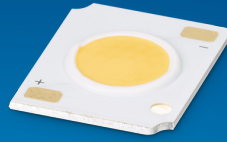


PHILIPS

Fortimo

LED

Fortimo LED SLM
1202 L06 1215 G6



Datasheet

Experience bright and vivid colors

Fortimo LED SLM 1202 L06 1215 G6

Fortimo LED SLM Gen6 continues to focus on the combination of Quality of Light and performance. By offering the CoB separate from the holder, even more flexibility in possible system combinations and specifications is achieved. This results in an extensive portfolio of lumen ranges, CCTs and spectra. Please also check the online Easy Design-in Tool for your perfect system combination (www.easydesignintool.com)

Key features and benefits

- Best quality of light available for all applications
- Extensive range of CCT's
- Small LES for narrow beam angles and small reflector designs
- Flexibility to select a different lumen output between 800 and 10000 lm
- State of the art Chip-on-Board (CoB) technology, enabling highest system efficacy
- System proposition (CoB + Holder + driver)
- Flexibility to optimize luminaire performance (lm/W or high lm output)
- Xitanium window drivers with SimpleSet for maximum flexibility
- Mini drivers for smallest possible luminaire designs
- Five years system warranty with over 50,000 hours lifetime
- Three dedicated product lines:
 - SLM Gen6 Premium White
 - SLM Gen6 CrispWhite
 - SLM Gen6 Food

December 2016

Ordering data

Commercial product name	EOC	12NC	Box quantity
Fortimo SLM C 827 1202 L06 1215 G6	8718696 651377 00	9290 014 53106	20
Fortimo SLM C 830 1202 L06 1215 G6	8718696 651391 00	9290 014 53206	20
Fortimo SLM C 835 1202 L06 1215 G6	8718696 651414 00	9290 014 53306	20
Fortimo SLM C 840 1202 L06 1215 G6	8718696 651438 00	9290 014 53406	20
Fortimo SLM C 927 1202 L06 1215 G6	8718696 651520 00	9290 014 53706	20
Fortimo SLM C 930 1202 L06 1215 G6	8718696 651544 00	9290 014 53806	20

Not all products are globally available by default.

Please contact your local Philips Lighting representative for local availability.

Drive currents

Parameter	Nominal*	Life**	Max***	Unit
Fortimo LED SLM 1202 L06 1215 G6	200	280	340	mA

Module temperatures

Parameter	Nominal*	Life**	Max***	Unit
T _c (case temperature at T _c point)	85	85	95	°C

* Nominal value at which typical performance is specified

** Value at which life time is specified

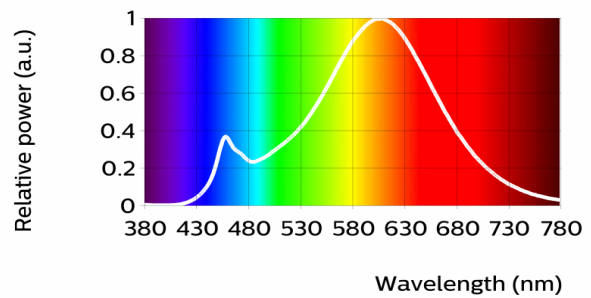
*** Maximum value for safe operation, do not operate above this value

Optical characteristics - table per color (CCT)

Fortimo SLM C 827 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	780	870	950	lm
Module efficacy		125		lm/W
Correlated color temperature (CCT)		2700		K
Color coordinates (CIEx, CIEy)		(0.458, 0.410)		-
Color consistency			3	SDCM
CRI	80	82		
Photobiological safety			RG1	
Energy efficiency label		A++		

Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5

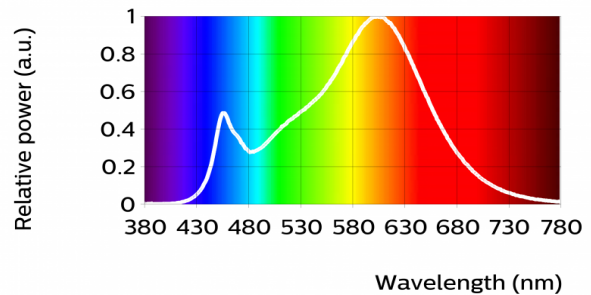


R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
79	92	94	76	79	90	82	59	12	82	72	73	82	97	

