

SPECIFICATION FORM**FEATURES**

- ◇ 38.00MM×56.00MM OUTLINE
- ◇ 1.8 INCHES (45.00MM) DIGIT HEIGHT
- ◇ SINGLE DIGIT
- ◇ SINGLE COLOR
- ◇ HIGH BRIGHTNESS
- ◇ EASY ASSEMBLY
- ◇ SOLID STATE RELIABILITY

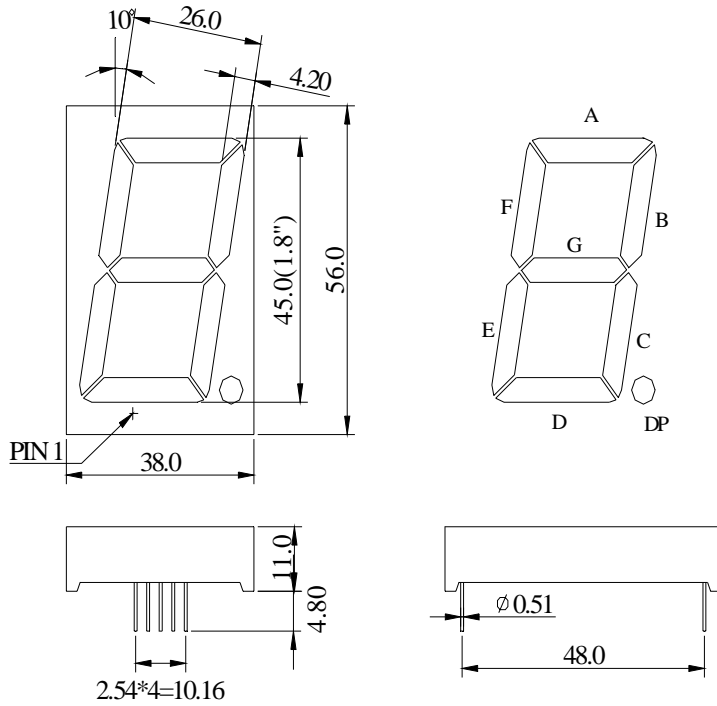
DESCRIPTION

The REC-S18102CSR is a 1.8 inches (45.00mm) digit height, 38.00mm×56.00mm outline, single color, single digit, common cathode numeric display. This display utilizes red LED chips fabricated from GaAlAs epiwafer on GaAs substrate grown by liquid phase epitaxy. The devices have black face and white segments.

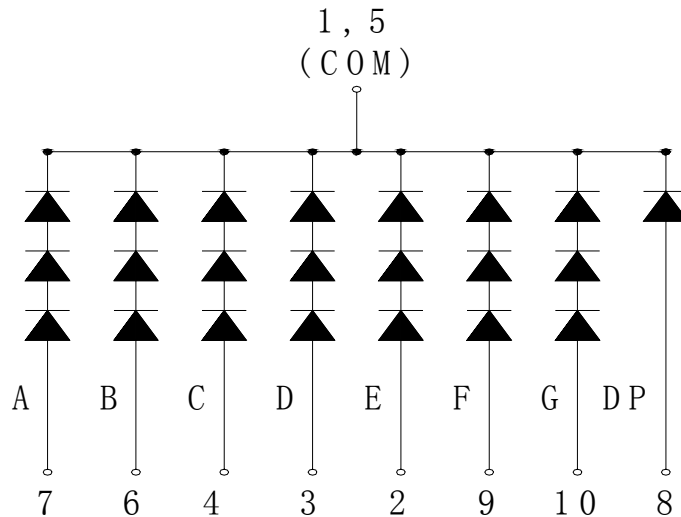
DEVICE

PART NO.	EMITTING COLOR	DESCRIPTION
REC-S18102CSR	Super-Red	Black face, White Segments.

PACKAGE DIMENSION



INTERNAL CIRCUIT DIAGRAM



PIN CONNECTION

PIN NO.	CONNECTION	PIN NO.	CONNECTION
1	Cathode	6	Anode B
2	Anode E	7	Anode A
3	Anode D	8	Anode DP
4	Anode C	9	Anode F
5	Anode	10	Anode G

ABSOLUTE MAXIMUM RATING AT $T_A=25^\circ\text{C}$

PARAMETER	SYMBOL	MAXIMUM	UNIT
Power Dissipation per dot	P_{AD}	180	mW
Peak Forward Current per dot (1/10 duty cycle, 0.1ms pulse width)	I_{PF}	80	mA
Continuous Forward Current per dot	I_{AF}	20	mA
Reverse Voltage per dot	V_R	15	V
Operating Temperature Range, T_{opr}	- 25° C to + 80° C		
Storage Temperature Range, T_{stg}	- 30° C to + 85° C		
Solder Temperature : 1 / 16 inch below seating plane for 3 seconds at 260° C			

ELECTRO - OPTICAL CHARACTERISTICS AT $T_A=25^\circ\text{C}$

PARAMETER	UNIT	MIN	TYPE	MAX
Luminous Intensity per chip, I_V ($I_F=20\text{mA}$)	mcd	10	12	13
Peak Emission Wavelength, λ_p ($I_F=20\text{mA}$)	nm		645	
Special Line Half-Width, $\Delta\lambda$ ($I_F=20\text{mA}$)	nm		20	
Forward Voltage per chip, V_F ($I_F=20\text{mA}$)	V	1.6	1.8	2.1
Reverse Current per chip, I_R , ($V_R=5\text{V}$)	μA			100
Luminous Intensity Matching Ratio, I_{V-m} ($I_F=20\text{mA}$)				2 : 1