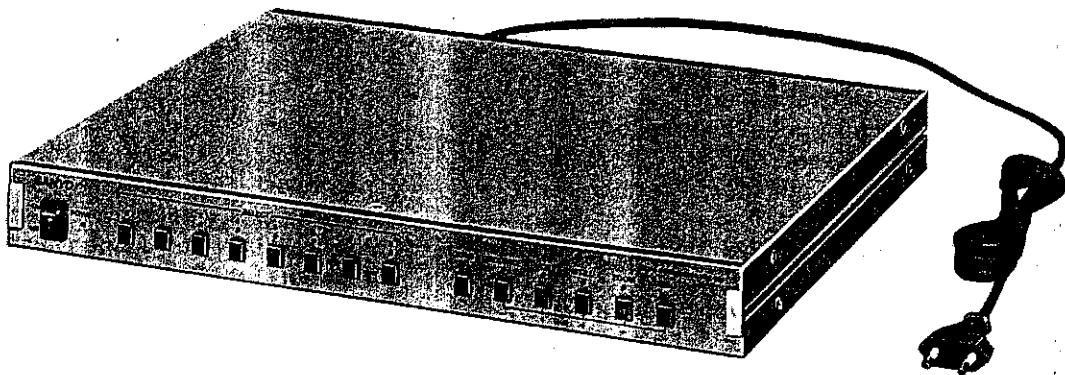


SANYO

**Instruction
Manual**

**COLOUR QUAD
COMPRESSOR**

VQC-800



Deutsch (D)

English (GB)

Français (F)

Congratulations!

You are now the owner of a new Sanyo Colour Quad Compressor. Please read these instructions before operating the unit, and retain this manual for future reference.

IMPORTANT SAFEGUARDS

WARNING: TO PREVENT RISK OF FIRE OR ELECTRIC SHOCK, DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.



CAUTION
RISK OF ELECTRIC SHOCK.
DO NOT OPEN!



CAUTION: TO REDUCE THE RISK OF ELECTRIC SHOCK,
DO NOT REMOVE COVER.
NO USER-SERVICEABLE PARTS INSIDE.
REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.



This symbol indicates that dangerous voltage constituting a risk of electric shock is present within this unit.



This symbol indicates that there are important operating and maintenance instructions in the literature accompanying this unit.

PRECAUTIONS


- Do not disassemble or modify the unit.
- Do not hit or drop the unit.
- Do not place objects inside the unit.
- Avoid water.
If liquid has been spilled into the unit, unplug the unit immediately and contact your dealer.
- Avoid dusty or dirty places.
- Do not place the unit near heat sources.
Be sure to use this unit only in conditions with a temperature range of 0°C to 45°C (32°F to 113°F) and less than 75% humidity.
- Do not install the unit near equipment that generates a strong magnetic field.
- Do not pull on the power cord itself when disconnecting it from an AC wall outlet. Grasp it by the plug.
If the power cord or plug is damaged, it must be replaced.
- To prevent electric shock, do not use the polarized plug with an extension cord, receptacle or other outlet unless the blades can be fully inserted to prevent blade exposure.
- Remove dirt by lightly wiping with a soft cloth. When heavily soiled, use a soft cloth soaked with a neutral detergent diluted in water and wrung dry, and wipe the unit afterwards with a dry cloth. Never use solvents such as alcohol, benzine or paint thinners, insecticides or chemically treated cloth, as they may mar the surface.
- When the unit is unused for long periods of time, unplug the power cord from the power outlet.
- **If a malfunction should occur**
If strange smells or smoke are noticed, further operation may be dangerous. Turn off the power immediately and contact your dealer.

The rating label is located on the bottom of the unit. Make sure of the model number, serial number, operating voltage, etc.

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FEATURES

- ① The ability to reduce colour (or B/W) video signals from 8 CCTV cameras and display 4 pictures on one monitor at one time.
- ② Selection of 3 display modes, QUAD A (cameras 1-4), QUAD B (cameras 5-8) and QUAD A/B (automatically alternates between QUADs A and B).
- ③ The ability to enlarge (zoom) an individual quad picture to full screen in quad mode.
- ④ MEMORY LOCK to hold an image of a still picture on the screen in quad, zoom or VCR playback zoom modes.
- ⑤ Built-in 8-channel sequential full screen switching with variable dwell time.
- ⑥ VCR playback picture input connector.
- ⑦ Automatic switching from quad to full screen mode should an alarm sensor be triggered.
- ⑧ Built-in video alarm sensors eliminate the need for external door switches or alarm sensors. In addition, 8 external alarm inputs and on-screen alarm indication : .
- ⑨ On-screen 8-character camera title indications.
- ⑩ 2 channel video outputs for continuous monitoring of quad output while viewing normal quad/switcher functions.
- ⑪ Automatic colour camera phasing and synchronization. Any 2:1 interlaced colour camera may be used with this unit.
- ⑫ User-selected operation mode featuring 5 on-screen menus.
- ⑬ Wired remote capability.
- ⑭ Setting menu data backup.

SPECIFICATIONS

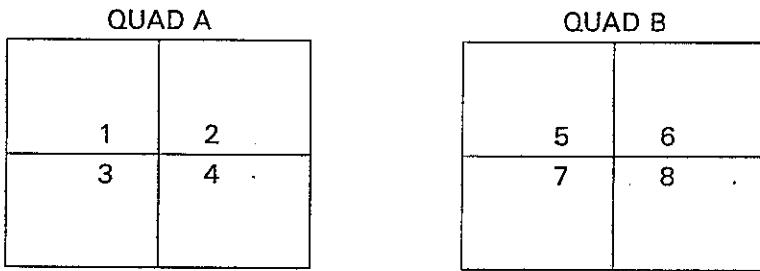
Signal system	Based on PAL colour standard
Video camera input	8 inputs, colour cameras Video signal : VBS (Video/Burst/Composite sync) or VS (Video/Composite sync) 1.0 Vp-p, 75 Ω , CAMERA IN BNC connector \times 8
VCR input	1 input Video signal : VBS, 1.0 Vp-p, 75 Ω , VCR IN BNC connector \times 1
Video output	2 channels Quad Only : VBS, 1.0 Vp-p, 75 Ω , QUAD ONLY BNC connector \times 1 Quad/Full : VBS, 1.0 Vp-p, 75 Ω , QUAD/FULL BNC connector \times 1
Camera sync	Built-in sync circuit
Monitor displays	
Quad A picture	Displays cameras 1 to 4 in quad
Quad B picture	Displays cameras 5 to 8 in quad
Quad A/B picture	Displays Quad A and Quad B alternately Adjustable switching time : 1, 2 or 4 sec.
Full screen picture	Allows full screen display of selected camera or camera triggering alarm
Still picture (memory-lock function)	Possible (while displaying quad, zoom or VCR playback zoom picture)
Sequential picture (auto switcher function)	Displays cameras 1 to 8 sequentially in full screen format Adjustable switching time : External or 0 to 10 sec.
Zoom function	Possible (in quad only) Enlarges quad pictures 1 to 8 to full screen
VCR playback function	Possible (both quad and full)
VCR playback zooming	Possible (in quad only)
Power failure recovery	Possible, returns to the original operation
Video alarm sensor	Built-in, ON/OFF mode setting per one camera screen
External alarm input	8 inputs, one per camera, activated by contact closure (LOW input, normally open), supplied through CONTROL female receptacle (15-pin) Adjustable alarm active time : 10, 20, 30 or 60 sec.
External alarm output	1 output, activated by contact closure (LOW output, normally open), supplied through CONTROL female receptacle (15-pin)
Buzzer	Built-in, ON/OFF setting
Remote input	Added the exclusive remote control circuit, activated by contact closure (LOW input, normally open), supplied through CONTROL female receptacle (15-pin)
Switching input (SW IN)	Activated by contact closure (LOW input, normally open), supplied through CONTROL female receptacle (15-pin)
Menu screen settings	Camera TITLE, SEQUENCE TIME and QUAD MODE : ON/OFF, video alarm sensor : ON/OFF and sensitivity level, video alarm sensor position, zoom position, ZOOM : ON/OFF, STILL : ON/OFF and alarm TIME, BUZZER ON/OFF and QUAD A/B switching TIME
Power requirement	220-240 VAC, 50 Hz
Power consumption	11 W (approx., when connected to 8 cameras)
Operating temperature	0 to 45 $^{\circ}$ C (32 to 113 $^{\circ}$ F)
Operating humidity	10 to 75 %
Dimensions	420 (W) \times 44 (H) \times 320 (D) mm
Weight	3.3 kg (approx.)
Accessories	AC power cord \times 1 15-pin DIN plug \times 1 Fixer \times 1

※ Specifications subject to change without notice.

