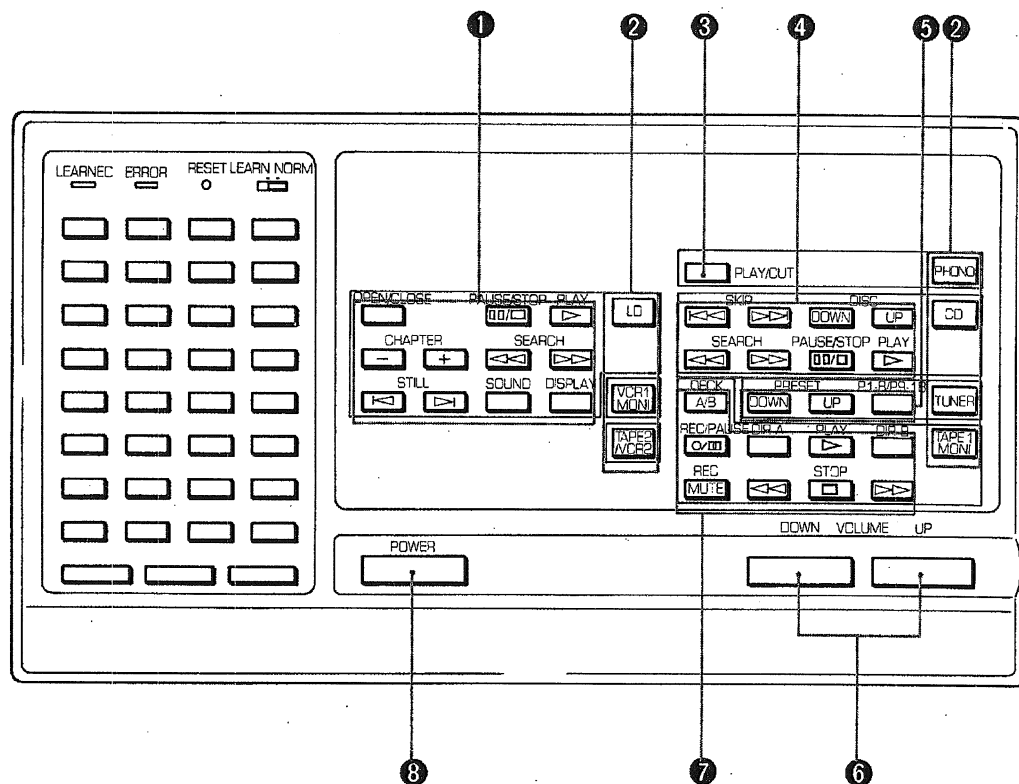


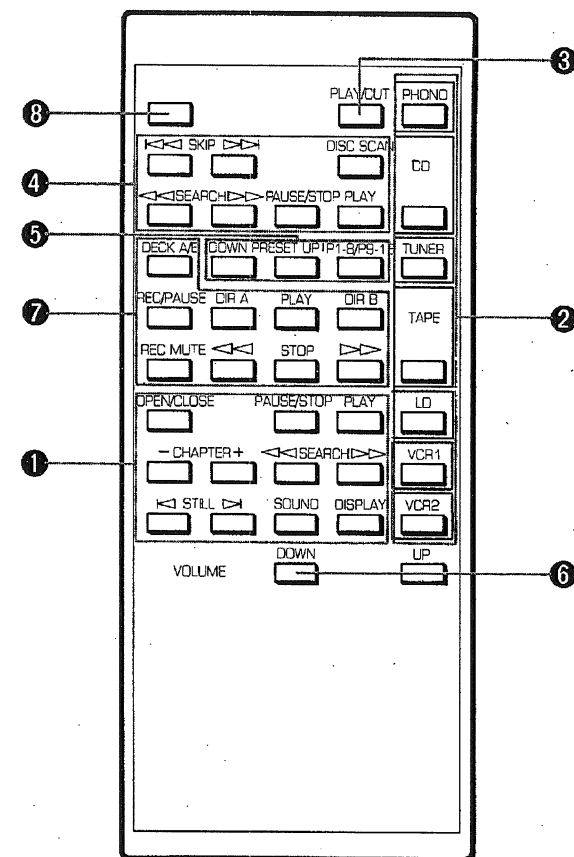
REMOTE-CONTROL TRANSMITTER

■ CONTROLS AND THEIR FUNCTIONS

(U.S.A. AND CANADA MODELS)



