



591 SERIES

Prism® CBI®

2mA Low Current Surface Mount LED
ROUND OR SQUARE LENS

ABSOLUTE MAXIMUM RATINGS (TA= 25°C)

PARAMETER	20	23	24	25
COLOR	Red	Green	Yellow	AlInGaP Orange
POWER DISSIPATION	50mW	50mW	50mW	50mW
FORWARD DC CURRENT	20mA	20mA	20mA	20mA
PEAK FORWARD CURRENT (t ≤ 10 μs, D=0.005)	100mA	100mA	100mA	100mA
OPERATING TEMPERATURE	-40°C To +100°C	-40°C To +100°C	-40°C To +100°C	-40°C To +100°C
STORAGE TEMPERATURE	-40°C To +100°C	-40°C To +100°C	-40°C To +100°C	-40°C To +100°C
SOLDERING TEMPERATURES IR REFLOW FOR LEAD FREE SOLDERING, RoHS	260°C (+0°C / -5°C) For 30 Seconds			

OPERATING CHARACTERISTICS (TA= 25°C)

PARAMETER	PART NO.	COLOR	MIN	TYP	MAX	UNITS	TEST COND.
Forward Voltage V_F	20	Red	1.7	1.8	2.2	V	$I_F=2mA$
	23	Green	1.7	1.8	2.2		
	24	Yellow	1.7	1.8	2.2		
	25	AlInGaP Orange	1.7	1.8	2.2		
Reverse Voltage V_R	20	Red		12		V	$I_R=10\mu A$
	23	Green		12			
	24	Yellow		12			
	25	AlInGaP Orange		12			
Dominant Wavelength λ_{Dom}	20	Red	624	630	636	nm	
	23	Green	566	570	575		
	24	Yellow	580	587	595		
	25	AlInGaP Orange	600	606	609		
Luminous Intensity I_v Round (Square) Lens	20	Red	6 / -	11 / 40 (30 / 80)	16 / -	mcd	$I_F=2mA /$ $I_F=10mA$
	23	Green	3 / -	5 / 22 (10 / 40)	8 / -		
	24	Yellow	8 / -	14 / 60 (40 / 140)	20 / -		
	25	AlInGaP Orange	9 / -	16 / 70 (55 / 150)	24 / -		
Viewing Angle (2θ 1/2) Round (Square) Lens	20	Red		50 (40)		deg.	
	23	Green		50 (40)			
	24	Yellow		50 (40)			
	25	AlInGaP Orange		50 (40)			

Dialight Corporation

1501 Route 34 South • Farmingdale, NJ 07727 USA

Tel: (1) 732-919-3119 • Fax: (1) 732-751-5778 • www.dialight.com



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