FLORENTINA-HLD-SS

~16° smooth spot beam



SPECIFICATION:

Dimensions	285.6 x 19.5 mm
Height	9.5 mm
Fastening	screw
ROHS compliant	yes

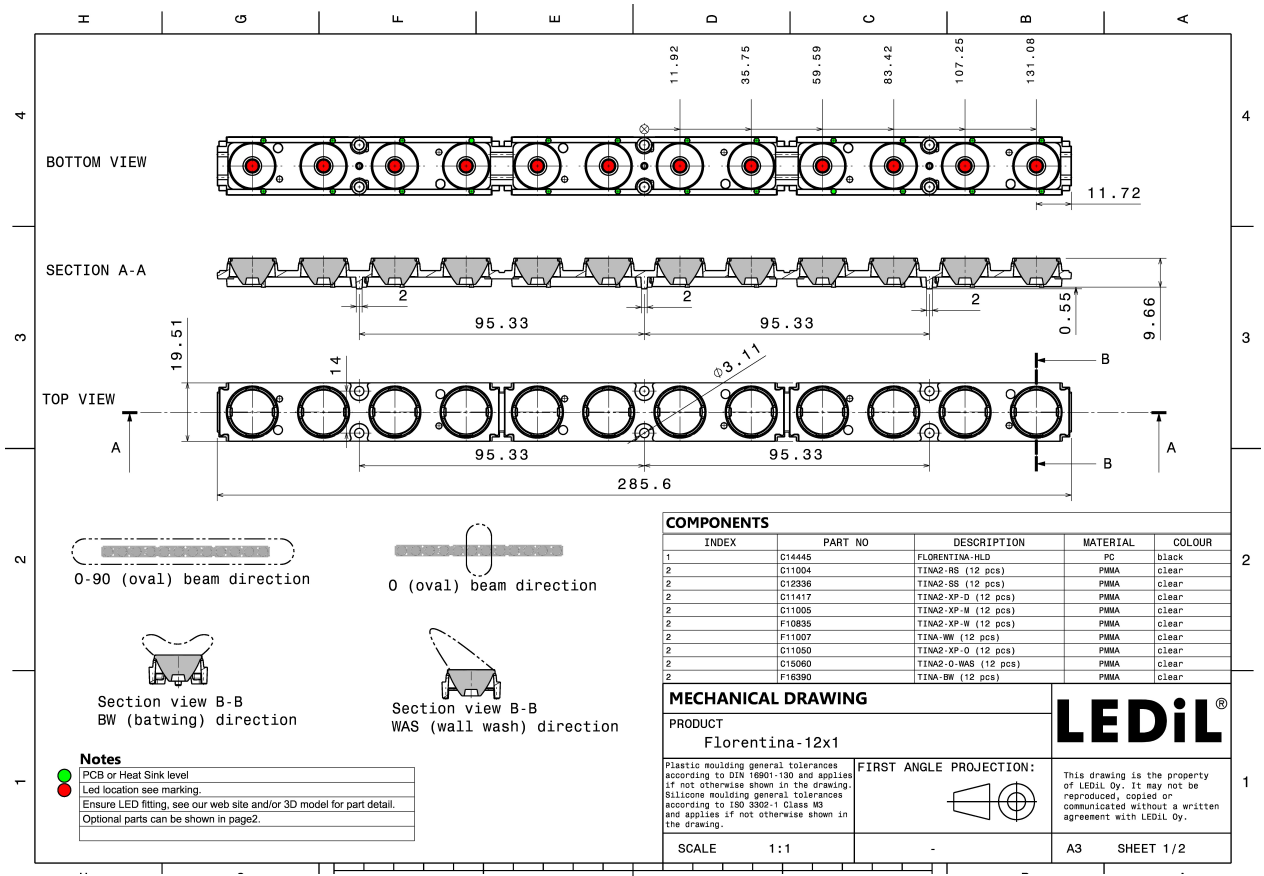
MATERIALS:

Component	Type	Material	Colour	Finish
TINA2-SS	Single lens	PMMA	clear	
FLORENTINA-HLD	Holder	PC	black	

ORDERING INFORMATION:

Component		Qty in box	MOQ	MPQ	Box weight (kg)
CP14993_FLORENTINA-HLD-SS » Box size: 398 x 298 x 140 mm	Single lens	160	32	16	3.3

