

*Past and future meet in a world gone mad!*

# Capcom's *Dinosaurs* **AND** **Dinosaurs**™

MANUAL

**CAPCOM**®

# CAUTION

Please keep the following instructions to keep the P.C. board in good condition.

Do not block up the ventilation slots to prevent the overheating.

Do not give the boards too much shock.

Do not let any liquid go inside the case. If it happens, turn off the switch immediately.

Do not disassemble the case. This will VOID warranty.

Do not remove the sealing sticker. This will VOID warranty.

**Do not turn the volume dial excessively.**

## WARNING

**THIS GAME MUST BE GROUNDED. FAILURE TO DO SO MAY RESULT IN DESTRUCTION TO ELECTRONIC COMPONENTS.**

**WARNING:** This equipment generates, uses and can radiate radio frequency energy and if not used in accordance with the instruction manual, may cause interference to radio communications. It has been tested and found to comply with the limits for a CLASS A computing device pursuant to SUBPART J and PART 15 of FCC RULES, which are designed to provide reasonable protection against such interference when operated in a commercial environment. Operation of this equipment in a residential area is likely to cause interference in which case the user at his own expense will be required to take whatever measures may be required to correct the interference.



**“WINNERS DON'T USE DRUGS”**

**William S. Sessions, Director, FBI**

**\*IN COOPERATION WITH THE AAMA AND FBI ANTI-DRUG CAMPAIGN\***

**CAPCOM, USA INC.**

*INVITES YOU TO USE*

*OUR SERVICE NUMBER FOR  
SERVICE INFORMATION CONCERNING THIS GAME, OR ANY  
OTHER CAPCOM GAME YOU NOW HAVE ON LOCATION.  
PLEASE HAVE GAME SERIAL NUMBERS AND CABINET NUMBERS READY.*

*CALL US FOR PROMPT, COURTEOUS  
ANSWERS TO YOUR PROBLEMS.*

**Direct Number**

**(408) 727-0400**

# WARRANTY, REPAIR AND RETURN POLICY

## REPLACEMENT PARTS:

CAPCOM USA maintains a stock of replacement parts for our products. When placing an order for parts, please supply a complete description of the item, quantity required, P.O. number and shipping information. We attempt to ship items the day they are received, orders received after 12:00 noon will ship the following work day. We do have a minimum order requirement at this time, and we certainly appreciate your efforts to consolidate your orders whenever possible.

Payments Terms are NET 30.

## RETURN MATERIAL AUTHORIZATIONS:

Material can be returned to CAPCOM only in the following situations:

1. Parts, return for credit. A parts order was processed incorrectly, ie; wrong items were shipped, wrong quantity was shipped, etc.
2. PCB, return for credit. A PCB is being returned for credit to satisfy an Advantage Exchange transaction.
3. Other, parts are being returned for engineering analysis, etc, only with prior consent of Customer Service or Sales Department.

To obtain a Return Material Authorization, please contact CAPCOM Customer Service Department. Describe the transaction and request an RMA number. The outside of the package must be clearly marked with the RMA number. Packages not displaying an RMA number will be returned un-opened.

## WARRANTY REPAIRS:

During the initial 60-day warranty, customers whose accounts are current are eligible for an Advance Exchange PCB. When calling for an Advance Exchange PCB, please supply a complete description of the item needed, number for warranty verification, P.O. number and shipping information. You will be issued an RMA number for the return of the defective PCB.

## LIMITED WARRANTY

CAPCOM warrants only to the initial purchaser of its products that the items listed below are free from defects in material and workmanship under normal use and service for the warranty periods specified:

- A. Printed Circuits Boards (60) Days (C.P.S. Chip)
- B. Electronic Components (30) Days
- C. Television Monitors (30) Days

No other parts of products are warrantied.

Warranty periods are effective from the initial date of shipment from CAPCOM to it's authorized distributors.

This warranty does not apply to any parts damaged during shipping or handling, or due to improper installation or usage or alteration. In no event shall CAPCOM be liable for any anticipated profits, loss of profits, loss of use, incidental or consequential damages or any other losses incurred by the customer in connection with the purchase of CAPCOM products.