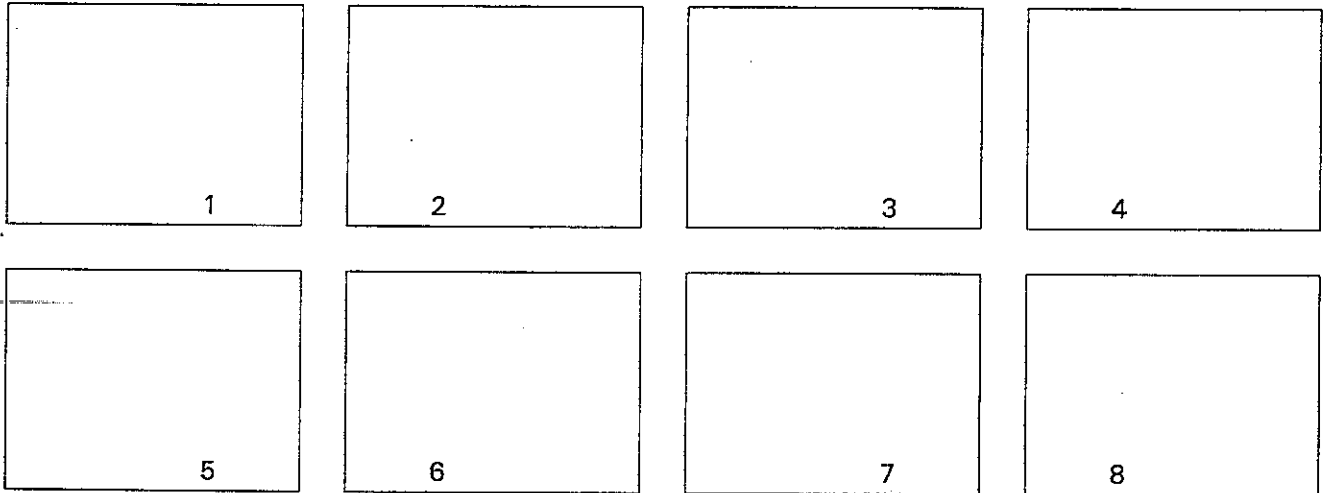
WHEN THE UNIT IS FIRST INSTALLED

- ① Plug the power cord provided into the power socket (AC IN) located on the rear panel of the unit. Then fix the cord to the power cord holder using the fixer provided.
- ② Set camera titles (after making all connections).
 - The MENU 1 (TITLE) screen will appear on the monitor when the MENU button is pressed once.
 - The initial state is preset as follows at the factory. (Refer to page 14.)

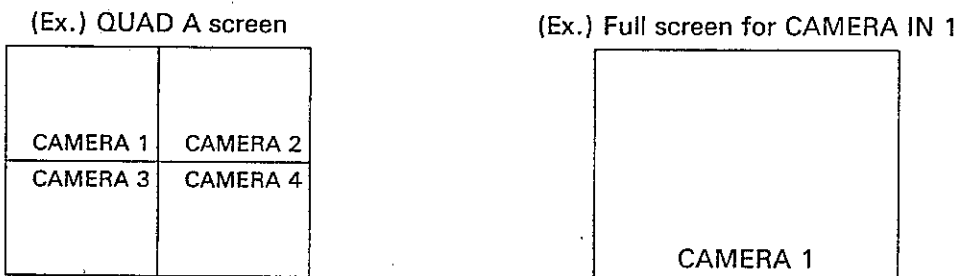
⟨Quad screen⟩



⟨Full screen⟩



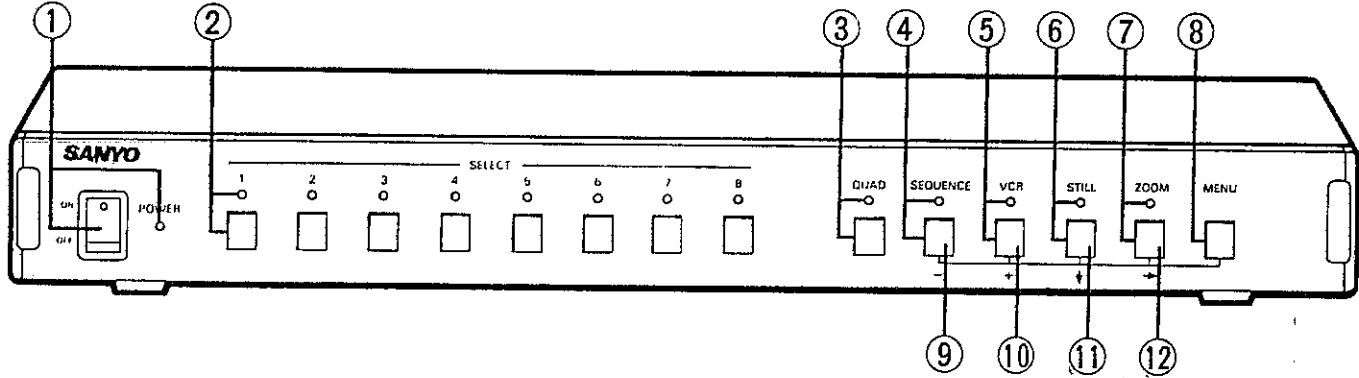
- Camera titles may be set as follows on the MENU 1 screen.



- ③ Set the active mode for the built-in video alarm sensor to "ON" on the MENU 3 screen (if desired).
 - The initial state is preset to "OFF" at the factory. (Refer to page 15.)

NAMES AND FUNCTIONS OF PARTS ①

(FRONT)



No.	Name	Function
①	POWER ON/OFF switch and LED	When the POWER LED (red) indicator is lit, the unit power is on.
②	Camera SELECT buttons 1-8 and LEDs	Push any one of the eight camera buttons to display the selected camera image (until another button is selected), and the corresponding SELECT LED (red) will light. The SELECT LED blinks while an alarm signal is being input.
③	QUAD button and LED	Push this button once to display the QUAD A picture (cameras 1-4). This LED (red) and the SELECT LEDs (red) 1-4 light. Push this button twice to display the QUAD B picture (cameras 5-8). This LED (red) and the SELECT LEDs (red) 5-8 light. Push this button three times to display alternately the QUAD A and QUAD B pictures. The SELECT LEDs (red) will also light alternately.
④	SEQUENCE button and LED	Push this button to display the pictures from cameras 1-8 sequentially in full screen. The SEQUENCE LED (red) light.
⑤	VCR button and LED	Push this button to display VCR playback video. The VCR LED (red) lights. The VCR playback quad picture can also be zoomed to full screen.
⑥	STILL button and LED	Push this button to memory-lock the image from an individual camera and to display it as a still picture. The STILL LED (red) lights and the corresponding SELECT LED (red) blinks. To cancel the memory mode, push the button again.
⑦	ZOOM button and LED	Push this button to zoom the quad camera picture to full screen. The ZOOM LED (red) lights. To release the zoom mode, push the button again.
⑧	MENU button	Push this button to display or change menu screens. (See pages 6 and 14.)