(EUROPE, U.K., AUSTRALIA AND GENERAL MODELS)



The remote-control transmitter provided with this unit is designed to control all the most commonly used functions of the amplifier. If the CD player, LD player, turntable, tuner and cassette deck connected to this unit are YAMAHA components designed for remote control compatibility (components with an **RS** mark), then this remote-control transmitter will also control various functions of each component. Please consult YAMAHA dealer for information on which components are compatible with the remote-control transmitter. Note that any compatible YAMAHA CD player, tuner, LD player or a compatible YAMAHA cassette deck with a remote control sensor, can be directly operated by this remote-control transmitter.

① LD player keys

A YAMAHA LD player (such as CDV-1600 or other models) that bears the **RS** mark can, when connected to this unit, be directly controlled by using this remote-control transmitter.

OPEN/CLOSE key

Press this key to open or close the disc tray.

PAUSE/STOP key

Press this key once to temporarily stop the LD player operation; when it is pressed again, the LD player changes to the stop mode.

PLAY key

Press this key to start the disc play.

CHAPTER keys (LD)

- + When this key is pressed during LD play, the beginning of the next "chapter" is detected.
- When this key is pressed during LD play, the beginning of the "chapter" now playing is detected.

SEARCH keys

- ▷▷ When this key is pressed during play, play is advanced at high speed.
- ◁◁ When this key is pressed during play, play is reversed at high speed.

STILL keys (CAV)

- ▷ When this key is pressed during LD (CAV) play, a still picture or frame-by-frame pictures can be displayed in the forward direction.
- ◁ When this key is pressed during LD (CAV) play, a still picture or frame-by-frame pictures can be displayed in the reverse direction.

SOUND select key (LD)

This key can be used to select the sound to be played from the disc and which will be output from the left and right audio signal output jacks. The selected audio signal changes in the order: STEREO → 1/L-CH → 2/R-CH each time the key is pressed.

DISPLAY key

When this key is pressed during the play of a LD (CAV), the "chapter" and frame numbers of the picture now being viewed are displayed on the screen.

When this key is pressed during the play of a LD (CLV), the "chapter" number and the time are displayed on the screen.

When this key is pressed during the play of a compact disc, the total time, the remaining time or the track time is displayed on the screen.

② Input selector keys

These keys are used to select the audio or the video source.

③ PLAY/CUT key

This key can be used to start or stop disc play on the turntable (with the **RS** mark) connected to this unit. This key functions in the same way as the PLAY/CUT key on the turntable itself. Press it once to start play, and once again to stop play.

④ Compact-disc player keys

A YAMAHA compact-disc player with the **RS** mark can, when connected to this unit, be directly controlled by using this remote-control transmitter.

SKIP ▷▷ key

Press this key to advance to the beginning of the next track on the disc.

SKIP ◁◁ key

Press this key to return to the beginning of the track now playing.

If this key is pressed at the beginning of a track, play will begin from the beginning of the previous track.

SEARCH ▷▷ key

Press this key to advance rapidly.

SEARCH ◁◁ key

Press this key to reverse rapidly.

DISC UP/DOWN keys (U.S.A. and Canada models)

These keys are used for selection of the disc, and are applicable only to compact-disc players that have the magazine type of automatic disc-changing mechanism.

Note: If a carousel-type compact-disc player is used, the DISC DOWN key has no function (only the DISC UP key operates to select the next disc in the carousel).

DISC SCAN key (Europe, U.K., Australia and General models)

This key is used for selection of the disc, and is applicable only to compact-disc players that have an automatic disc-changing mechanism.