Terms for Advance Exchanges are NET 15. If the defective PCB is not returned within 30 days, no additional Advance Exchanges will be issued until the offending PCB is returned or the invoice is paid in full. If the PCB is not returned until after 90 days, the warranty will be voided and the customer will be liable for all repair charges. Each transaction not more than one set PCB.

It is our goal to constantly improve and better our services to you. Your Cooperation with the above stated policies will help us greatly to reach this goal. If you have any comments or questions, please telephone our Customer Service Department. We will make every attempt to tailor our services accordingly.

\*Each customer cannot withhold Advance Exchange more than two set PCB at the same time and same item.

# ● SETTING INSTRUCTIONS

## ○ PCB CONNECTOR

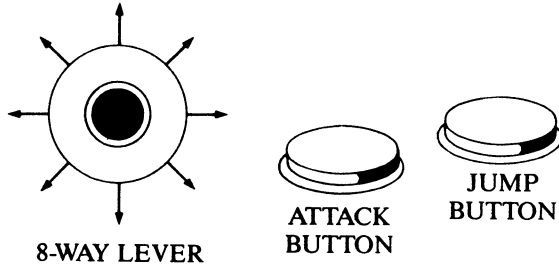
JAMMA STANDARD

## ○ CRT MONITOR

HORIZONTAL

## ○ CONTROL PANEL

2 OR 3 PLAYERS SIMULTANEOUS



- 8-WAY LEVER: used to move the player in 8 ways.
- ATTACK BUTTON: used to attack.
- JUMP BUTTON: used to jump.

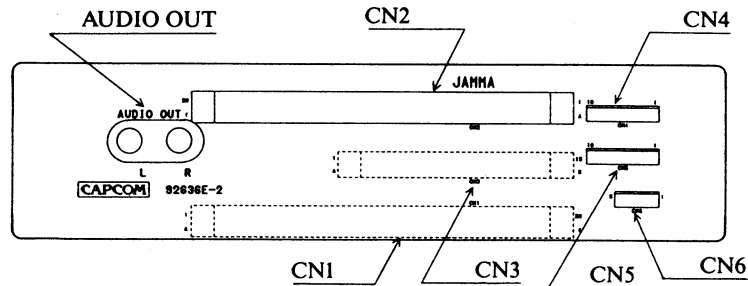
Push both buttons simultaneously to execute powerful MEGACRUSH.

## JAMMA STANDARD

SOLDER SIDE		COMPONENTS SIDE	
GND	A	1	GND
GND	B	2	GND
+5V	C	3	+5V
+5V	D	4	+5V
N.C.	E	5	N.C.
+12V	F	6	+12V
	H	7	
N.C.	J	8	COIN COUNTER 1
(COIN LOCK OUT 2)	K	9	(COIN LOCK OUT 1)
SP (-)	L	10	SP (+)
N.C.	M	11	N.C.
VIDEO GREEN	N	12	VIDEO RED
VIDEO SYNC	P	13	VIDEO BLUE
SERVICE SW	R	14	VIDEO GND
N.C.	S	15	TEST SW
COIN SW 2	T	16	COIN SW 1
START SW 2	U	17	START SW 1
2P UP	V	18	1P UP
2P DOWN	W	19	1P DOWN
2P LEFT	X	20	1P LEFT
2P RIGHT	Y	21	1P RIGHT
2P SHOT 1	Z	22	1P SHOT 1
2P SHOT 2	a	23	1P SHOT 2
N.C.	b	24	N.C.
N.C.	c	25	N.C.
N.C.	d	26	N.C.
GND	e	27	GND
GND	f	28	GND

● PARTS NAME  
 CR7E-56DA-3.96E : (HIROSE)  
 OR  
 1168-056-009 : (KEL)

# ● CONNECTORS



- CN2 — JAMMA CONNECTOR
- CN4 — I/O CONNECTOR for PLAYER 3
- CN5 — I/O CONNECTOR for PLAYER 4 (not used)
- CN6 — OPTIONAL OUTPUT CONNECTOR
- AUDIO OUT — used only for CAPCOM Q SOUND cabinet
- CN1 — not used
- CN3 — not used
- CN5 — not used