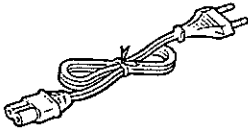
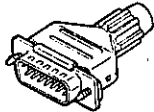

NAMES AND FUNCTIONS OF PARTS ②

No.	Name	Function
⑨	(- button)	Push this button to scroll down through the alphanumerics. Used to change setting values and items on menu screens.
⑩	(+ button)	Push this button to scroll up through the alphanumerics. Used to change setting values on menu screens.
⑪	(↓ button) (down arrow)	Push this button to move the cursor down. Used to change setting items and video alarm sensor positions on the menu screens.
⑫	(→ button) (right arrow)	Push this button to move the cursor to the right. Used to change setting items and video alarm sensor positions on the menu screens.

NOTE :

Buttons ⑨ to ⑫ double as buttons ④ to ⑦. They are used in combination with ⑧MENU button.

[ACCESSORIES]

AC power cord	15-pin DIN plug	Fixer
 (1 pc.)	 (1 pc.)	 (1 pc.)

Description of Menu Screens

MENU 1 (TITLE) screen :

For setting the camera titles for CAMERA IN 1-8 pictures.

Max. 8 characters per camera.

(Supported title characters : numerals, letters, "-" (hyphen), ":" (colon), "=" (double hyphen), "#" (number), and " " (blank space).)

MENU 2 (SEQ. T & Q. MODE) screen :

For setting the sequence switching time for CAMERA IN 1-8 pictures (in the range of 0 to 10 sec. or EXT.), and the ON/OFF setting for the quad display mode.

MENU 3 (VIDEO ALARM SENSOR SETTING) screen :

For setting the active mode ON/OFF, active sensitivity level and the position of the video alarm sensor for CAMERA IN 1-8.

MENU 4 (ZOOM POSITION) screen :

For setting the zoom position in quad screen for CAMERA IN 1-8.

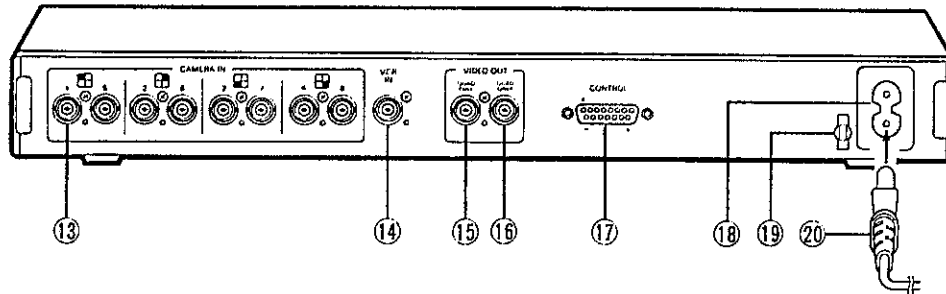
Position range : 1 to 9

MENU 5 (ALARM SETTING & QUAD A/B TIME) screen :

For setting ZOOM : ON/OFF, STILL : ON/OFF, alarm active TIME : 10, 20, 30 or 60 sec. and BUZZER : ON/OFF while alarm input, and QUAD switching TIME : 1, 2 or 4 sec.

NAMES AND FUNCTIONS OF PARTS ③

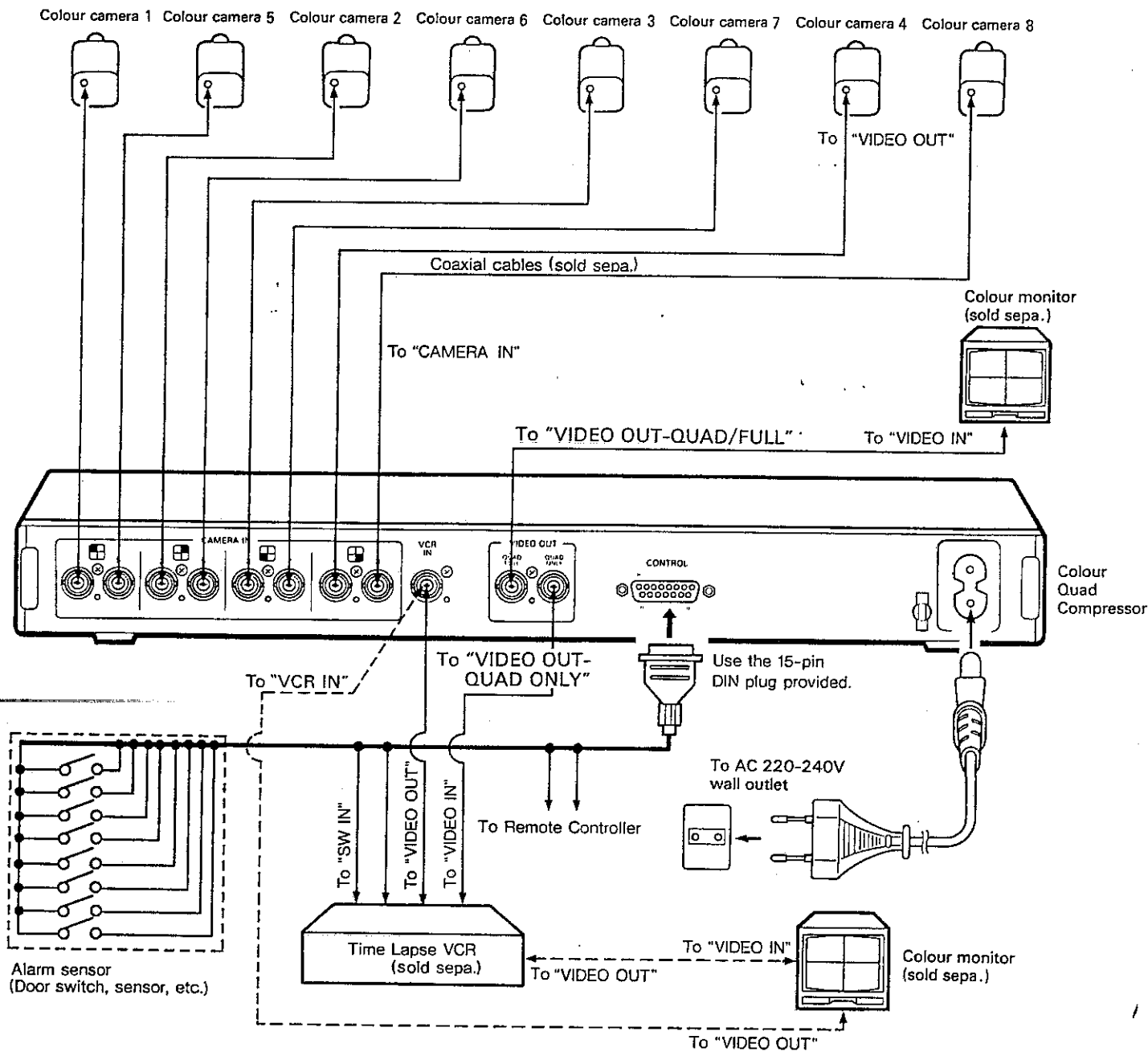
(REAR)