Fortimo SLM C 830 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	820	910	1000	lm
Module efficacy		132		lm/W
Correlated color temperature (CCT)		3000		K
Color coordinates (CIEx, CIEy)		(0.434, 0.403)		-
Color consistency			3	SDCM
CRI	80	82		
Photobiological safety			RG1	
Energy efficiency label		A++		

Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5

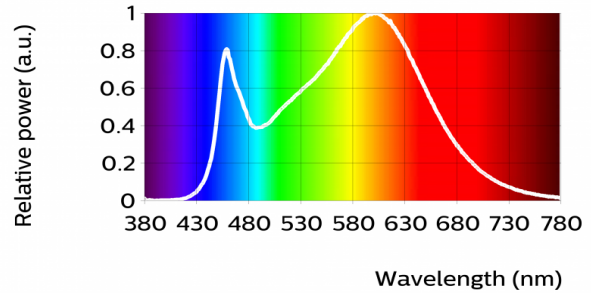


R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
83	94	93	80	84	94	81	59	12	87	80	76	86	97	

Fortimo SLM C 835 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	830	930	1020	lm
Module efficacy		134		lm/W
Correlated color temperature (CCT)		3500		K
Color coordinates (CIEx, CIEy)		(0.407, 0.392)		-
Color consistency			3	SDCM
CRI	80	82		
Photobiological safety			RG1	
Energy efficiency label		A++		

Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5

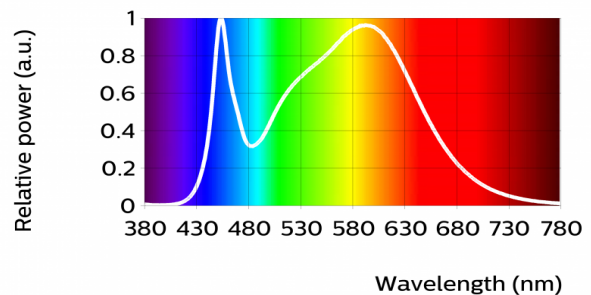


R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
86	96	93	80	85	94	83	65	22	90	79	70	89	97	

Fortimo SLM C 840 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	840	940	1030	lm
Module efficacy		136		lm/W
Correlated color temperature (CCT)		4000		K
Color coordinates (CIEx, CIEy)		(0.382, 0.380)		-
Color consistency			3	SDCM
CRI	80	82		
Photobiological safety			RG1	
Energy efficiency label		A++		

Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5

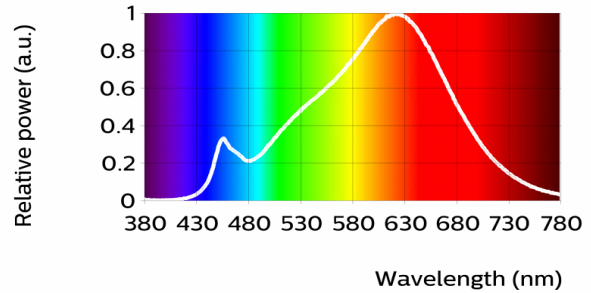


R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
84	96	91	77	83	93	81	62	13	90	77	67	88	96	

Fortimo SLM C 927 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	650	720	790	lm
Module efficacy		104		lm/W
Correlated color temperature (CCT)		2700		K
Color coordinates (CIEx, CIEy)		(0.458, 0.410)		-
Color consistency			3	SDCM
CRI	90	92		
Photobiological safety			RG1	
Energy efficiency label		A++		

Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5

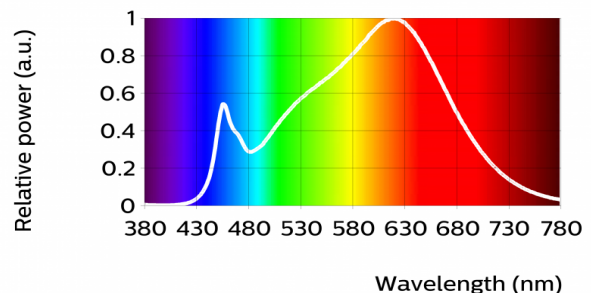


R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
94	98	98	92	93	97	91	81	60	94	93	83	95	100	

