LM46058A/B Series – 4.60 inch 5x8 Dot Matrix LED Display

ATTENTION
OBSERVE PRECAUTIONS
FOR HANDLING
ELECTROSTATIC
DISCHARGE
SENSITIVE
DEVICES

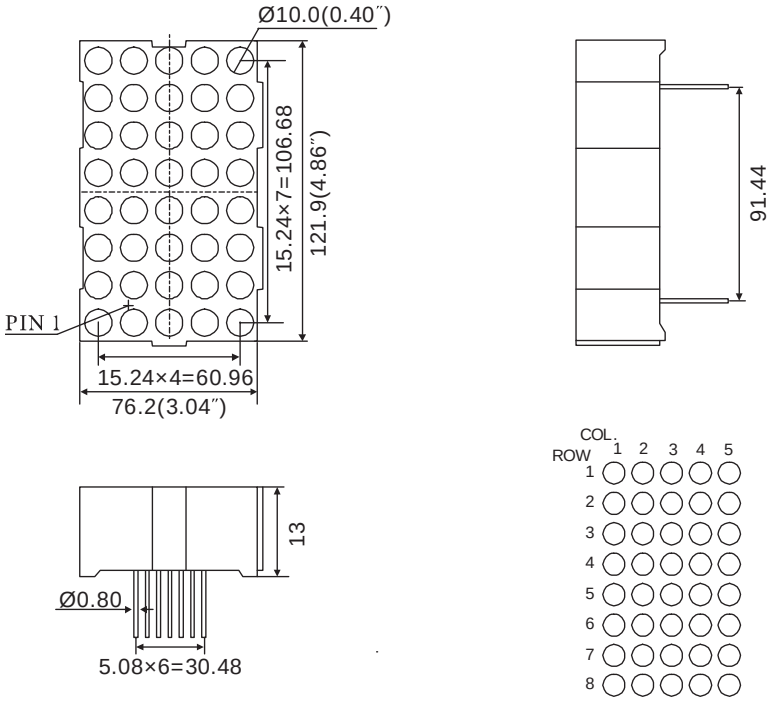
Features

- 121.90mm (4.60 inch) digit high
- Dot size: Diameter 10.00 mm
- Pitch: 15.24 mm
- Wide viewing angle
- Range of emitted colors
- I.C. compatible
- Low power consumption
- White dot, grey or black face
- RoHS compliant

Available options

- Alternative emitting luminosity:
  Standard or high brightness version
- Alternative emitted color
- Alternative dot color
- Alternative face
- Both CC and CA versions are available
- Cropped terminal pins

Package Dimensions

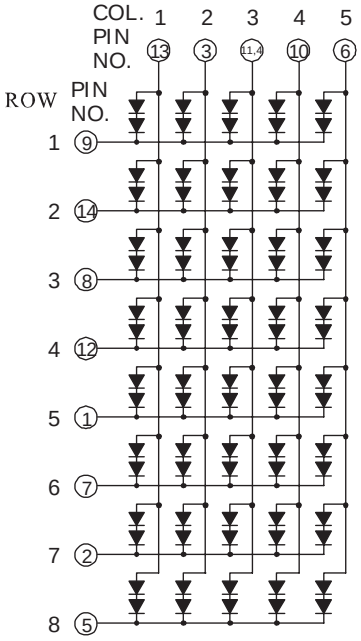


Notes:

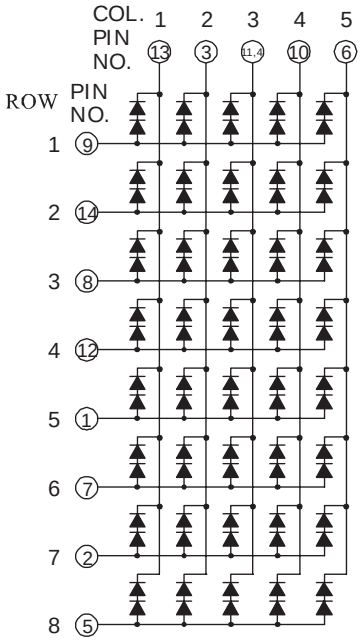
1. All dimensions are in millimeters (inches), Tolerance is ± 0.25mm (0.01inch) unless other wise noted.
2. Specifications are subject to change without notice.
3. The gap between the reflector and PCB shall not exceed 0.25mm.

Internal Circuit Diagram

LM46058A (Common Cathode Row)



LM46058B (Common Anode Row)



Selection Guide

Part No.		Chip			Iv@IF=20mA	
Common Cathode Row	Common Anode Row	Material	Color	WLD	One Dot	
					Min.	Typ.
LD46058AR	LD46058BR	GaAlAs	Super Red	640	12	15
LD46058AD	LD46058BD	GaAlAs	Hi-Red	640	27	37.5
LD46058AO	LD46058BO	GaAsP	Orange	625	10.5	13.5
LD46058AY	LD46058BY	GaAsP	Yellow	588	12	15
LD46058AG	LD46058BG	GaP	Green	568	10.5	13.5
LD46058AUR	LD46058BUR	AlGaInP	Ultra Red	640	45	67.5
LD46058AUO	LD46058BUO	AlGaInP	Ultra Orange	625	67.5	90
LD46058AUA	LD46058BUA	AlGaInP	Ultra Amber	605	45	67.5
LD46058AUY	LD46058BUY	AlGaInP	Ultra Yellow	595	45	67.5
LD46058AUG	LD46058BUG	AlGaInP	Ultra Green	573	45	67.5
LD46058APG	LD46058BPG	InGaN	Pure Green	525	180	450
LD46058AUB	LD46058BUB	InGaN	Ultra Blue	470	45	67.5
LD46058AUW	LD46058BUW	SMD	Ultra White	\	150	180
Unit:	\	\	\	nm	mcd	mcd

Electrical Characteristics & Absolute Maximum Ratings

Parameter		Electrical optical Characteristics[1]			Absolute Maximum Ratings[1]		
Emitted Color		V_F@ IF=20mA[2]		Reverse Current VR=5V	Power Dissipation	DC Forward Current	Peak Forward Current[3]
		Typ.	Max.				
Super Red	Per Dot	3.6	4.4	50	120	25	100
Hi-Red	Per Dot	3.6	4.4	50	120	25	100
Orange	Per Dot	4.2	5	50	160	30	100
Yellow	Per Dot	4.2	5	50	160	30	100
Green	Per Dot	4.4	5	50	160	30	100
Ultra Red	Per Dot	3.8	5.2	50	120	30	100
Ultra Orange	Per Dot	4	5.2	50	130	30	100
Ultra Amber	Per Dot	4	5.2	50	130	30	100
Ultra Yellow	Per Dot	4	5.2	50	130	30	100
Ultra Green	Per Dot	4.2	5.2	50	150	30	100
Pure Green	Per Dot	7	8	50	220	30	100
Ultra Blue	Per Dot	7	8	50	240	30	100
Ultra White	Per Dot	7	8	50	240	30	100
Unit:	\	V	V	uA	mW	mA	mA

Notes:

1. At Ta = 25 °C.

2. Forward voltage at forward current = 20mA.

3. Peak forward current at 1/10 Duty Cycle, 0.1ms Pulse.