CN4	
GND	1 #22 BLACK
GND	2 #22 BLACK
3P RIGHT	3 #22 VIOLET
3P LEFT	4 #22 GRAY
3P DOWN	5 #22 WHITE
3P UP	6 #22 BROWN
3P SHOT 1	7 #22 ORANGE
3P SHOT 2	8 #22 GREEN
3P COIN SW	9 #22 BLUE
3P START SW	10 #22 VIOLET

CN5 NOT USED

CN6	
+12V	1 #22 YELLOW
+12V	2 #22 YELLOW
	3
	4
COIN LOCKOUT 3	5 #22 WHITE
	6

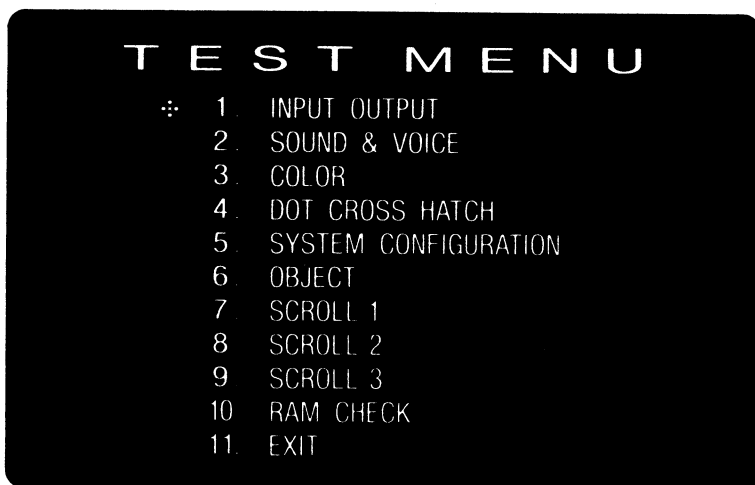
## ABOUT EEP-ROM

This board “Cadillacs and Dinosaurs” is equipped with EEP-ROM and you can change the various settings on screen.

## ABOUT TEST MENU

### TO OPEN THE MENU

- Turn on the main switch. Then push the test switch inside the cabinet and following menu will appear. (\* screen a)



(\* screen a)

### TO SELECT AN ITEM

- Select an item with 1P lever and decide with 1P A button.
- To return to the main menu, push 1P START and 2P START buttons simultaneously.

### TO CLOSE THE MENU

- On the menu screen, select EXIT and push 1P A button.

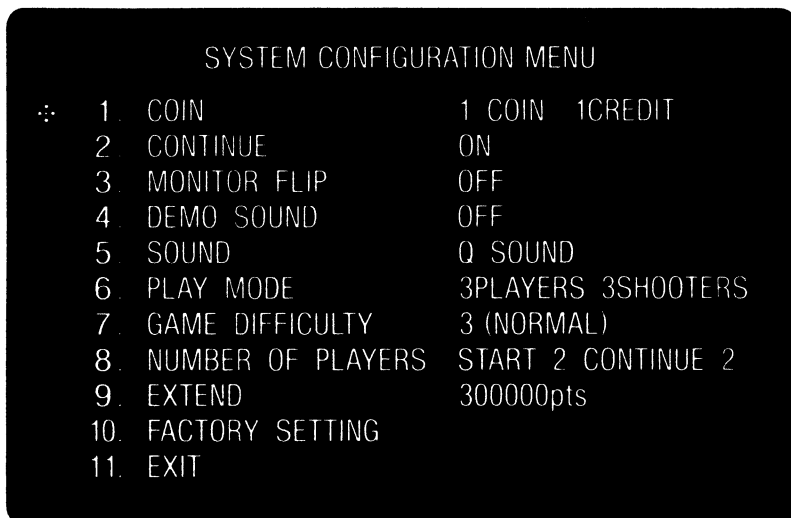
### ITEM DESCRIPTIONS

1. INPUT OUTPUT	Used to test all the input output switches.
2. SOUND & VOICE	Used to change the sound volume, etc.
3. COLOR	Used to adjust the color with color bars.
4. DOT CROSS HATCH	Used to adjust the screen size, the focus and the distortion.
5. SYSTEM CONFIGURATION	Used to change various game play settings.
6-9. CHARACTER TEST	Used to check all the characters.
10. RAM CHECK	Used to test all the RAMs. Main menu appears automatically after the test.