No.	Name	Function																																									
⑬	CAMERA IN connectors 1-8	For connecting 8 CCTV cameras to the unit by means of coaxial cables. BNC connectors.																																									
⑭	VCR IN connector	For connecting a time-lapse VCR. BNC connector. Allows viewing of VCR recordings through the unit either in normal or zoom mode.																																									
⑮	VIDEO OUT-QUAD/FULL connector	Outputs quad or full picture to the monitor. BNC connector. The colour video monitor will display quad, full, zoomed or still images as selected by the front panel or by an alarm condition.																																									
⑯	VIDEO OUT-QUAD ONLY connector	Outputs only a quad picture to the monitor. BNC connector. The colour video monitor will display quad, zoomed or still images as selected by the front panel.																																									
⑰	CONTROL connector (15-pin DIN socket)	<p>For external alarm input/output (for door switch, sensor, etc.), switching input (SW IN) through time-lapse VCR, optional remote control input, etc.</p> <p>CONTROL CONNECTOR PIN-OUT :</p> <table border="1"> <thead> <tr> <th>Pin No.</th> <th>Signal</th> <th>Description</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>ALARM IN 1</td> <td rowspan="8">This input is used to connect an external sensor. Contact is made when a low level signal is applied (active low).</td> </tr> <tr> <td>2</td> <td>ALARM IN 2</td> </tr> <tr> <td>3</td> <td>ALARM IN 3</td> </tr> <tr> <td>4</td> <td>ALARM IN 4</td> </tr> <tr> <td>5</td> <td>ALARM IN 5</td> </tr> <tr> <td>6</td> <td>ALARM IN 6</td> </tr> <tr> <td>7</td> <td>ALARM IN 7</td> </tr> <tr> <td>8</td> <td>ALARM IN 8</td> </tr> <tr> <td>9</td> <td>GND</td> <td>Ground.</td> </tr> <tr> <td>10</td> <td>REMOTE</td> <td>For an wired remote controller. (See page 13.)</td> </tr> <tr> <td>11</td> <td>GND</td> <td>Ground.</td> </tr> <tr> <td>12</td> <td>SW IN</td> <td>This terminal is used for inputting the switching timing from other equipment, for ex. a time-lapse VCR (SW OUT connector).</td> </tr> <tr> <td>13</td> <td>GND</td> <td>Ground.</td> </tr> <tr> <td>14</td> <td>ALARM OUT</td> <td>This terminal outputs 0V during alarm input. This terminal is used when it is necessary to send an alarm signal to externally connected equipment.</td> </tr> <tr> <td>15</td> <td>GND</td> <td>Ground.</td> </tr> </tbody> </table>	Pin No.	Signal	Description	1	ALARM IN 1	This input is used to connect an external sensor. Contact is made when a low level signal is applied (active low).	2	ALARM IN 2	3	ALARM IN 3	4	ALARM IN 4	5	ALARM IN 5	6	ALARM IN 6	7	ALARM IN 7	8	ALARM IN 8	9	GND	Ground.	10	REMOTE	For an wired remote controller. (See page 13.)	11	GND	Ground.	12	SW IN	This terminal is used for inputting the switching timing from other equipment, for ex. a time-lapse VCR (SW OUT connector).	13	GND	Ground.	14	ALARM OUT	This terminal outputs 0V during alarm input. This terminal is used when it is necessary to send an alarm signal to externally connected equipment.	15	GND	Ground.
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⑱	AC-IN socket	Plug the included AC power cord into this socket.																																									
⑲	Power cord holder	Fix the power cord to this holder using the fixer provided.																																									
⑳	AC power cord	Connect to an AC outlet (AC 220-240 V).																																									

CONNECTIONS ①

Ⓐ System connection 1

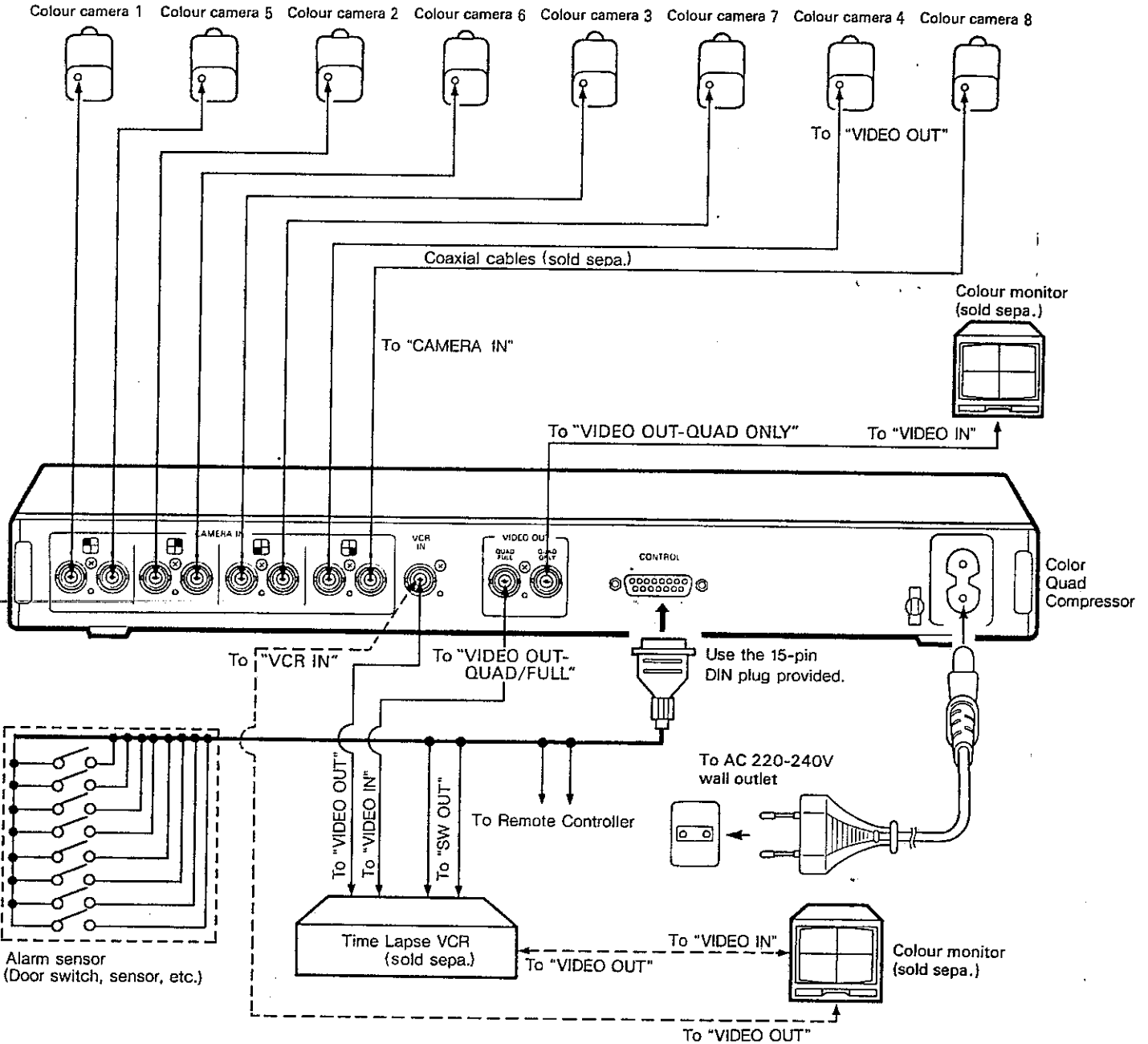


NOTES :

- Be sure to turn off the power for all units (unplug all cords) before connecting the units.
- Connect to the CONTROL connector using the 15-pin DIN plug provided.
- When connecting to a colour camera, video monitor, time-lapse—VCR, etc., read the corresponding instruction manual thoroughly.

CONNECTIONS ②

Ⓑ System connection 2



NOTE :

- Maximum recommended distance between the camera and the unit is 200 m (650 feet) when using RG-39U coaxial cable.

Coaxial cable	Maximum distance
RG-59U	100m (320 feet)
RG-39U	200m (650 feet)

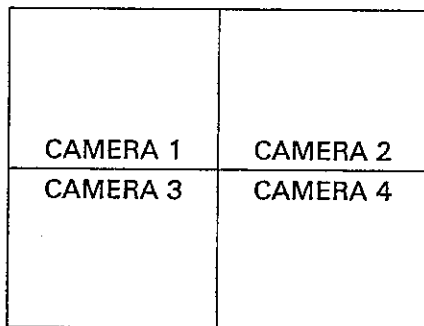
OPERATIONS ①

- ① Turn the **POWER** switch to "ON" after making connections.
The **POWER LED** (red) glows to indicate that power is on.
- ② Push the appropriate button for the desired operation.

QUAD SCREEN DISPLAY

<QUAD A screen>

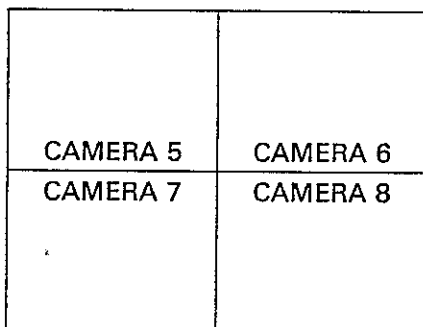
- ① Push the **QUAD** button once.
- ② The **QUAD LED** (red) and **SELECT LEDs** (red) 1-4 light.
- ③ The images from cameras 1-4 are reduced in size (1/4) and displayed as a quad (moving) picture on the monitor screen.