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COMPONENTS

INDEX	PART NO	DESCRIPTION	MATERIAL	COLOUR
1	C14445	FLORENTINA-HLD	PC	black
2	C11004	TINA2-RS (12 pcs)	PMMA	clear
2	C12336	TINA2-SS (12 pcs)	PMMA	clear
2	C11417	TINA2-XP-D (12 pcs)	PMMA	clear
2	C11005	TINA2-XP-M (12 pcs)	PMMA	clear
2	F10835	TINA2-XP-W (12 pcs)	PMMA	clear
2	F11007	TINA-WW (12 pcs)	PMMA	clear
2	C11050	TINA2-XP-O (12 pcs)	PMMA	clear
2	C15060	TINA2-O-WAS (12 pcs)	PMMA	clear
2	F16390	TINA-BW (12 pcs)	PMMA	clear

MECHANICAL DRAWING

PRODUCT
Florentina-12x1

Plastic moulding general tolerances according to DIN 16901-130 and applies if not otherwise shown in the drawing. Silicone moulding general tolerances according to ISO 3302-1 Class M3 and applies if not otherwise shown in the drawing.

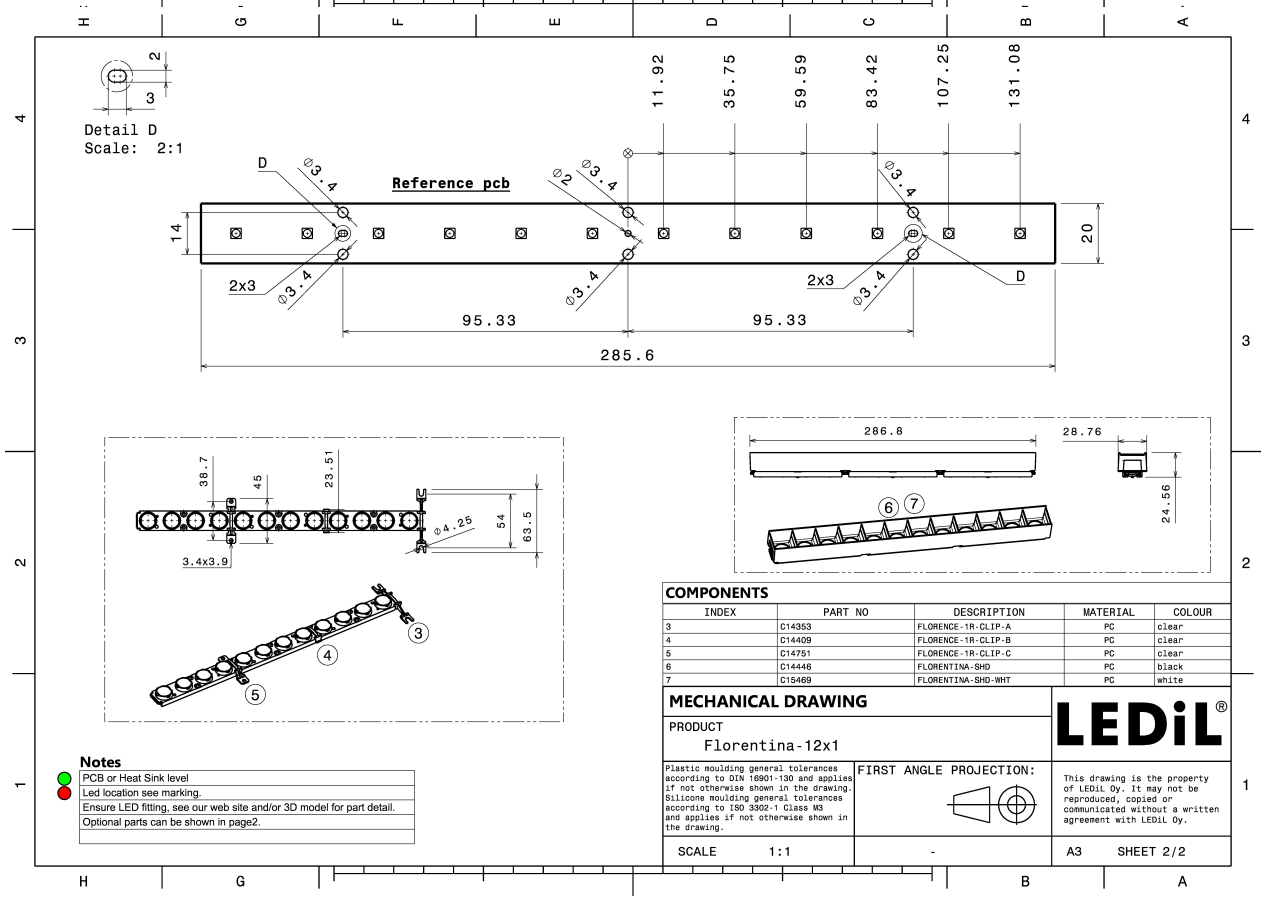
FIRST ANGLE PROJECTION:

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SCALE 1:1 | - | A3 | SHEET 1/2

Notes

PCB or Heat Sink level
Led location see marking.
Ensure LED fitting, see our web site and/or 3D model for part detail.
Optional parts can be shown in page2.



