

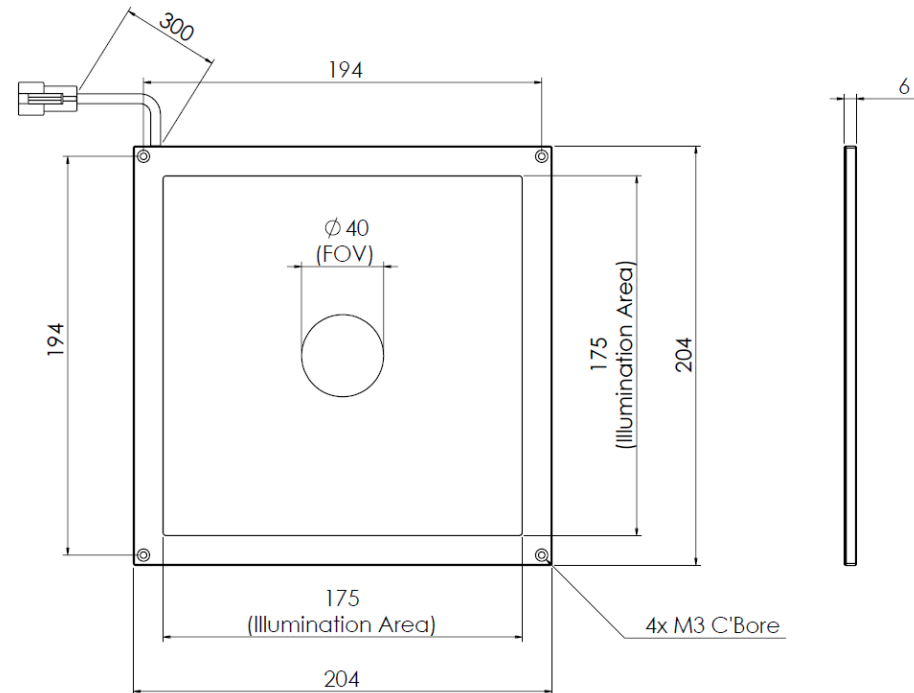
Diffuse Back Light

FLFL-Si175-C40

Lighting Picture



Lighting Dimension



Mechanical Information	
Casing Material	Aluminium
Storage Temperature Range	Temp 0-35°C, Humidity 20-85%
Weight	390 g
Lighting Dimension WxLxH	204.0 x 204.0 x 6.0 mm
IP Rating	N/A

Unit in mm



FLFL-Si175-C40

Asia Office: www.falcon-illumination.com, Europe Office: www.falcon-illumination.de
Form No: SOP-7.3.3 / Rev 1.1 / Date: 2015.01-05


Optical Information					
Led Color	IR	RED (R24)	GREEN (G)	BLUE (B)	WHITE (W)
Wavelength	850nm	626nm	525nm	470nm	xy=(0.31,0.32)
Illumination (number of LED)	140	140	140	140	140
Illumination Area	175 x 175 mm				
Led Package	SMD				
Eye Safety (EN 62471:2008)	Exempt Group				

Electrical Information	IR	R24	G/B/W
Lighting Supply Voltage (constant voltage mode)	12V ± 2%	24V ± 2%	
Supply Ripple Voltage	≤ Vs ± 5%		
Reverse Battery Protection	YES		
Lighting Forward voltage, (for zero internal resistor value)	9.8 V	22.0 V	21.0 V
Continuous Current	0.50A (MAX)	0.56A (MAX)	0.60A (MAX)
Power Consumption	6.00 W	13.44 W	14.40 W
Lighting casing temperature, Operating after 60 minutes	38°C	40°C	43°C

Strobe Mode Specification	IR	R24	G/B/W
Max. Lighting Supply Voltage (Constant voltage power supply)	Pulsing at 12VDC to 24VDC, 0-10% Duty Cycle Recommended at 15VDC	Pulsing at 24VDC to 48VDC, 0-10% Duty Cycle Recommended at 36VDC	
Pulse Current, (Max. 10msec) (Constant current power supply)	1.25A (MAX)	1.40A (MAX)	1.50A (MAX)
Max. Trigger Pulse Duration, msec	10 msec		
Duty Cycle	0 - 10%		

Ordering Option	
FLFL-Si175-C40-R24/IR/G/B/W	With resistor to limit the current (Use in both constant voltage/ current power supply)
FLFL-Si175-C40-R24/IR/G/B/W-0	Internal resistor value= zero ohms (only use in constant current power supply)



Connection		IR			R24/G/B/W		
Connector Type (Default):		JST SMR-02V 			JST SMR-03V 		
	Pin	Signal	Cable Color	Pin	Signal	Cable Color	
	1	LED +	Black/White	1	LED +	Black/White	
	2	LED -	Black	2	N.C.	---	
				3	LED -	Black	
Cable Length out from lighting:		300 mm					

Additional Information	R24/IR/G/B/W
Additional Cooling Method	Attached to machine part for better heat dissipation
Life span in continuous mode,	20,000 hours
Life span in strobe light mode Lighting drop to 50% intensity (at 25°C ambient temperature)	50,000 hours
Intensity Controller Selection	PSA-Series, PSD-Series, LIC-Series
CE Conformity	YES
RoHS Compliance	YES
ISO 9001:2008	SG11/03751

Application	
Optimal Working Distance	10-100 mm



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