QUAD A screen

<QUAD B screen>

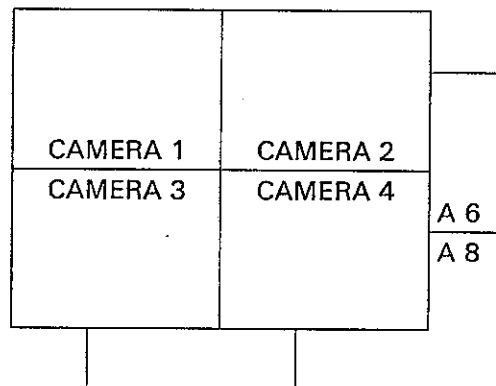
- ① Push the **QUAD** button twice.
- ② The **QUAD LED** (red) and **SELECT LEDs** (red) 5-8 light.
- ③ The images from cameras 5-8 are displayed as a quad picture on the monitor.



QUAD B screen

<QUAD A/B screen>

- ① Push the **QUAD** button three times.
- ② The **QUAD LED** (red) lights and **SELECT LEDs** (red) 1-4 (or 5-8) light alternately.
- ③ The **QUAD A** and **QUAD B** images are displayed alternately.
- ④ The **QUAD A/B** switching time can be set in the range of 1, 2 or 4 sec. on the **MENU 5** screen. (2 sec. is the default.)



QUAD A/B screen

NOTES :

- Screens for which **QUAD MODE** on **MENU 2** is set to "ON" are displayed on the monitor.

Ex.

Camera 1	Camera 5	Display
Q.MODE : ON	Q.MODE : ON	Cameras 1/5 switching/
: ON	: OFF	Cameras 1/1 switching
: OFF	: ON	Cameras 5/5 switching
: OFF	: OFF	Cameras 1/1 switching

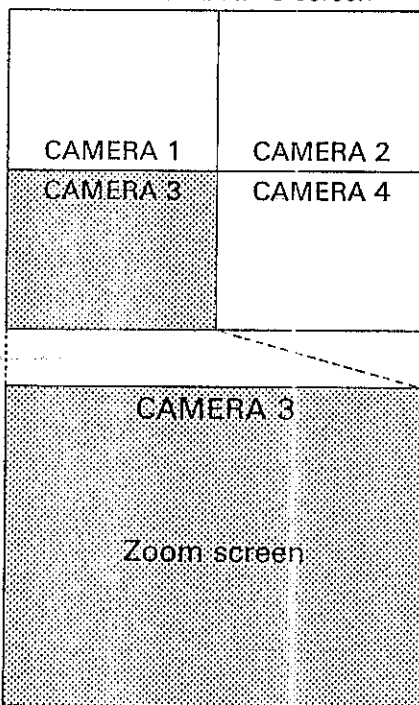
- Input from the **SELECT**, **SEQUENCE**, **VCR**, **STILL**, **ZOOM** or **MENU** buttons is also enabled.
- If the power supply is interrupted, the unit returns to the quad mode when power is restored.

OPERATIONS ②

QUAD SCREEN ZOOM DISPLAY

- ① Push the **ZOOM** button while displaying a quad screen.
- ② The **QUAD**, **SELECT 1-4** (or 5-8) and **ZOOM** LEDs (red) light.
- ③ Pressing a **SELECT** button zooms the corresponding screen to full screen, and the corresponding **SELECT** LED (s) will blink.
- ④ Push the corresponding **SELECT** button again, and the zoom picture will switch back to the quad picture.
- ⑤ To cancel the zoom mode, push the **ZOOM** button again. The zoom screen will go back to the quad screen, and the **ZOOM** LED will also go out.

Ex. CAMERA IN 3 screen



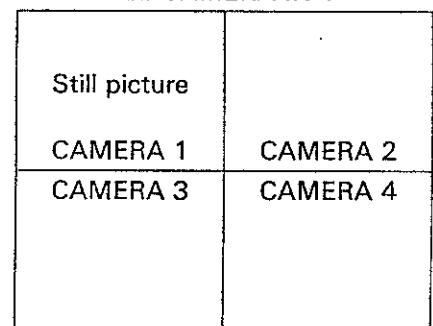
NOTES :

- Input from the **STILL** button is also enabled.
- The zoom display position can be set/adjusted by panning/tilting on the **MENU 4** screen. (Screen center position is the default.)
- If the power supply is interrupted, the unit returns to the quad modes when power is restored.

QUAD SCREEN STILL DISPLAY

- ① Push the **STILL** button while displaying a quad screen.
- ② The **SELECT 1-4** (or 5-8) LEDs (red) blinks and **QUAD** and **STILL** LEDs (red) light.
- ③ All pictures on the quad A or B screen will be memory-locked and will turn to still pictures.
- ④ Push any **SELECT** button, and the corresponding still picture will switch to a normal (moving) picture, and the corresponding **SELECT** LED will light.
- ⑤ Push the corresponding **SELECT** button again, and the moving picture will turn to a still picture again, and the corresponding **SELECT** LED will blink.
- ⑥ To cancel the still mode, push the **STILL** button again, and all quad pictures will go back to normal quad (moving) pictures, and the **STILL** LED will also be turned off.

Ex. CAMERA IN 1



NOTES :

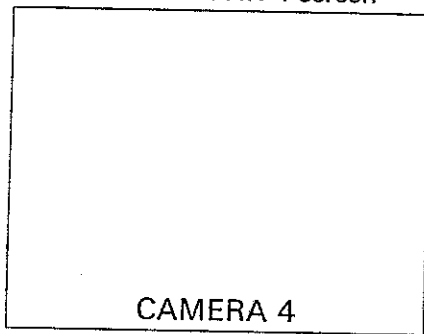
- Input from the **QUAD** button is also enabled.
- In case of power loss, the still mode will be cancelled and will go back to the normal quad mode.
- It is not possible to display a still picture when displaying a full screen image.

OPERATIONS ③

FULL SCREEN DISPLAY

- ① Push any **SELECT 1-8** button while displaying a quad screen.
- ② The corresponding **SELECT LED** (red) lights.
- ③ A full screen picture will display on the monitor, via the **VIDEO OUT-QUAD/FULL** connector.

Ex. CAMERA IN 4 screen

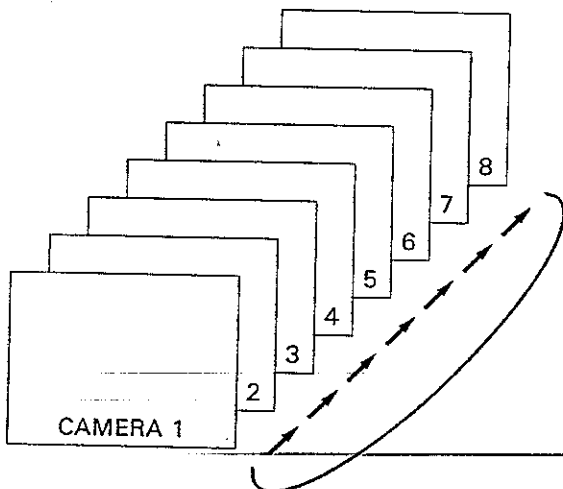


NOTES :

- Input from the **QUAD**, **SEQUENCE** or **VCR** buttons is also enabled.
- The **VIDEO OUT-QUAD ONLY** connector will output only quad video.

FULL SCREEN SEQUENCE DISPLAY

- ① Push the **SEQUENCE** button while displaying a full screen.
- ② The **SEQUENCE LED** (red) will light and the **SELECT LED** (red) corresponding to the screen will turn on and off sequentially.
- ③ The camera 1-8 images will be automatically displayed in full screen, switching in turn. (**VIDEO OUT-QUAD/FULL** connector)
- ④ The switching time (**SEQ. TIME**) can be set/adjusted from the **MENU 2** screen. (1 sec. is the default.)