PAUSE/STOP key

This key is used to stop (or temporarily stop: pause) the compact-disc player operation.

Play stops temporarily when the key is pressed once, and changes to a complete stop when the key is pressed again.

PLAY key

Press this key to play the compact-disc.

⑤ Tuner keys

A tuner with the **ARS** mark can be controlled by using this remote-control transmitter.

P1-8/P9-18 keys

This key is used to switch between the two banks of station presets.

PRESET UP and DOWN keys

These keys are used to switch to the next higher (UP) or the lower (DOWN) preset station.

⑥ VOLUME control keys

These keys are used to adjust the volume level from the speakers.

(U.S.A. and Canada models)

These keys also have the "learning" function. Refer to "ABOUT THE 'LEARNING' FUNCTION" on page 20 for details.

⑦ Cassette tape deck keys

A cassette tape deck with the **ARS** mark can, when connected to this unit, be controlled by using this remote-control transmitter.

DECK A/B key

Press this key to select either deck A or deck B if the cassette deck connected is a double-cassette deck.

PLAY key

Press this key to start tape playback. If the deck connected is a double-cassette deck, the tape in the deck that played back most recently will begin playback when this key is pressed.

◀ and ▶ keys

Press these keys to advance the tape rapidly in the direction of the arrow.

REC/PAUSE key

Press this key to set the cassette tape deck to the recording-pause mode.

STOP key

Press this key to stop the tape movement.

REC MUTE key

Press this key to make a non-recorded space on the tape while a recording is in progress.

DIR A key

Press this key to change the moving direction of the tape. If a double-cassette deck is used, this key changes the moving direction of the tape in the deck A.

DIR B key (for use with a double-cassette deck only)

Press this key to change the moving direction of the tape in the deck B.

⑧ POWER key

Press this key to turn the power of this unit ON and OFF.

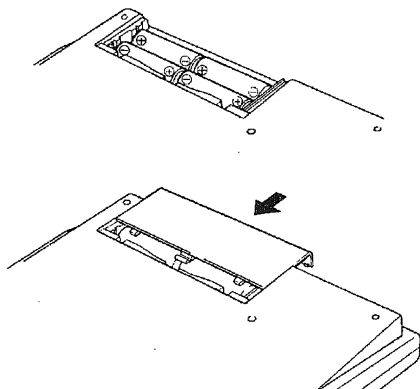
Europe model

This key functions only when the STANDBY indicator is lit.

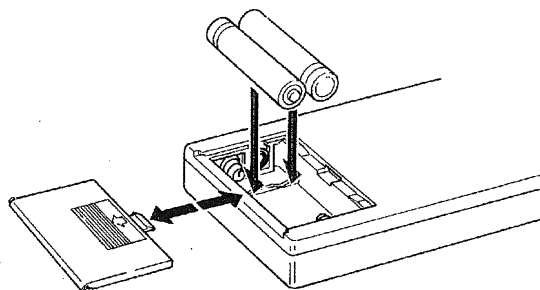
■ BATTERY INSTALLATION/REPLACEMENT

- Install the batteries as shown below.

(U.S.A. and Canada models)



(Europe, U.K., Australia and General models)

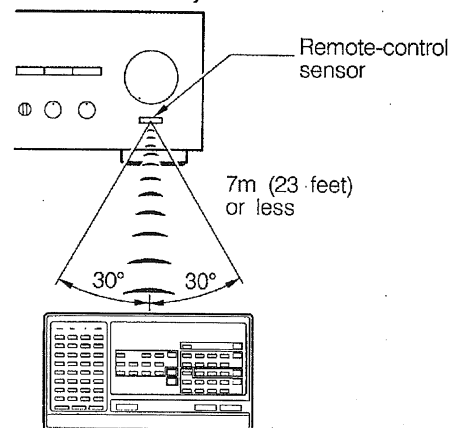


- Be sure to follow the diagram in the battery compartment to assure the proper positive (+) and negative (-) polarity.
- Do not use old and new batteries at the same time.
- If a battery leaks, dispose of all batteries; then clean the battery compartment thoroughly before installing new batteries.