Fortimo SLM C 930 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Luminous flux	670	750	820	lm
Module efficacy		108		lm/W
Correlated color temperature (CCT)		3000		K
Color coordinates (CIEx, CIEy)		(0.434, 0.403)		-
Color consistency			3	SDCM
CRI	90	92		
Photobiological safety			RG1	
Energy efficiency label		A++		

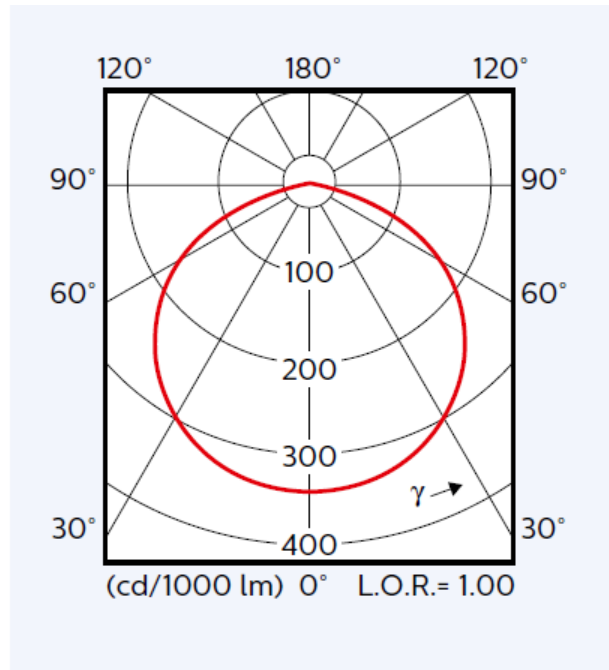
Measurement precision for flux +/- 5%. Measurement precision for efficacy +/- 6%. Measurement precision for x, y +/- 0.005. Measurement precision for CRI 1.5



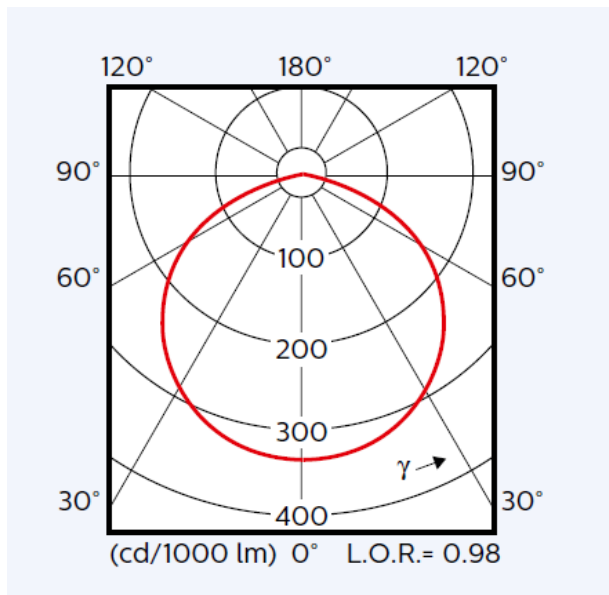
R1	R2	R3	R4	R5	R6	R7	R8	R9	R10	R11	R12	R13	R14	R15
94	98	99	92	93	96	91	83	62	94	92	79	95	99	

Beam shape

Bare CoB



CoB with a poke-in holder



Electrical characteristics

[Fortimo SLM C 827 1202 L06 1215 G6](#)

[Fortimo SLM C 830 1202 L06 1215 G6](#)

[Fortimo SLM C 835 1202 L06 1215 G6](#)

[Fortimo SLM C 840 1202 L06 1215 G6](#)

Parameter	Min	Typ	Max	Unit
Forward voltage		34.5	36.9	V
Power consumption		6.9	7.4	W
Thermal power		4.1		W