NOTES :

- Screens with **SEQ. TIME** set to 0 sec. will be skipped.
- It is possible to switch the screen using an external sync input (**SW IN**) signal from the **SW OUT** connector of the time-lapse VCR. (Only set any camera IN 1-8 to "EXT" in the **MENU 2** screen.)
- Input from the **SELECT**, **QUAD** or **VCR** buttons is also enabled.
- The **VIDEO OUT-QUAD ONLY** connector will output only quad video.
- It is necessary that the phase of the 8 cameras be synchronized.

VCR PLAYBACK/ZOOM FUNCTION

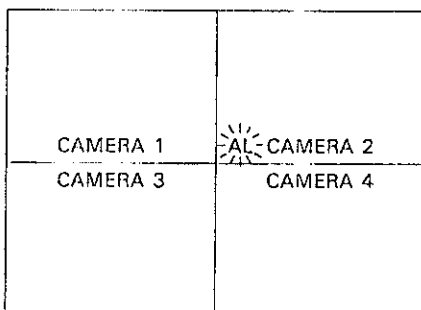
- ① To play back a recorded tape, push the **PLAY** button on the time-lapse VCR.
- ② Push the **VCR** button of this unit.
- ③ **VCR LED** (red) will light and the VCR image will play back via the **VIDEO OUT** connector.
- ④ Push any **SELECT** button 1-4 while displaying quad pictures, and the corresponding quad screen is zoomed to full screen. The corresponding **SELECT LED** (red) to also lights.
- ⑤ Push the **VCR** button again, and the zoomed full screen picture will return to a normal playback screen. The LED goes out.
- ⑥ Push another **SELECT** button while zooming, and the corresponding screen is zoomed to full screen.

OPERATIONS ④

ALARM FUNCTION

- ① When the built-in video alarm sensor is activated, or an alarm signal is input from an external sensor, the monitor screen is automatically switched to the full picture image via the QUAD/FULL connector.
 - The corresponding SELECT LED (red) will blink and the built-in buzzer (beeper) will sound.
 - In order to stop the buzzer sound, push any one of the operation buttons on the front panel (except the STILL, ZOOM and MENU buttons).
 - Also, the alarm indication "AL" blinks on the monitor screen.

Ex. CAMERA IN 2 screen



- ② The video ALARM SENSOR active mode (ON/OFF) and sensitivity level can be set/adjusted from the MENU 3 screen.
(A. SENSOR : OFF is the default.)
- ③ The video alarm sensor active position can also be set/adjusted from the MENU 3 screen.
(Screen center position is the default.)
- ④ In quad screen when an alarm occurs, ZOOM : ON/OFF, STILL : ON/OFF, alarm active TIME (10, 20, 30 or 60 sec.) and BUZZER : ON/OFF can be set/adjusted from the MENU 5 screen.
(ZOOM : OFF, STILL : OFF, alarm TIME : 10 sec. and BUZZER : ON is the default.)
- ⑤ The unit outputs an alarm signal (low output, normally open) to a time-lapse VCR, etc, through the CONTROL connector on the rear panel.
- ⑥ When the alarm mode is cancelled in the following 2 modes, the LED (red) light also goes out.
 - (1) The SELECT, QUAD, SEQUENCE or VCR button on the front panel was pushed.
The unit will return to the normal mode.
 - (2) The alarm active setting TIME has elapsed.
The unit will return to the normal mode.

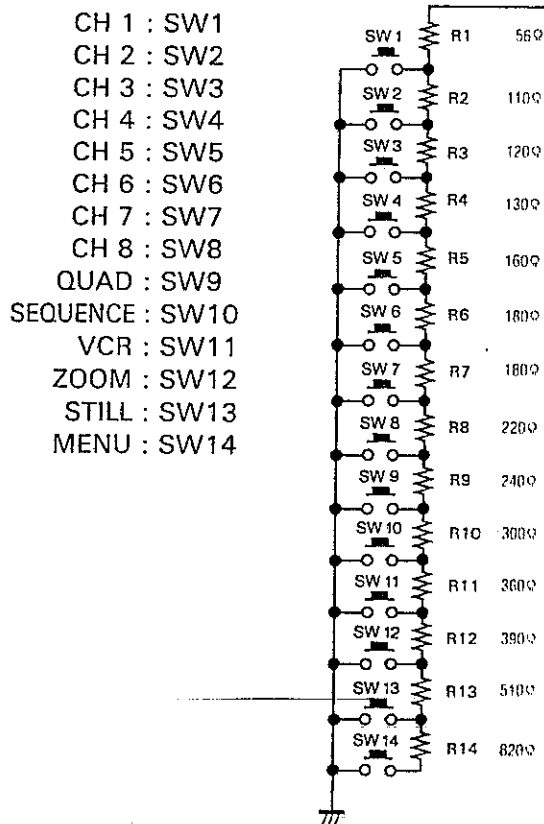
- ⑦ If additional alarm signals are input, the screen will change alternately in the duration of 1 sec. in the QUAD/FULL output.
 - If the QUAD ONLY output has been selected, the alarm indication "AL" will blink on the monitor screen. Quad, zoomed or still pictures are possible, depending on the MENU 5 settings.

NOTES :

- The external alarm input will be a contact closure input (low input, normally open) of a door switch, sensor, etc.
- The video alarm sensors are activated by catching image variation or movement at an alarm detecting place set on the monitor screen.
- It is not necessary that the phase of the 8 cameras be synchronized.

REMOTE CONTROL FUNCTION

This unit can be remote-controlled by adding an contact closure (low) input device with circuits shown below via the CONTROL connector (15-pin female receptacle).



Note : The resistance tolerance is $\pm 0.5\%$ or less.

ON-SCREEN MENU SETTING ①

Set the menu setting in the VIDEO OUT-QUAD/FULL screen. (CAMERA IN 1)
 The desired menu screen can be displayed by repeatedly pushing the **MENU** button.
 In the event of a loss of power, setting menu data are retained since they are stored in nonvolatile memory.

MENU 1 : Camera TITLE

- ① Push the **MENU** button (once), and the MENU 1 screen is displayed.
 - The cursor will flash at the beginning of the camera IN 1 TITLE.
- ② Input the first character using the "+" and "-" buttons.
 - (Supported title characters : numerals, letters, "-" (hyphen), ":" (colon), "=" (double hyphen), "#" (number), and " " (blank space).)
- ③ Move to the next character using the "→" button. Up to a maximum of 8 characters may be input. (If input exceeds 8 characters, the cursor will return to the beginning.)
- ④ Push the "↓" button, and the cursor will move to the camera IN 2 TITLE column.
- ⑤ Input titles for cameras 1-8.

MENU 1 initial screen

MENU 1	
IN	TITLE
1	1
2	2
3	3
4	4
5	5
6	6
7	7
8	8

MENU 2 : SEQUENCE TIME & QUAD MODE

- ① Push the **MENU** button again (twice). The MENU 2 screen is displayed.
 - The cursor will flash at the SEQ. T column for camera IN 1.
- ② Set the SEQUENCE TIME (0 to 10 sec. or EXT.) using "+" and "-" buttons.
- ③ Push the "→" button. The Q. MODE column flashes.
- ④ Set ON/OFF using "+" and "-" buttons.
 - (Quad mode ON : Yes)
 - (Quad mode OFF : No)
- ⑤ Push the "↓" button and set in like manner camera IN columns 2-8.

