PREPARED BY: DATE	SHARP	SPEC No. LC93714
		FILE No.
		ISSUE JUN. 13. 1993
APPROVED BY: DATE	LIQUID CRYSTAL DISPLAY GROUP SHARP CORPORATION	PAGE 24 Pages
		REPRESENTATIVE DIVISION
	SPECIFICATION	■New B/W LCD Project team

DEVICE SPECIFICATION for
Passive Matrix LCD Unit
(640×480 dots)

Model No.

LM64K101

□CUSTOMER'S APPROVAL

DATE _____

BY _____

PRESENTED BY Y. Inoue

Y. Inoue
Chief
New B/W LCD Project team
LCD GROUP
SHARP CORPORATION

3. Mechanical Specifications

Table 1

Parameter	Specifications	Unit
Outline dimensions	200.5 (W) × 141 (H) × 7MAX (D) ‡1‡2	mm
Effective viewing Area	151 (W) × 113.4 (H)	mm
Display format	640 (W) × 480 (H) full dot	—
Dot size	0.21 × 0.21	mm
Dot spacing	0.02	mm
Dot color	Black‡3‡4	—
Background color	White‡3‡4	—
Weight	Approx. 260	g

‡1 Excluded the mounting tabs.

‡2 Excluded the allowance of deformation.

‡3 Due to the characteristics of the LC material, the colors vary with environmental temperature.

‡4 Positive-type display
Displayed data 'H': Dots ON : Black
Displayed data 'L': Dots OFF: White

4. Absolute Maximum Ratings

4-1 Electrical absolute maximum ratings

Table 2

Parameter	Symbol	MIN.	MAX.	Unit	Remark
Supply voltage (Logic)	V_{DD}-V_{SS}	0	6.0	V	Ta=25 °C
Supply voltage (LCD drive)	V_{DD}-V_{EE}	0	28.0	V	Ta=25 °C
Input voltage	V_{IN}	0	V_{DD}	V	Ta=25 °C

5-3 Interface signals

Table 6

○LCD

Pin No	Symbol	Description	Level
1	S	Scan start-up signal	"H"
2	CP1	Input data latch signal	H→L
3	CP2	Data input clock signal	H→L
4	DISP	Display control signal	Display on .."H" off.."L"
5	VDD	Power supply for logic and LCD (+)	
6	VSS	Ground potential	
7	VEE	Power supply for LCD (-)	
8	DU0	Display data signal (Upper half)	H (ON), L (OFF)
9	DU1		
10	DU2		
11	DU3		
12	DL0	Display data signal (Lower half)	H (ON), L (OFF)
13	DL1		
14	DL2		
15	DL3		

○CCFT

Pin No	Symbol	Description	Level
1	GND	Ground line (from Inverter)	-
2	NC	-	-
3	NC	-	-
4	HV	High voltage line (from Inverter)	-

Note) Pin No. and its location are shown in Fig. 10.