## ABOUT SYSTEM CONFIGURATION

### TO OPEN THE MENU

- On the TEST MENU screen, select SYSTEM CONFIGURATION and push 1P A button. Following menu appears. (\* screen b)



(\* screen b)

### TO CHANGE THE SETTING

- Select an item with 1P lever (UP or DOWN) and change the setting with 1P lever (LEFT or RIGHT). (You can change the setting with 1P A button also)

### TO CLOSE THE MENU

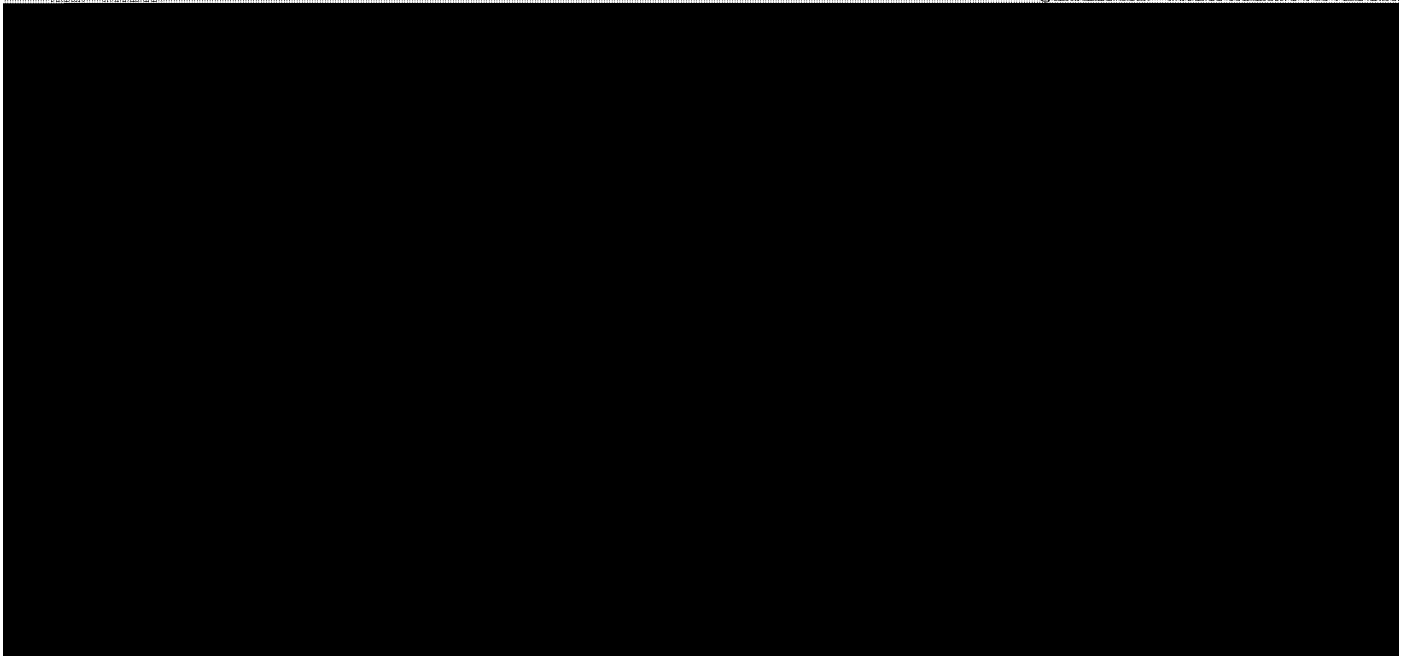
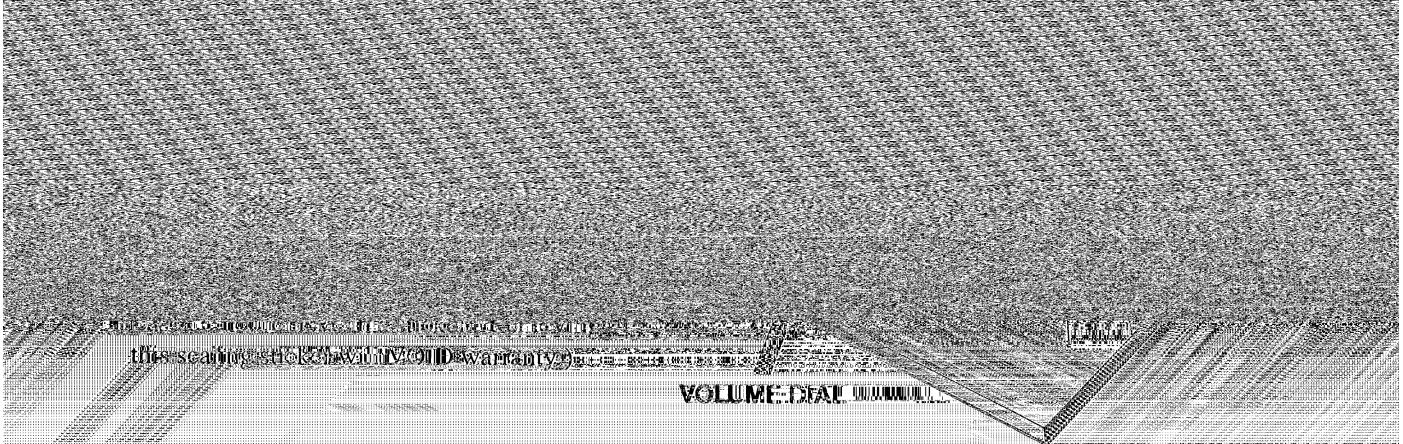
When all the settings are done, select EXIT and push 1P START button to return to the TEST MENU. Your settings are memorized in EEP-ROM.