MENU 2 initial screen

MENU 2		
IN	SEQ. T	Q. MODE
1	1 sec	ON
2	1	ON
3	1	ON
4	1	ON
5	1	ON
6	1	ON
7	1	ON
8	1	ON

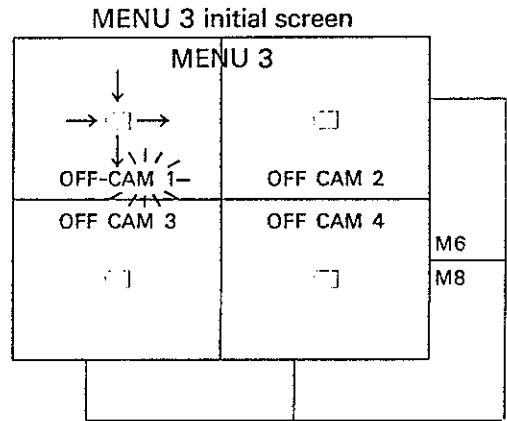
Character	Sequence time (sec.)
EXT	Depends on external switching pulses. (ex. SW OUT pulse of the time-lapse VCR) Only set any camera IN 1-8 to "EXT".
0	The screen is skipped.
1	1 sec. (default)
2	2
3	3
4	4
⋮	⋮
10	10

ON-SCREEN MENU SETTING ②

MENU 3 : Video Alarm Sensor active mode, level and position

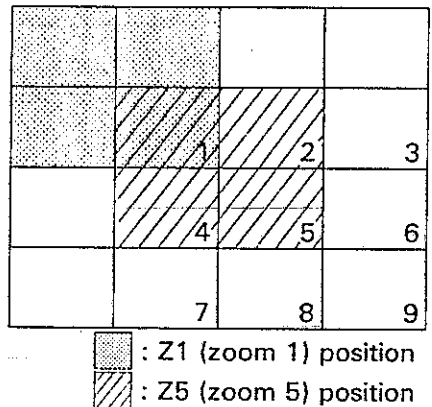
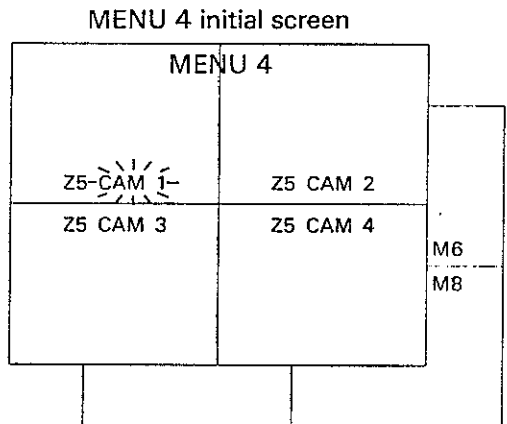
- ① Push the MENU button again (three times). The MENU 3 screen is displayed.
 - In the initial screen, the active mode is OFF and the active position of the video alarm sensor is preset in the center of the quad screen for all camera inputs. (The active position of the sensor appears when setting.)
 - The cursor will flash at "CAM 1" of CAMERA IN 1.
- ② Select OFF or the desired sensitivity level using the "+" button.

OFF : Not active
 Sensitivity level : 1 to 10 (max.)
- ③ Set the alarm position using the "→" and "↓" buttons.
 (The position can be adjusted by panning/tilting.)
- ④ Push select "-" button and set CAMERA IN 2-8 in like manner.



MENU 4 : Zoom position

- ① Push the MENU button again (four times). The MENU 4 screen is displayed.
 - In the initial screen, the zoom position is preset in the center (Zoom 5) of the quad and alarm screens for all camera inputs.
Range : Zoom 1 to Zoom 9
 - The cursor will flash at "CAM 1" of CAMERA IN 1.
- ② Set the zoom position (1 to 9) using the "+" button.
- ③ Push the "-" button and set CAMERA IN 2-8 in like manner.



ON-SCREEN MENU SETTING ③

MENU 5 : ALARM modes

(1) Push the **MENU** button again (five times). The MENU 5 screen is displayed.

• In the initial screen, the alarm mode pre-settings are as follows.

ZOOM : OFF BUZZER : ON
 STILL : OFF QUAD TIME : 2 sec.
 TIME : 10 sec.

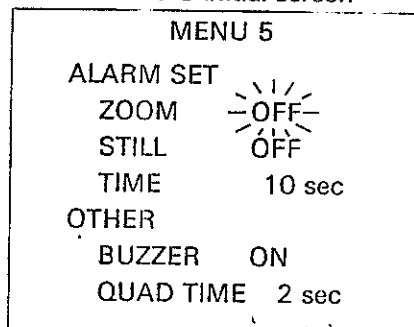
• The cursor flashes at ZOOM : "OFF".

(2) Set ZOOM : ON/OFF using "+" and "-" buttons.

(3) Move to the STILL column with the "↓" button.

(4) Set in like manner the STILL : ON/OFF, active TIME : 10, 20, 30 or 60 sec., BUZZER (beeper) : ON/OFF and QUAD switching TIME : 1, 2 or 4 sec.

MENU 5 initial screen



NOTES :

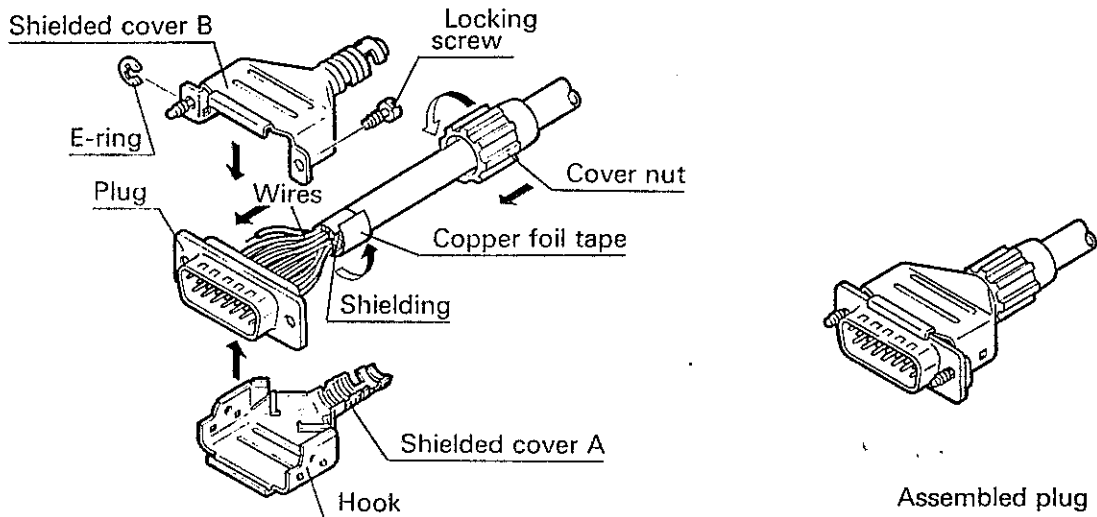
- In case of one alarm input or two alarm inputs, the monitor screen is displayed as shown below.
- It is not possible to display zoom or still pictures in full screen.

- Push the **MENU** button again (six times). The screen returns to the quad display screen.

One alarm input				Two alarm inputs			
Settings		Display example (CAMERA IN 1)		Settings		Display example (CAMERA IN 1/2)	
Zoom	Still	Quad only output	Quad/full output	Zoom	Still	Quad only output	Quad/full output
OFF	OFF			OFF	OFF		→
ON	OFF			ON	OFF		→
OFF	ON			OFF	ON		→
ON	ON			ON	ON		→

ATTACHING THE 15-PIN DIN PLUG ①

● To connect a cable to the CONTROL connector, first it is necessary to attach the 15-pin DIN plug provided as described below. (Request that your dealer attach the plug.)

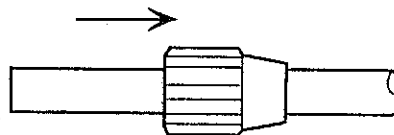


《Components》

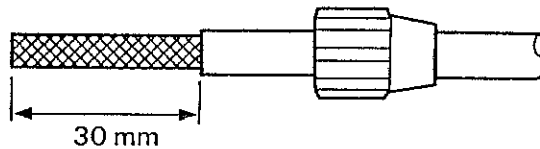
Shielded cover A	Shielded cover B	Cover nut	Locking screw	E-rings
			(2 pcs.)	Holder

《Assembly Procedure》

① Pass the 15-wire cable through the cover nut.

