

***ME* DISPLAYS**

SPECIFICATIONS

FOR

LCD MODULE

CGM12232

MICRO ELECTRONICS CORPORATION

3375 Scott Blvd. Suite 222 Santa Clara CA 95054

Tel: 408-988-1101 Fax: 408-988-7626

Email: micro@microelect.com

[Http://www.microelect.com](http://www.microelect.com)

- FEATURES**

Number of Dots 122 X 32
Duty Cycle 1/32 Duty, 1/6 Bias
Power Supply 5V
Options LED/EL Backlights, TN/STN

- MECHANICAL PARAMETERS**

Module Size 65.8W x 27.2H x 8.4T mm
Viewing Area 54.8W x 18.3H mm
Active Area 48.76W x 15.32H mm

- ABSOLUTE MAXIMUM**

Item	Symbol	Min.	Max	Unit
Supply Voltage for Logic	V_{DD}	0.0	+7.0	V
Supply Voltage for LCD Drive	V_{LCD}	0.0	+13.0	V
Input Voltage	V_i	0.0	V_{DD}	V
Operating Temperature	T_a	0	+50	C
Storage Temperature	T_{stg}	-20	+70	C

- ELECTRICAL CHARACTERISTICS**

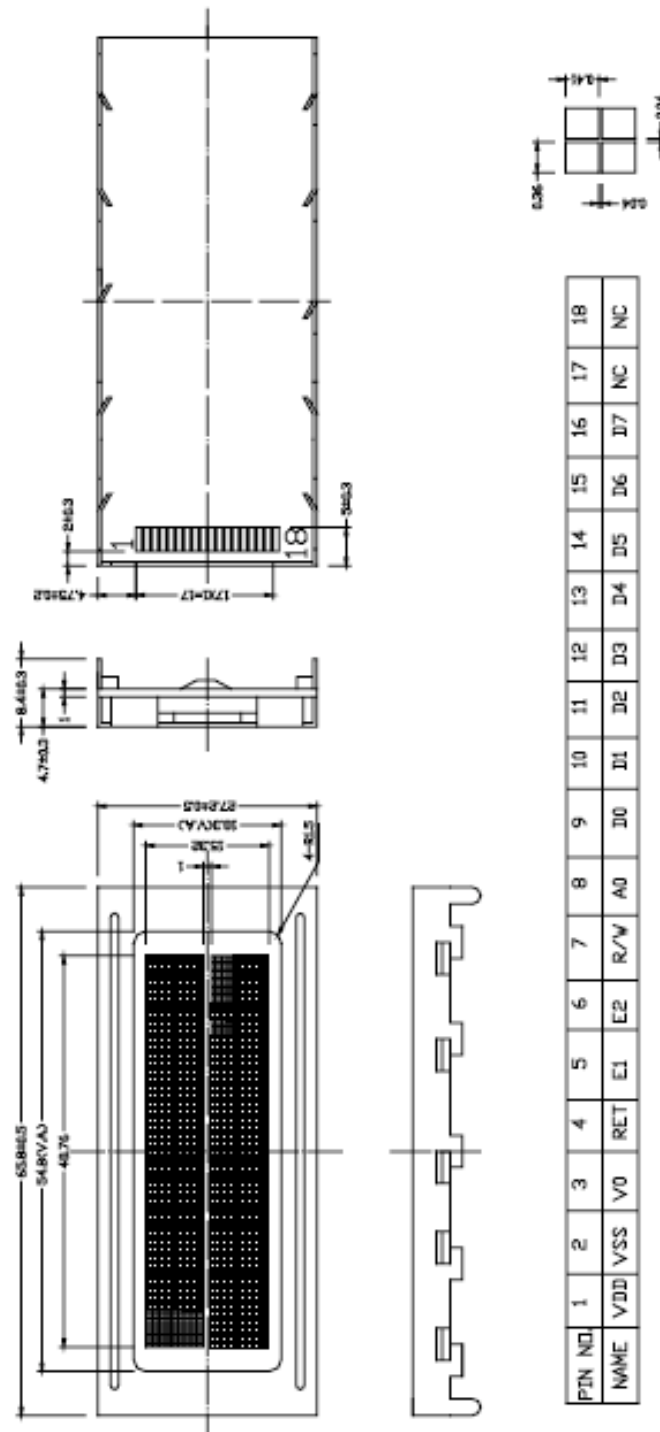
($T_a=25$; $V_{DD}=5.0V$ 5%; $V_{SS}=0V$; Otherwise Specified)

Item	Symbol	Condition	Min	Typ	Max	U
Power Supply Voltage for Logic	V_{DD}	--	4.5	5.0	5.5	V
Operating Voltage for LCD	$V_{DD} - V_{SS}$	--	--	5.0	--	V
Input "High" Voltage	V_{ih1}	--	2.0	--	V_{DD}	V
Input "Low" Voltage	V_{il1}	--	0	--	0.8	V
Power Supply Current	I_{DD}	$V_{DD} = 5.0V$	--	16	25	mA

No.	Symbol
1	V_{DD}
2	V_{SS}
3	V_O
4	RET
5	E1
6	E2
7	R/W
8	A_0
9	D0

No.	Symbol
10	D1
11	D2
12	D3
13	D4
14	D5
15	D6
16	D7
17	A (NC)
18	K (NC)

• DIAGRAM CGM12232



• TIMING CHARACTERISTICS (68 family MPU)

($V_{DD}=5.0V$ 5%; $V_{SS}=0V$; $T_A=25$)

Item	Symbol	Min	Max	Unit
System Cycle Time	t_{CYC6}	1000	--	ns
Address Set-up time	t_{AW6}	20	--	ns
Address Hold Time	t_{AH6}	10	--	ns
Data Set-up Time	t_{DS6}	80	--	ns
Data Hold Time	t_{DH6}	10	--	ns
Output Disable Time	t_{OH6}	10	60	ns
Access Time	t_{AAC6}	--	90	ns
Enable Pulse Width (Read)	t_{EW}	100	--	ns
Enable Pulse Width (Write)	t_{EW}	8	--	ns

• TIMING DIAGRAMS (68 family MPU)