### ITEM DESCRIPTIONS

1. COIN	Number of coins per play.
2. CONTINUE	With or without continue
3. MONITOR FLIP	Turn over the screen
4. DEMO SOUND	With or without sound in attract mode
5. SOUND	Q SOUND or MONAURAL. Q SOUND is available only with CAPCOM Q SOUND cabinet. FOR OTHER CABINETS, PLEASE SET TO MONAURAL.
6. PLAY MODE	Type of the cabinet.
7. GAME DIFFICULTY	As the number increases, the game play gets harder.
8. NUMBER OF PLAYERS	Number of initial lives.
9. EXTEND	Score points required for 1 up.
10. FACTORY SETTING	To return to the factory setting, select this item and push 1P START button.

# ● SYSTEM CONFIGURATION MENU

1. COIN	<b>1 COIN 1 CREDIT</b>	1 COIN 2 CREDITS	1 COIN 3 CREDITS	1 COIN 4 CREDITS	1 COIN 6 CREDITS			
	2 COINS 1 CREDIT	3 COINS 1 CREDIT	4 COINS 1 CREDIT	2 COINS START 1 COIN CONTINUE	FREE PLAY			
2. CONTINUE	<b>ON</b>	OFF						
3. MONITOR FLIP	ON	<b>OFF</b>						
4. DEMO SOUND	ON	<b>OFF</b>						
5. SOUND	Q SOUND	<b>MONAURAL</b>						
6. PLAY MODE	<b>3 PLAYERS 3 SHOOTERS</b>		3 PLAYERS 1 SHOOTER		2 PLAYERS 1 SHOOTER			
7. GAME DIFFICULTY	0 EXTRA EASY	1 VERY EASY	2 EASY	<b>3 NORMAL</b>	4 HARD	5 VERY HARD	6 EXTRA HARD	7 HARDEST
8. NUMBER OF PLAYERS	START 1 CONTINUE 1	<b>START 2 CONTINUE 2</b>	START 3 CONTINUE 3	START 4 CONTINUE 4	START 1 CONTINUE 2	START 2 CONTINUE 3	START 3 CONTINUE 4	START 4 CONTINUE 5





