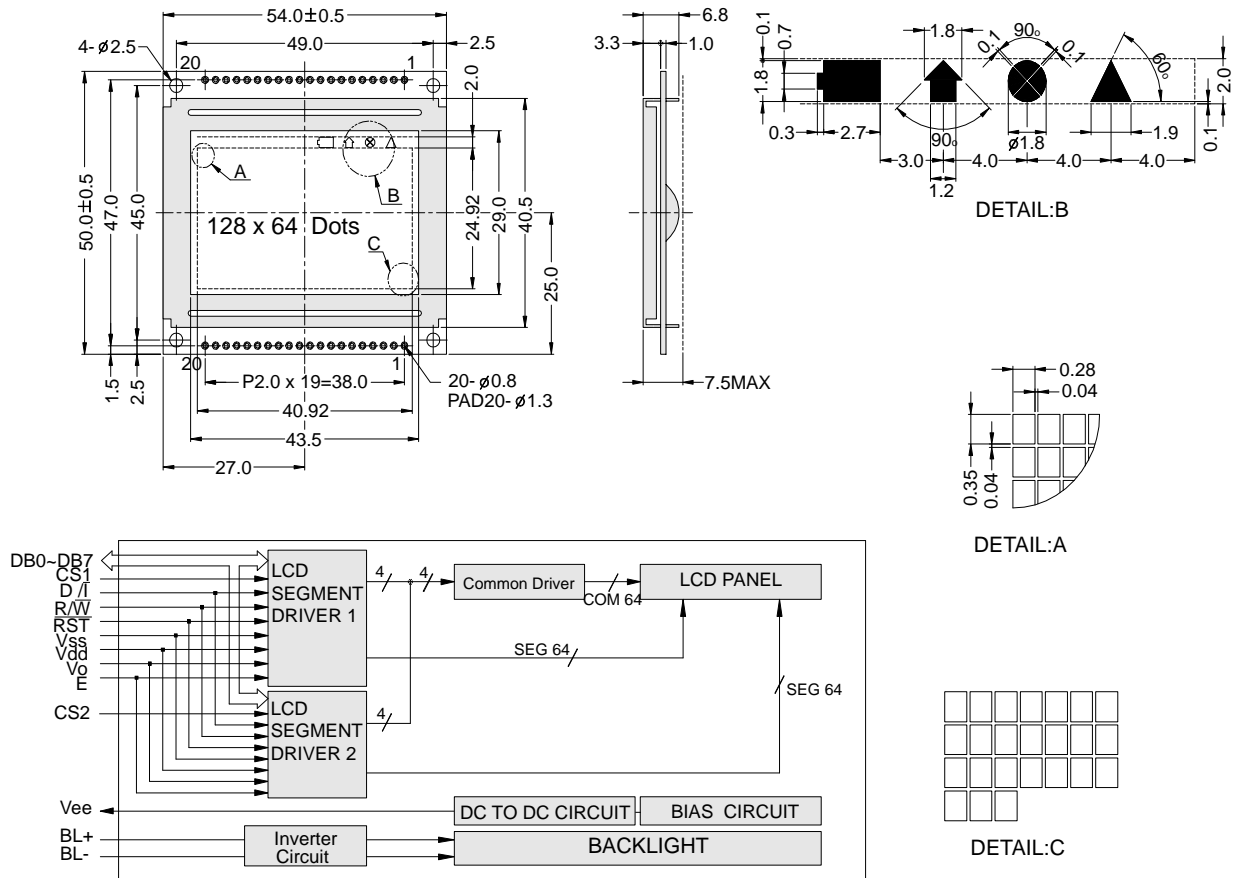


OUTLINE DIMENSION & BLOCK DIAGRAM



The tolerance unless classified ± 0.3mm

MECHANICAL SPECIFICATION			
Overall Size	54.0 x 50.0	Module	H2 / H1
View Area	43.5 x 29.0	W/O B/L	3.3 / 6.8
Dot Size	0.28 x 0.35	EL B/L	3.3 / 6.8
Dot Pitch	0.32 x 0.39	LED B/L	- / -

PIN ASSIGNMENT		
Pin no.	Symbol	Function
1	Vss	Power supply(GND)
2	Vdd	Power supply(+)
3	Vo	Contrast Adjust
4	D/I	Command / data select
5	R/W	Data read / write
6	E	Chip enable signal
7-14	DB0-DB7	Data bus line
15	CS1	Chip select driver 1
16	CS2	Chip select driver 2
17	RST	Reset
18	Vee	Negative voltage output
19	BL+	Enable (on/off) for EL B/L
20	BL-	No connection

ABSOLUTE MAXIMUM RATING							
Item	Symbol	Condition	Min.	Max.	Units		
Supply for logic voltage	Vdd-Vss	25°C	-0.3	7.0	V		
LCD driving supply voltage	Vdd-Vee	25°C	-0.3	19.0	V		
Input voltage	Vin	25°C	-0.3	Vdd-0.3	V		
ELECTRICAL CHARACTERISTICS							
Item	Symbol	Condition	Min.	Typical	Max.	Units	
Power supply voltage	Vdd-Vss	25°C	4.5	-	5.5	V	
LCD operation voltage	Vop	Top	N	W	N	W	V
		-20°C	-	-	-	-	V
		0°C	-	-	-	-	V
		25°C	-	-	8.5	-	V
		50°C	-	-	-	-	V
70°C	-	-	-	-	V		
LCM current consumption (No B/L)	Idd	Vdd=5V	-	2.5	5	mA	
Backlight current consumption	LED/edge	VB/L=4.2V	-	-	-	mA	
	LED/array	VB/L=4.2V	-	-	-	mA	

REMARK

LCD option: STN, TN, FSTN

Backlight Option: LED,EL Backlight feature, other Specs not available on catalog is under request.