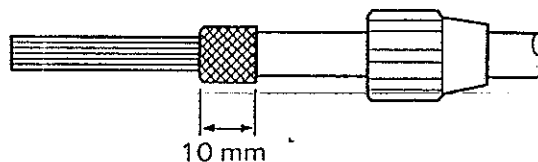


② Remove about 30 mm of the outer jacket from the end of the cable.



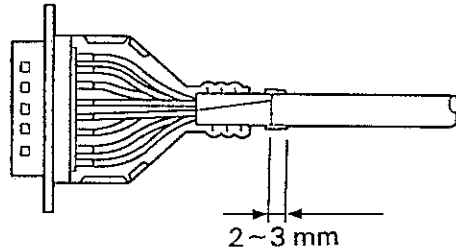
③ Fold the (copper-wire) shielding back along the cable and cut the shielding to a length of about 10 mm.

● Wrap copper foil tape or aluminum tape (width : 15 to 20 mm) around the exposed shielding once to increase the shielding effect.

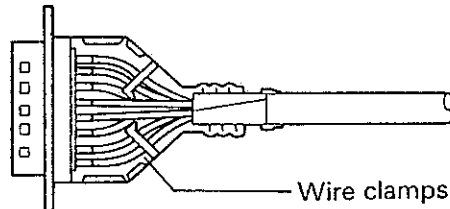


ATTACHING THE 15-PIN DIN PLUG ②

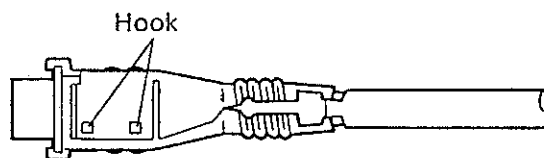
- (4) Strip about 2 mm of the covering of each wire.
- (5) Solder each wire to the plug.
 - Refer to page 7 for the relationship between the pin numbers and the signals.
 - The connections can be made easily by stripping each wire and then soldering them.
- (6) Attach shielded cover A to the side of the plug with fewer pins (so that the plug is inside the cover).
 - The cable should be positioned so that the edge of the tape lies about 2 mm or 3 mm inside the edge of cover A.



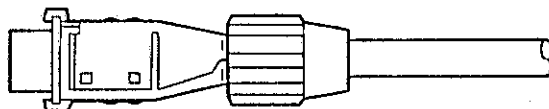
- (7) Bend the wire clamps on shielded cover A over so that the wires are held in place.



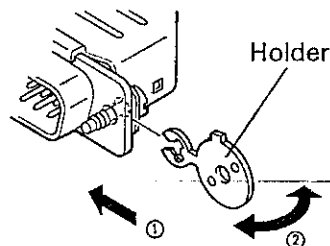
- (8) Place shielded cover B on top of the assembly and push it in place until it catches on the hooks on shielded cover A. (After making sure the cover clicks in place, check the hooks visually.)



- (9) Tighten the cover nut (which was slid onto the cable earlier) on the threaded portion of the shielded cover. (Tightening torque: 1.5 to 2 kgf/cm)



- (10) Place the locking screws in the mounting holes, and then place the E-ring provided around the locking screws in the gap between shielded cover B and the plug itself, and then bend the holder two or three times until the E-ring detaches. (The 15-pin DIN plug is now fully assembled.)



- (11) Plug the 15-pin DIN plug into the CONTROL connector on the back of the unit and then screw the locking screws into the unit to lock the plug in place.

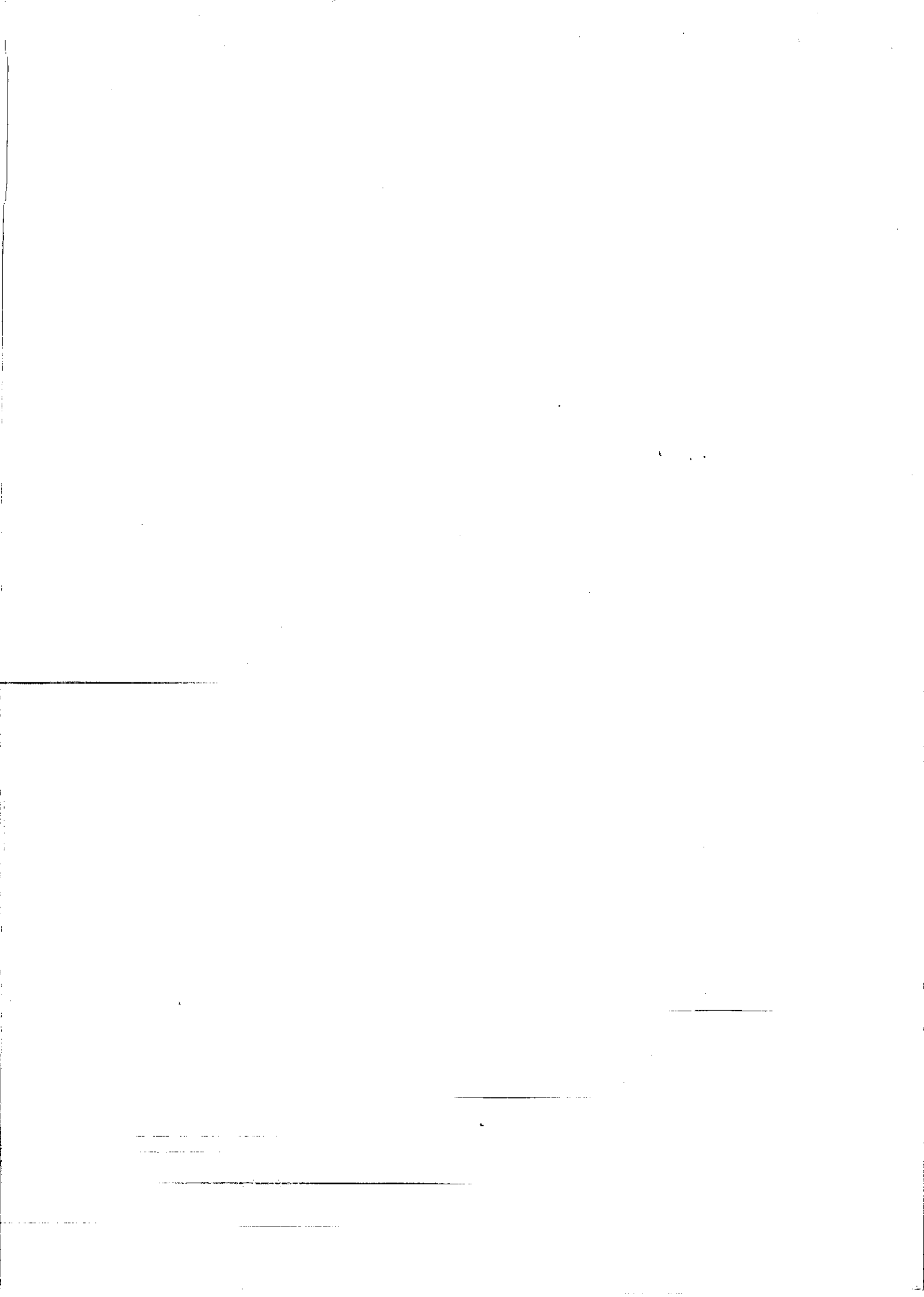
SERVICING

This unit is a precision instrument and, if treated with care, will provide years of satisfactory performance. However, in the event of difficulty, the owner is advised not to attempt to make repairs.

Opening or removing the cabinet may expose you to dangerous voltage or other hazards. Servicing should always be referred to your dealer or Sanyo Authorized Service Center. The warranty may be affected by unauthorized repairs.

If any of the following conditions have occurred, unplug the unit from the wall outlet and refer servicing to qualified service personnel.

- If the power cord or plug is damaged.
- If the unit has been dropped or the cabinet has been damaged.
- If the unit has been exposed to rain or water.
- If liquid has been spilled into the unit.



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SANYO

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