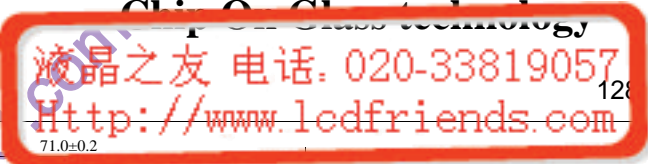
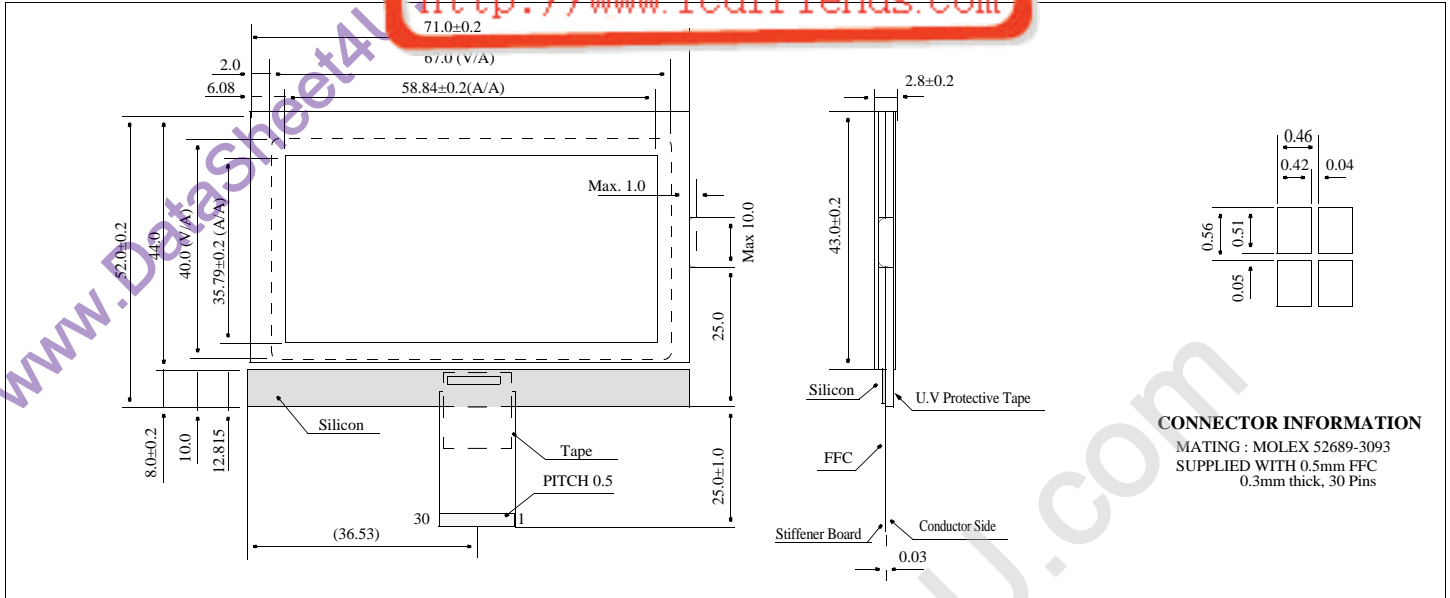


# HDG12864F-3

## Dimensional Drawing



128 X 64 Dots Graphic, Parallel Interface



**CONNECTOR INFORMATION**  
 MATING : MOLEX 52689-3093  
 SUPPLIED WITH 0.5mm FFC  
 0.3mm thick, 30 Pins

### Features

- Back light .....None
- Connection .....Flat Flex Cable
- Options.....STN/FSTN, Transflective or Reflective Polarizer
- Built-in Controller.....Epson/S-MOS SED1565D0B

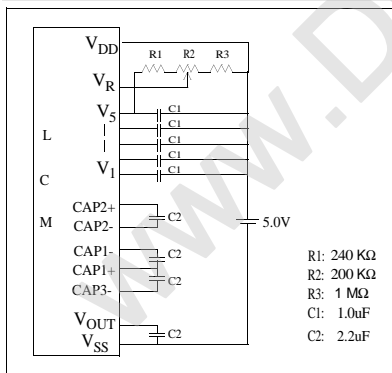
### Physical Data

- Module Size.....71.0W x 52.0H x 2.8T mm
- Viewing Area Size.....67.0W x 40.0H mm
- Dot Pitch.....0.46W x 0.56H mm
- Dot Size.....0.42W x 0.51H mm
- Weight.....22g

### Electrical Characteristics (VDD=5.0±0.25V 25°C)

PARAMETER	SYM	CONDITION	MIN	TYP	MAX	UNIT
POWER SUPPLY VOLT-AGE	V <sub>DD</sub>	TA=25°C	2.7	3.3	5.5	V
INPUT HIGH VOLTAGE	V <sub>IH</sub>	-	0.7V <sub>DD</sub>	-	V <sub>DD</sub>	V
INPUT LOW VOLTAGE	V <sub>IL</sub>	-	-0.3	-	0.2V <sub>DD</sub>	V
POWER SUPPLY FOR LCD	V <sub>DD</sub> -V <sub>L</sub>	TA=25°C	10.5	10.8	11.1	V
POWER SUPPLY CUR-RENT	I <sub>DD</sub>	V <sub>DD</sub> =5V	-	1.7	2.6	mA

### Power Supply



- R1: 240 KΩ
- R2: 200 KΩ
- R3: 1 MΩ
- C1: 1.0μF
- C2: 2.2μF

### Absolute Maximum Ratings

PARAMETER	SYMBOL	MIN	MAX	UNIT
SUPPLY VOLTAGE	V <sub>DD</sub> -V <sub>SS</sub>	-0.3	5.5	V
SUPPLY VOLTAGE FOR LCD	V <sub>DD</sub> -V <sub>L</sub>	0	16.0	V
INPUT VOLTAGE	V <sub>IN</sub>	-0.3	V <sub>DD</sub>	V
OPERATING TEMPERATURE	T <sub>OP</sub>	0	50	°C
STORAGE TEMPERATURE	T <sub>STG</sub>	-20	70	°C

### Pin Connections

PIN NO.	SYMBOL	FUNCTION
1	V <sub>DD</sub>	Power supply for Logic
2	RES	Reset Signal
3	A0	Control/Data Select Signal
4	R/W	Signal to select Read or Write
5	E	Enable Clock Input
6 - 13	D0-D7	Data Bus
14	V <sub>DD</sub>	Power supply for Logic
15	V <sub>SS</sub>	Ground
16	VOOUT #	DC/DC Converter Output
17	CAP3+	DC/DC Voltage Converter capacitors
18	CAP1+	
19	CAP1-	
20	CAP2-	
21	CAP2+	
22 - 26	V1-V5	LCD Driver Supply Voltages
27	VR	Voltage Adjustment Pin
28	V <sub>DD</sub>	Power supply for Logic
29	IRS	H : Use Internal Resistor L : Not Use Internal Resistor
30	V <sub>DD</sub>	Power supply for Logic

#Has built-in inverter for negative power supply