Measurement precision for Vf +/- 3%. Measurement precision for power +/- 3.3%

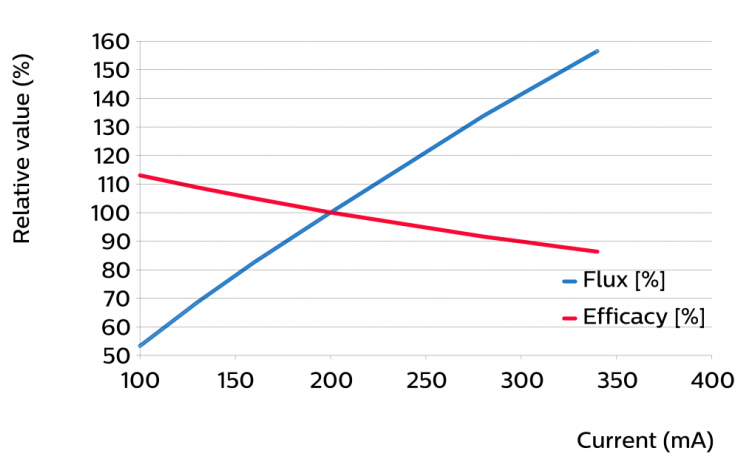
Parameter	Min	Typ	Max	Unit
Forward voltage		34.5	37.0	V
Power consumption		6.9	7.4	W
Thermal power		4.4		W

Measurement precision for Vf +/- 3%. Measurement precision for power +/- 3.3%

Tuning information

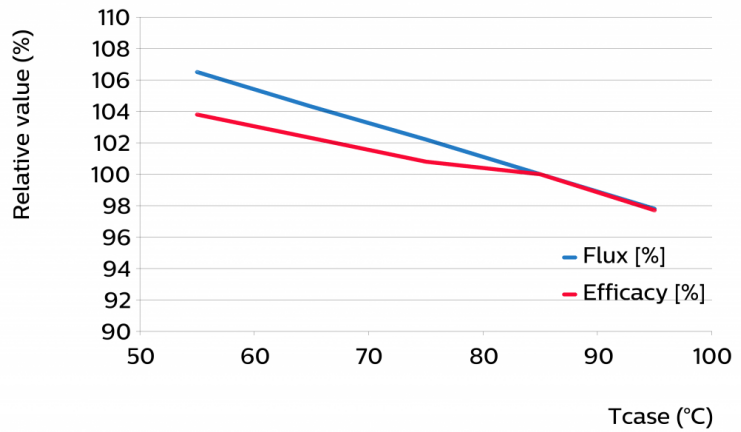
Flux and efficacy versus current (at Tc nominal)

I [mA]	Flux [%]	Efficacy [%]
100	53	113
130	69	109
160	83	105
200	100	100
280	134	92
300	141	90
320	149	88
340	157	86



Flux and efficacy versus temperature at Tc (at I nominal)

Tcase [°C]	Flux [%]	Efficacy [%]
55	107	104
65	104	102
75	102	101
85	100	100
95	98	98



