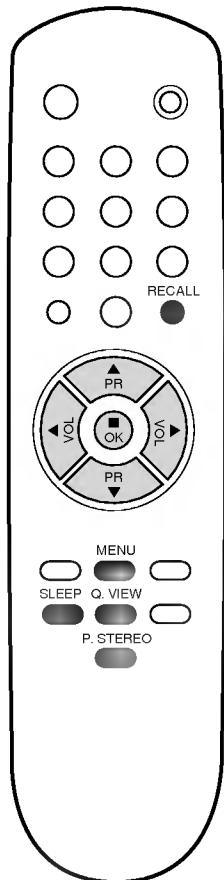


Other functions

Auto sleep

When the TV station stops broadcasting('close-down'), the TV will switch itself automatically to standby mode approximately 10 minutes later in **AUTO SLEEP ON**.

1. In menu 2, press the **▲ / ▼** button to select **AUTO SLEEP**.
2. Press the **◀ / ▶** button to switch **AUTO SLEEP OFF** to **ON**.
3. Press the **OK** button or wait a minute. The on-screen display disappears.



Recall

You can check the present turned-to channel and the current time by pressing the **RECALL** button.

Quick view

The channel shown right before can be displayed for quick on-screen viewing.

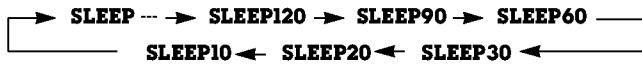
For example, if the channel 9 is displayed, when you want to see the channel 11 displaying right before again, press the **Q.VIEW** button. The channel 11 will be displayed.

Once more pressing the **Q.VIEW** button allows the channel 9 to be displayed.

Sleep timer

The TV can be automatically turned off approximately 120, 90, 60, 30, 20 or 10 minutes later.

Each time the **SLEEP** button is pressed, the message on the screen changes as follows:



For example, to turn off the TV after 60 minutes, press the **SLEEP** button until **SLEEP60** is displayed on the screen.

To cancel the sleep timer, press the **SLEEP** button until **SLEEP---** is displayed.

Note :

*After the sleep timer is set, if you press the **SLEEP** button, the remaining time will be displayed.*

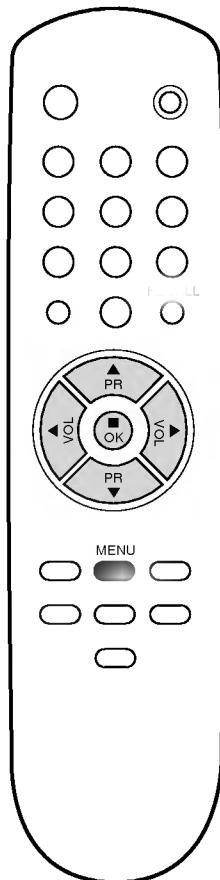
Pseudo stereo (option)

In the models which have the pseudo stereo function, you can experience sound effect as stereo sound by pressing the **P.STEREO** button.

1. Press the **P.STEREO** button.
The message **P. STEREO ON** will be displayed on the screen.
2. Press the button again to turn pseudo stereo off.
P.STEREO is a toggle button that turns **P. STEREO** either **ON** or **OFF** each time you press it.

Other functions

TETRIS game (option)



In the models which have the TETRIS game function, you can enjoy the TETRIS game with this set. To make a good score, try to pile up bricks neatly without empty spaces.

1. In menu 2, press the **▲ / ▼** button to select **TETRIS**.
2. Press the **◀ / ▶** button. The TETRIS game mode appears.
3. Adjust **SPEED** (1 to 9), **LEVEL** (1 to 5) and select **MODE 1** or **2** with the **▲ / ▼** and **◀ / ▶** button.
4. Select **START** with the **▲ / ▼** button then press the **OK** button.
5. Rotate bricks with the **OK** button for an appropriate arrangement, move them to left or right direction with the **◀ / ▶** button, and set them down straightly with the **▼** button when playing the game. The game score will automatically be recorded.
6. When the game is finished, select **EXIT** with the **▲ / ▼** button if you want to exit the TETRIS game. If not, select **START**.
7. Press the **OK** button.

Karaoke (option)

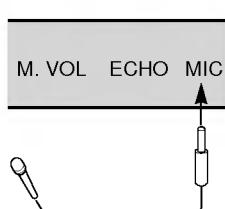
If your set has the karaoke function, the TV can be used as a karaoke monitor by connecting an optional microphone and using a VCR or VDP etc.