COMPONENTS

INDEX	PART NO	DESCRIPTION	MATERIAL	COLOUR
3	C14353	FLORENCE-1R-CLIP-A	PC	clear
4	C14409	FLORENCE-1R-CLIP-B	PC	clear
5	C14751	FLORENCE-1R-CLIP-C	PC	clear
6	C14446	FLORENTINA-SHD	PC	black
7	C15469	FLORENTINA-SHD-WHT	PC	white

MECHANICAL DRAWING

PRODUCT
Florentina-12x1

Plastic moulding general tolerances according to DIN 16901-130 and applies if not otherwise shown in the drawing. Silicone moulding general tolerances according to ISO 3302-1 Class M3 and applies if not otherwise shown in the drawing.

FIRST ANGLE PROJECTION:

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SCALE 1:1 | - | A3 | SHEET 2/2

Notes

PCB or Heat Sink level
Led location see marking.
Ensure LED fitting, see our web site and/or 3D model for part detail.
Optional parts can be shown in page2.

See also our general installation guide: www.ledil.com/installation_guide

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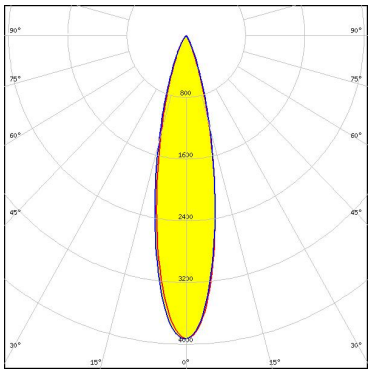
OPTICAL RESULTS (MEASURED):

COMET ELECTRONICS

LED	QUICK FLUX LED FL-XG 1x12 xxx
FWHM / FWTM	23.0° / 46.0°
Efficiency	83 %
Peak intensity	3.9 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



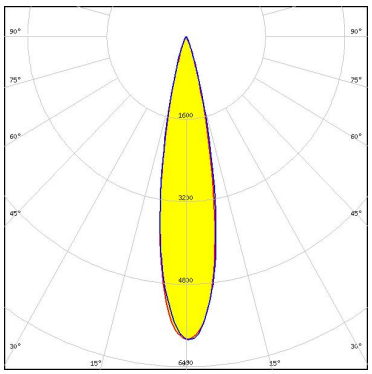


CREE LEDs

LED	XP-E2
FWHM / FWTM	21.0° / 36.0°
Efficiency	85 %
Peak intensity	5.9 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



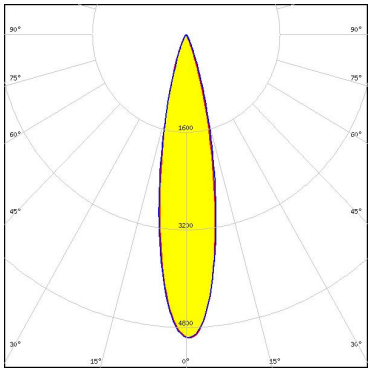


CREE LEDs

LED	XP-G2
FWHM / FWTM	22.0° / 41.0°
Efficiency	87 %
Peak intensity	5 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



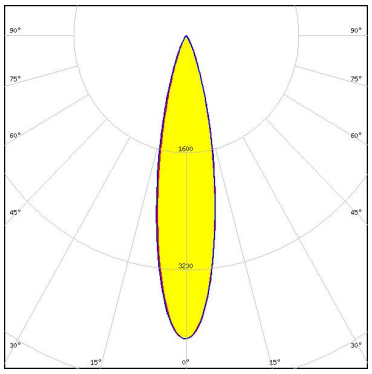


CREE LEDs

LED	XP-G3
FWHM / FWTM	23.0° / 45.0°
Efficiency	83 %
Peak intensity	4.1 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD





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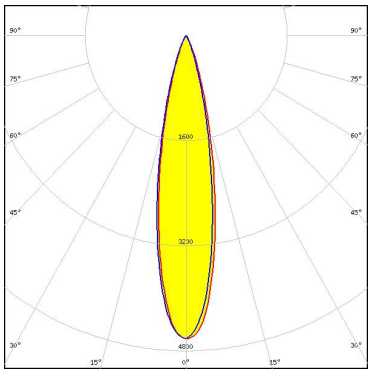
OPTICAL RESULTS (MEASURED):

LUMILEDS

LED	LUXEON Rebel ES
FWHM / FWTM	22.0° / 42.0°
Efficiency	83 %
Peak intensity	4.6 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