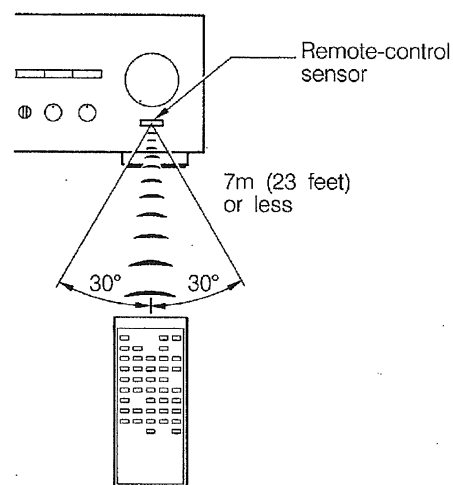
■ OPERATION RANGE

The remote-control transmitter must be faced toward the component to be controlled, and be within a range of about 7 meters (23 feet) for proper operation.

(U.S.A. and Canada models)



(Europe, U.K., Australia and General model)



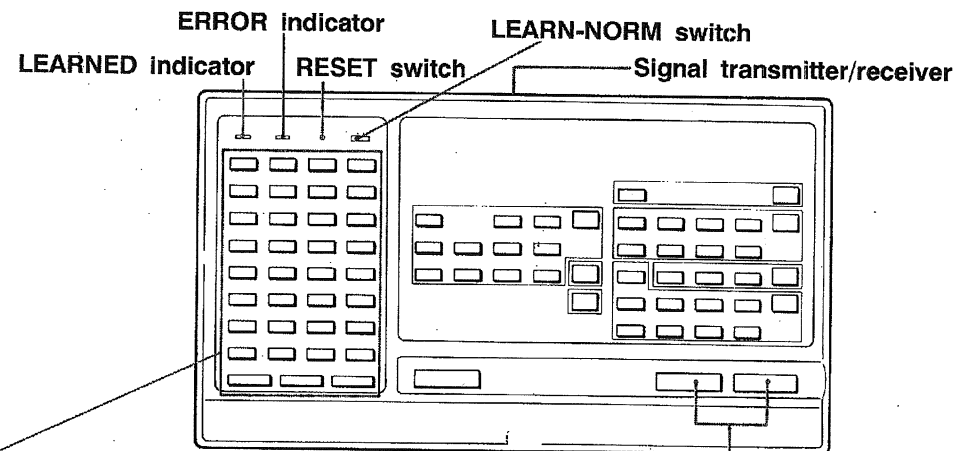
■ ABOUT THE "LEARNING" FUNCTION (applicable to U.S.A. and Canada models only)

This remote-control transmitter has a number of programmable keys. These keys can be programmed to "learn" the signal patterns from other remote-control transmitters. By programming this unit with the signals from other remote-control transmitters, this unit can then be used in place of one or more other remote-control transmitters, thus making operation of your various audio and video components more convenient.

NOTE

There may occasionally be instances, due to the signal-coding and modulation systems employed by the other remote-control transmitter, that this unit will not be able to "learn" its signals.

IDENTIFICATION OF PARTS



Learning keys

These keys can be used to "learn" (program) signals from other remote-control transmitters.

Programmable preset learning keys

These keys have already been preset with signals for controlling the sound volume, but, if desired, other signals can be "learned" by these keys (over the preset signals), in the same way as the ordinary learning keys.

(The "learning" method is the same as that for the ordinary learning keys.)

* These keys are convenient for programming signals for use as the master volume control of a YAMAHA digital-sound-field processor (model DSP-3000, DSP-100, DSR-100PRO, etc.) and so on.