# HELPFUL HINTS IN CASE OF DIFFICULTY

## PROBLEM/CAUSE-CURE

### No Raster/No Video

- Check A.C. line cord
- Check line fuse
- Check monitor brightness
- Check power switch and/or interlock switch
- Check all solder connections on line filter and transformer
- Check for proper orientation of the PCB connector

### Raster/No Video

- Check all PCB to monitor connections
- Check power supply voltage on PCB

### No Video/Game sounds can be heard

- Check monitor brightness
- Check all PCB to monitor connections

### Wrong Colors

- Monitor needs degaussing
- Check for proper wiring between PCB and monitor
- Check monitor adjustment and adjust if necessary

### Wavy Picture

- Check monitor ground is properly connected to monitor
- Be certain sync inputs are properly connected to monitor
- Check horizontal hold adjustment

### Horizontal/Vertical Roll

- Check horizontal and/or vertical hold adjustments
- Check for proper wiring of sync from PCB to monitor

### No Sound

- Check for -5 volts on edge connector of PCB
- Check volume control potentiometer adjustment
- Check for +12 volts on edge connector of PCB
- Check wiring from PCB to speaker
- Check speaker for low resistance between the “+” and “-” tabs

### Bad Sound

- Check wiring to speaker for bad solder connections
- Check sound with another speaker

### No Switch Input

- Check ground connection to switch/es
- Check wiring between PCB and switch/es for proper connection
- Check switch/es with an ohmmeter to verify proper operation

### Switch Operates Incorrect Function

- Check wiring between PCB and switches for proper orientation
- Check wiring for shorts between switch inputs

### No Coin Meter

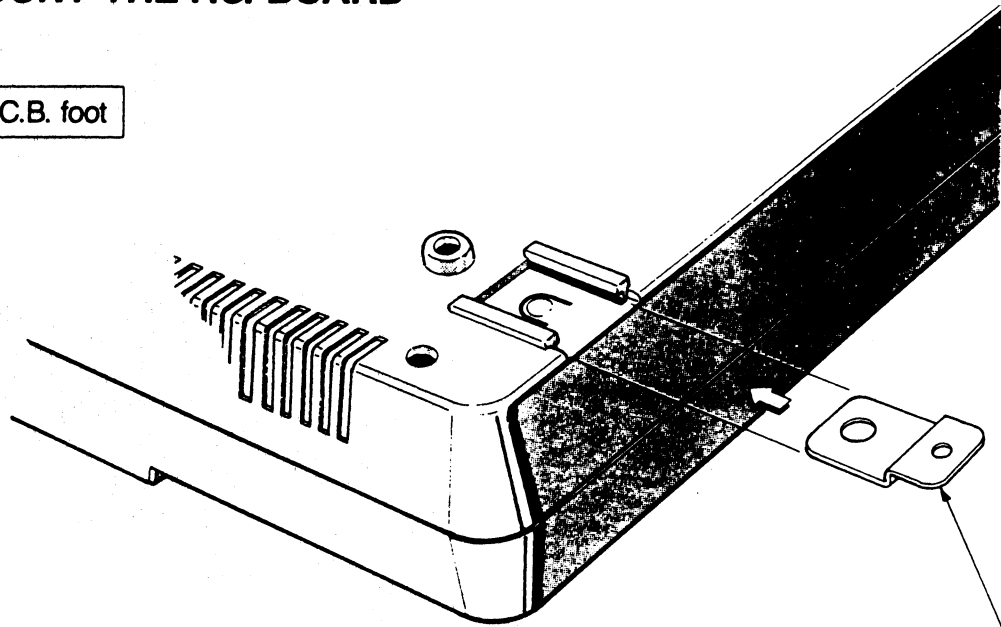
- Check wiring to coin meter
- Check that +5 volts is on “+” side of meter
- Verify a +5 volt meter is used

### When coin switch is made and meter pulses, the screen blanks out and/or game resets

- Verify that a meter with a diode is used
- If no diode is built in meter, a IN4004 can be used across the meter.  
Cathode to “+” side of meter and anode to “-” side of meter