Lumen maintenance

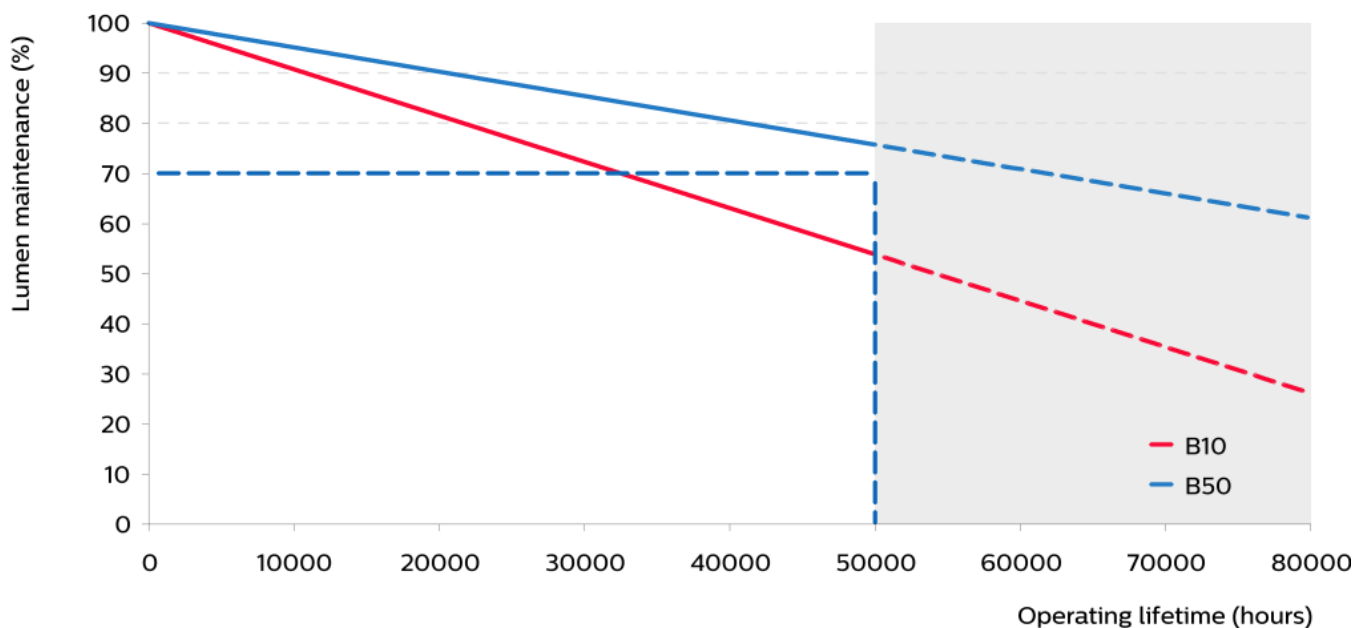
Operation point	Lumen maintenance x 1000 hours	L70			L80			L90		
		B50	B20	B10	B50	B20	B10	B50	B20	B10
80% I nom 160 mA	Tc 65°C	>50	>50	>50	>50	>50	>50	>50	37	30
	Tc nom 85°C	>50	>50	45	>50	35	28	25	17	13
	Tc max 95°C	>50	38	31	37	24	19	17	11	9
I nom 200 mA	Tc 65°C	>50	>50	>50	>50	>50	>50	>50	33	27
	Tc nom 85°C	>50	>50	40	48	32	25	23	15	12
	Tc max 95°C	>50	35	28	33	22	17	16	10	8
I life 280 mA	Tc 65°C	>50	>50	>50	>50	>50	44	40	26	21
	Tc nom 85°C	>50	40	32	39	25	20	18	12	10
	Tc max 95°C	43	28	23	27	18	14	13	8	7

Parameter	Value	Unit
C10 at Tc life	50000	hours

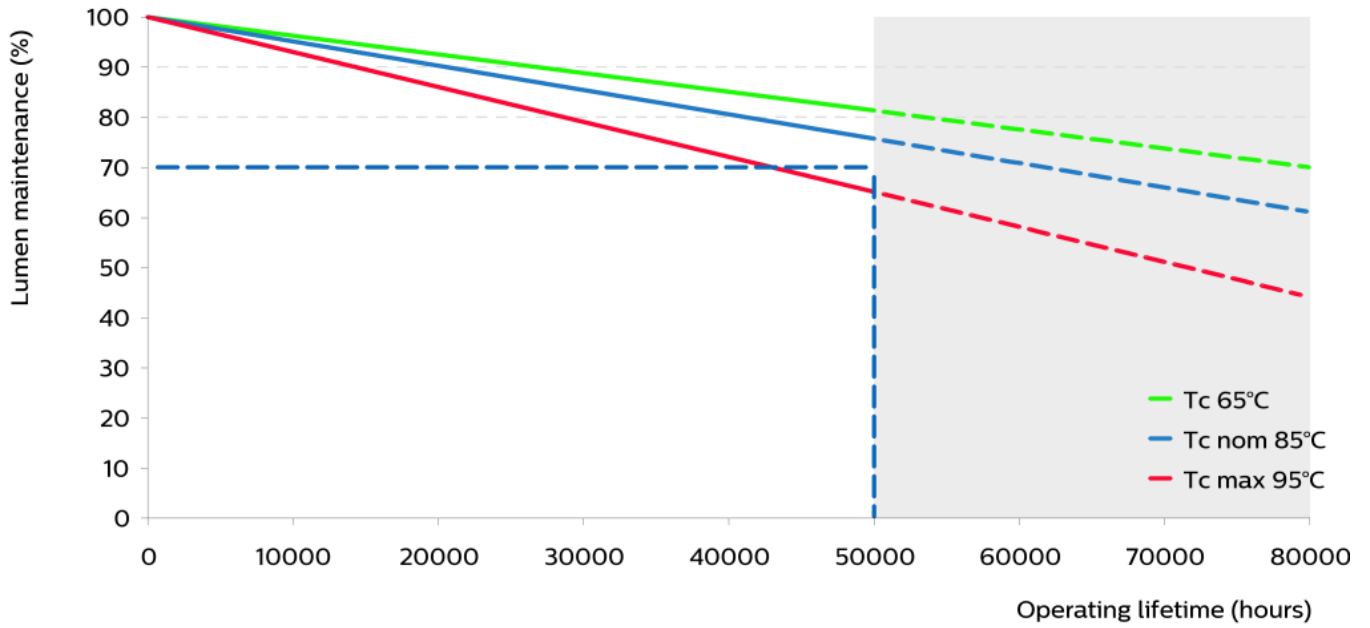
Please refer to the warranty window to ensure that your operating conditions are covered.
 >50 k hours claim is based on extrapolating raw LM80-data by using statistical techniques.