○LCD

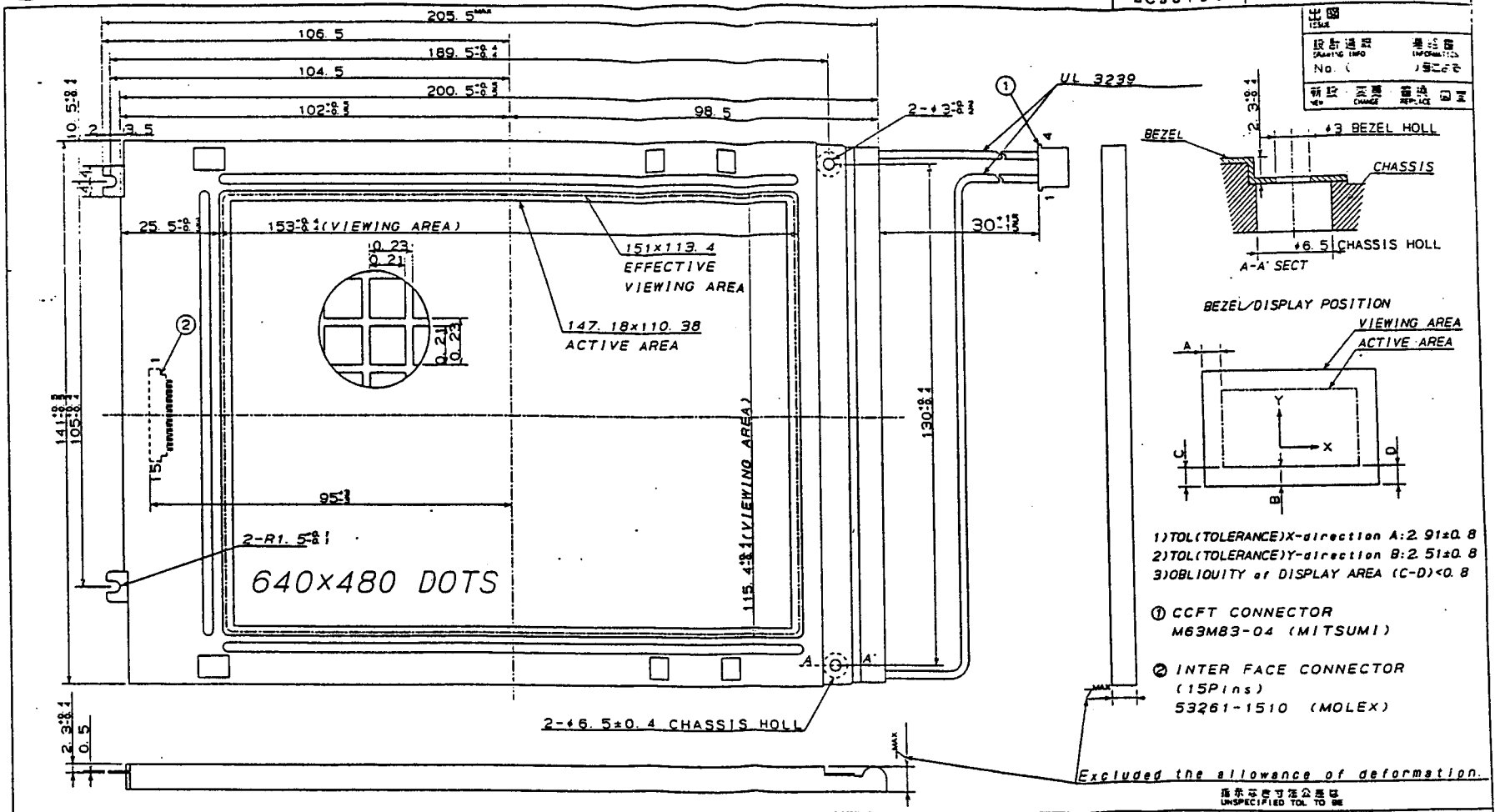
Used connector: 53261-1510 (MOLEX)

Mating connector: 51021-1500 (MOLEX)

○CCFT

Used connector: M63M83-04 (MITSUMI)

Mating connector: M60-04-30-114P (MITSUMI)
M60-04-30-134P (MITSUMI)
M61M73-04 (MITSUMI)



INTER FACE PIN LAYOUT

PIN#	1	2	3	4	5	6	7	8
SYMBOL	S	CP1	CP2	DISP OFF	VDD	VSS	VEE	DU0
PIN#	9	10	11	12	13	14	15	
SYMBOL	DU1	DU2	DU3	DL0	DL1	DL2	DL3	

Fig. 10

MODEL	LM64K101 / LM64P101
NAME	LCD UNIT OUTLINE DIMENSIONS
SYMBOL	
PARTS CODE	
DATE	1993 · MAY · 28 ·
DRAWING No.	
SHARP CORPORATION	シャープ株式会社 液晶(事本) NEW B/W LCD PJT