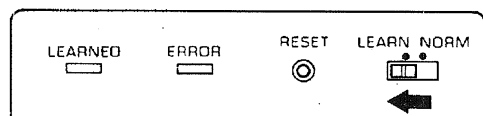
TO PROGRAM SIGNALS FROM OTHER REMOTE-CONTROL TRANSMITTERS

Before programming

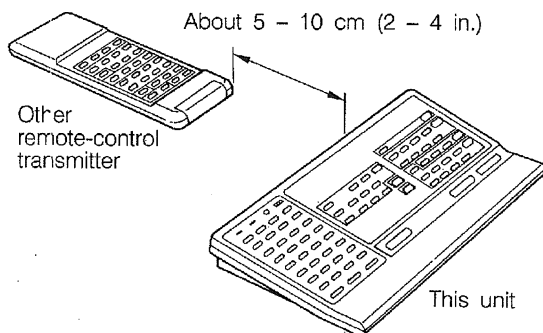
- Some learning keys are larger than others, but all keys are potentially capable of the same functions if so programmed. Keys should be programmed and used according to their positional convenience.
- Use the included seals to indicate the functions for which learning keys have been programmed. It is recommended that you first determine the best and most convenient layout of the keys for the various functions you plan to program (and attach the seals accordingly), and then program the keys correspondingly.

Follow the steps described below to program signals from other remote-control transmitters to this unit.

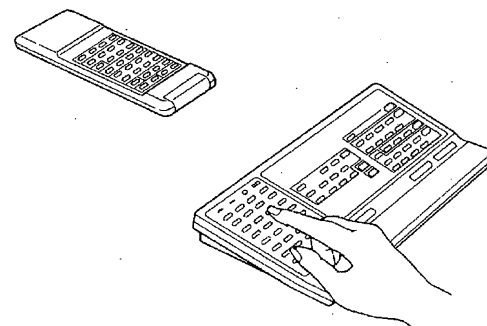
1. Set the LEARN-NORM switch to the "LEARN" position.



2. Position this unit and the other remote-control transmitter head to head.

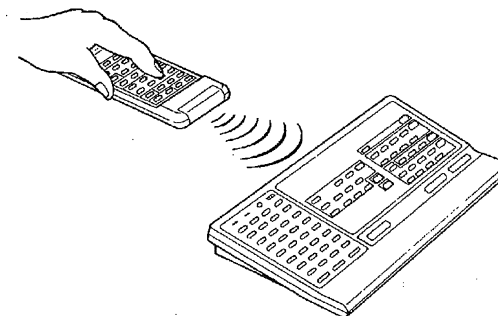


3. Press the learning key (or programmable preset learning key) on this unit to which the programming will be made.



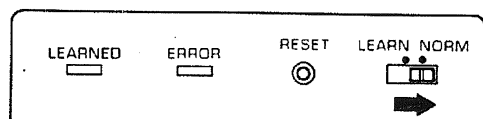
- * If the pressed key is unprogrammed, the LEARNED indicator will flash continuously. If the key is already programmed, the LEARNED indicator will flash continuously and, at the same time, the ERROR indicator will illuminate. Then proceed to the next step if you want to change that instruction already programmed for the key. If you do not want to change it, however, press the key to be programmed next and proceed to the "learning" operation of that key.

4. Press the key (on the other remote-control transmitter) for the function to be programmed.



* The LEARNED and ERROR indicators will illuminate continuously while the signals from the other remote-control transmitter are being received by this unit. Press and hold the key on the other remote-control transmitter until the illumination of these indicators stops. The LEARNED indicator will illuminate for about two seconds when the programming of signals has been successfully completed.

5. Repeat steps 3 and 4 until the signals for all programmings you want to make are successfully programmed.
6. After all programming is completed, set the LEARN-NORM switch to the "NORM" position.



After all programming is completed, try operating this unit.