1. Connect a microphone equipped with a standard plug(ø6.3mm) to the **MIC** jack on the front panel.
2. Switch the microphone on.
3. Turn the **M.VOL** knob to adjust the output level of the connected microphone.
Clockwise : Increase the volume
Counterclockwise : Decrease the volume
4. As your preference, press the **ECHO** button to turn the echo effect function on or off.
ON (■) : With echo effect
OFF (□) : No echo effect

Note :

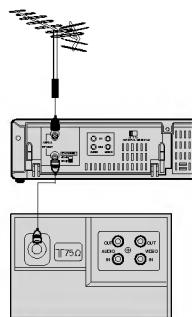
When a microphone connected to the TV is moved too close to the set, high-pitched feedback may be heard.

If this occurs, move the microphone further from the TV or decrease the microphone volume.



Connecting a VCR

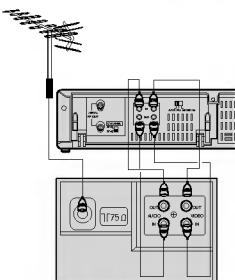
Connect a VCR as below. Here shown may be somewhat different from the back of your set.



Using the aerial socket

Connect the coaxial cable from the RF OUT socket of the VCR to the aerial socket on the back of the TV.

Connect the antenna lead-in cable to the RF IN socket of the VCR.



Using the phone jack - AV IN

For the superior quality of picture and sound during playback, this connection is recommended.

1. Connect the AV OUT terminal of the VCR to the AV IN terminal of the TV.
2. Press the **TV/AV** button so that the connected video message appears on the screen.
3. Set the VCR to the playback mode.

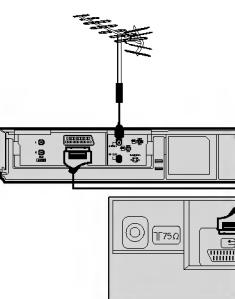
To return to the TV mode, press the **TV/AV** button.

A channel or program position number will be displayed on the screen.

Using the phone jack - AV OUT

With this connection, you can record a TV program to the video tape.

1. Connect the AV IN terminal of the VCR to the AV OUT terminal of the TV.
2. Set the VCR to the recording mode.



Using the euro-scart jack

If your TV has not phone jack but euro-scart jack,

1. Connect it to the VCR equipped with the euro scart jack.
2. Press the **TV/AV** button.
3. Set the VCR to the playback mode.

Check list for faults

Symptoms

No picture, no sound

Sound OK, poor picture

Picture OK, poor sound

Picture blurred

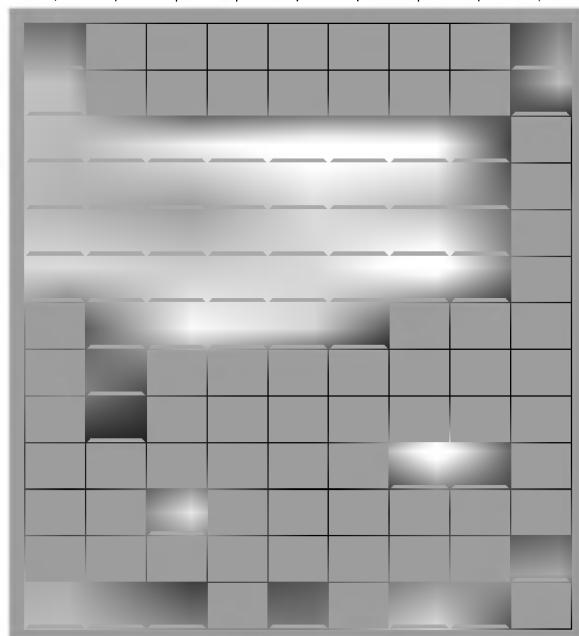
Lines or streaks in picture

Poor reception on some channels

No colour

Poor colour

Remote control does not work



Check these items and try to adjust these

The mains plug-(plugged in and switched on)

Is the TV switched on

Try another channel (weak signal)

Check aerial (plugged into TV?)

Check aerial (broken lead?)

Check aerial

Check for local interference

Adjust contrast

Adjust brightness

Adjust colour

Adjust volume

Check the batteries in remote control

Check A/V sockets (VCR only)