Lumen maintenance graphs

Lumen maintenance at I-life and Tc-life conditions



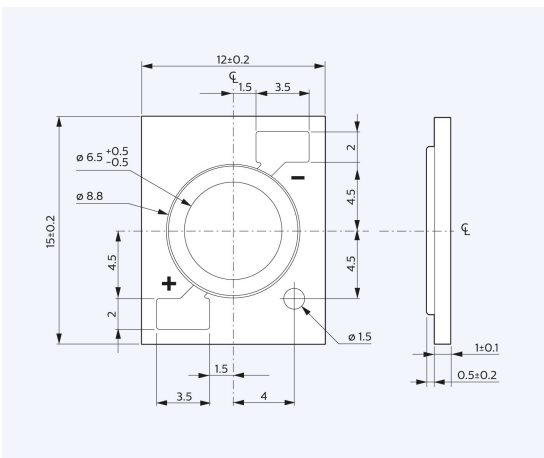
Lumen maintenance for B50 at current I-life conditions



Mechanical characteristics

- Fortimo SLM C 827 1202 L06 1215 G6
- Fortimo SLM C 830 1202 L06 1215 G6
- Fortimo SLM C 835 1202 L06 1215 G6
- Fortimo SLM C 840 1202 L06 1215 G6
- Fortimo SLM C 927 1202 L06 1215 G6
- Fortimo SLM C 930 1202 L06 1215 G6

Parameter	Min	Typ	Max	Unit
Length	14.8	15	15.2	mm
Width	11.8	12	12.2	mm
Height PCB	0.9	1	1.1	mm
Height including dam	1.2	1.5	1.8	mm



Absolute ratings

Parameter	Min	Typ	Max	Unit
Current through the LED module (I-max)			340	mA
Case temperature (Tc-max)			95	°C
Power at rated Vf-max and I-max			13.3	W
ESD Human Body Model (HBM) Class 3A JESD22-A114-E 8 kV			8	kV
ESD Machine Model (MM) Class B JESD22-A115-B			400	V
Ambient temperature	-20		40	°C
Storage temperature	-40		80	°C

Application information

Certificates and Standards

IEC 62031:2008 (First Edition) + A1:2012 + A2:2014

EN 62031:2008 (First Edition) + A1:2013 + A2:2015

Relevant clauses of IEC 62471:2006 (Incl. IEC/TR 62471-2: 2009 and IEC/TR 62778: 2014)

Relevant clauses of IEC 60838-1:2004 + A1:2008 + A2:2011 with IEC 60838-2-2:2006 + A1:2012

Relevant clauses of EN 62471:2008 (With IEC/TR 62471-2: 2009 and IEC/TR 62778: 2014)

Relevant clauses of EN 60838-1:2004 + A1:2008 + A2:2011 with EN 60838-2-2:2006 + A1:2012

UL 8750

ENEC+

CE

Environmental

RoHS/REACH

Application

IP rating	No IP-rating
Overheating protection	No
Luminaire class	IEC Class I and Class II
Dimming	Yes

Warranty Window