Notes

- Note that the successful programming of signals to a learning key results in the erasure of previously programmed signals and their replacement by the newly programmed signals.
- In step 4, if the key on the other remote-control transmitter is not pressed within 15 seconds after a learning key is pressed, this unit will automatically return to the status that was in effect before the learning key was pressed.
- If the signals are not successfully programmed to this unit, the ERROR indicator will flash for about two seconds. If signals to be programmed are too long and this unit cannot program them, this unit automatically expands the work area capacity to be doubled, and will then await the next entry. During this stand-by mode the LEARNED indicator flashes rapidly. If this happens, try programming again.

- Although, because this unit employs the variable length programming method, long signals can also be programmed, if all signals programmed are long signals, it might happen that the capacity of the memory area would be completely used before all keys that are programmable are actually programmed, and no further programming would be possible. If this happens, after the signals from the other remote-control transmitter is received (in step 4), the LEARNED indicator and the ERROR indicator will flash two times.

Memory back-up

All of the programmed functions will be retained while you replace the batteries. However, if no batteries are installed for a few hours, the memory will be erased and will have to be programmed again.

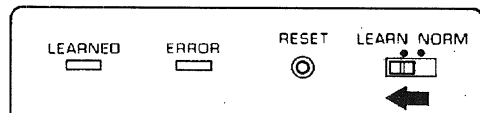
Trouble shooting guide

- If programming cannot be made successfully, or if this remote-control transmitter does not function even though the programming was successful, check the following points:
 - * Check whether the batteries of the other remote-control transmitter are weak.
Note that even though its batteries may be strong enough to operate the component it was made for, they may be too weak to transfer signals to this unit. If so, replace the batteries of the other remote-control transmitter.
 - * Check whether the distance between the two remote-control transmitters is too long or too short.
 - * Check whether a strong light, such as direct sunlight, is striking the signal transmitter/receiver of this unit.
- The remote-control transmitter's batteries are too weak if the LEARNED indicator and the ERROR indicator do not illuminate or flash, or if the distance or range within which the remote-control transmitter can be used decreases.
If either occurs, replace the batteries with new ones.
- If, due to a cause other than the above, the indicators do not function during the programming operation, remove the batteries from the unit (in order to reset it) for a few minutes, and then once again insert the batteries.

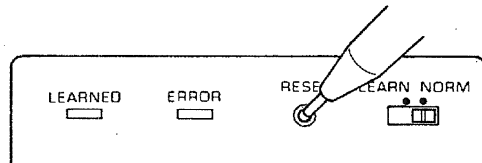
HOW TO CLEAR SIGNALS PROGRAMMED BY THE LEARNING OPERATION

By using the RESET switch, signals that you have programmed to a learning key or to a programmable preset learning key can be canceled. For a programmable preset learning key, there is a return to the originally preset commands for volume control of the amplifier when this switch is pressed.

1. Set the LEARN-NORM switch to the "LEARN" position.



2. Press the RESET switch using the point of a mechanical pencil, etc.. The LEARNED and ERROR indicators will illuminate for 15 seconds.



3. Press and then release the learning key (or programmable preset learning key) for which you want the programmed signal to be canceled. The LEARNED indicator's illumination and the ERROR indicator's illumination will then stop. Then, when the cancellation is finished, the LEARNED indicator will illuminate for one second. This indicates the completion of the cancellation process. To cancel two or more programmings, repeat steps 2 and 3.

Note

If a learning key (or a programmable preset learning key) is not pressed within 15 seconds after the RESET switch is pressed, this unit will automatically return to the status that was in effect before the RESET switch was pressed.

REMOTE-CONTROL OPERATION

Note the following points when using this unit for operation of audio/video equipment.

- Be sure to set the LEARN-NORM switch to the "LEARN" position.
- If this unit is faced toward the component to be operated and the key pressed correctly so that the correct signal can be transmitted, the LEARNED indicator will illuminate steadily. The ERROR indicator will illuminate if an unprogrammed key is pressed or two or more keys are pressed simultaneously or one after another.
 - * If a short signal is transmitted by a learning key, this indicator's illumination will stop when signal transmission ends, even if the key is pressed for a longer time.