# HOW TO MOUNT THE P.C. BOARD

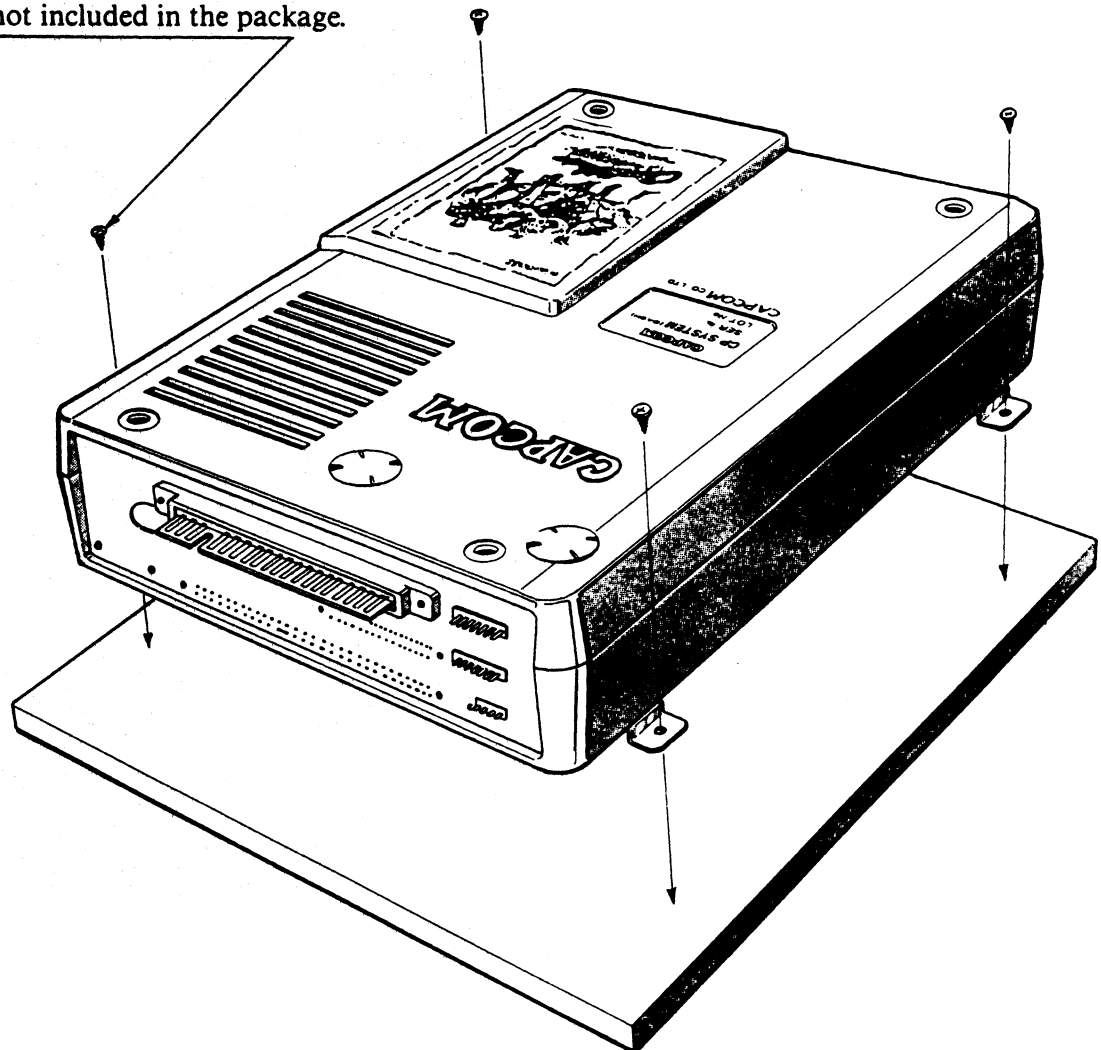
1) Putting the P.C.B. foot



4 pcs. of P.C.B. foot are included in the package.

2) Mounting the P.C.B.

These screws are not included in the package.





**CAPCOM** U.S.A., INC.

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SANTA CLARA, CALIFORNIA 95054

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