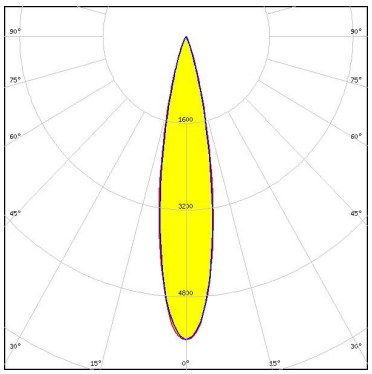


LUMILEDS

LED	LUXEON Rebel Plus
FWHM / FWTM	20.0° / 38.0°
Efficiency	84 %
Peak intensity	5.6 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



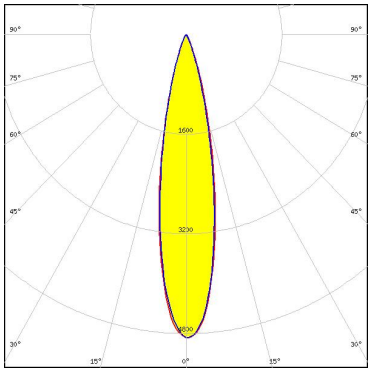


LUMILEDS

LED	LUXEON TX
FWHM / FWTM	21.0° / 41.0°
Efficiency	84 %
Peak intensity	4.9 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



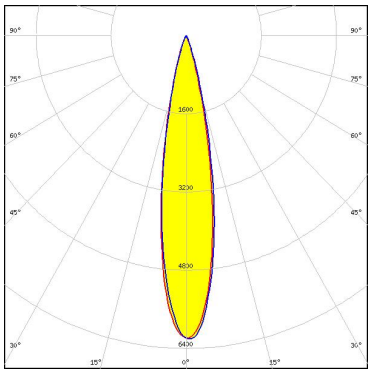


LUMILEDS

LED	LUXEON Z ES
FWHM / FWTM	20.0° / 36.0°
Efficiency	85 %
Peak intensity	6.2 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD





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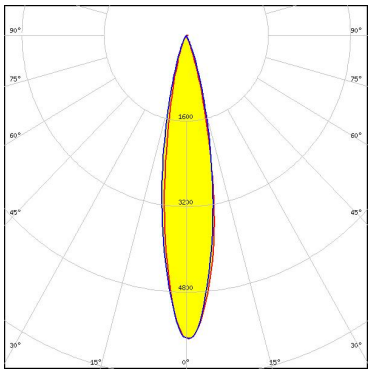
OPTICAL RESULTS (MEASURED):

NICHIA

LED	NCSxE17A
FWHM / FWTM	20.0° / 38.0°
Efficiency	82 %
Peak intensity	5.7 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



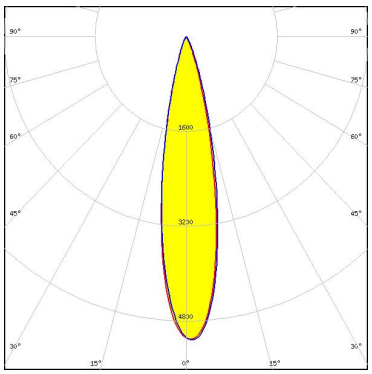


NICHIA

LED	NCSxx19B
FWHM / FWTM	21.0° / 39.0°
Efficiency	84 %
Peak intensity	5.1 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



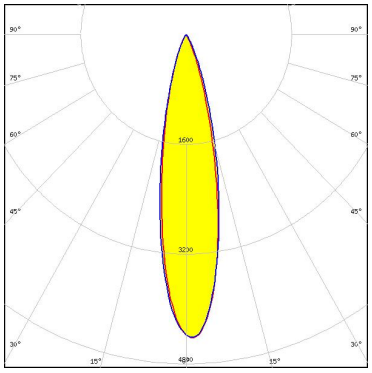


NICHIA

LED	NF2x757G
FWHM / FWTM	22.0° / 44.0°
Efficiency	87 %
Peak intensity	4.5 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



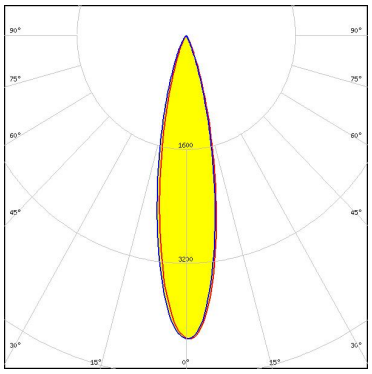


NICHIA

LED	NVSxx19B/NVSxx19C
FWHM / FWTM	22.0° / 43.0°
Efficiency	82 %
Peak intensity	4.3 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD





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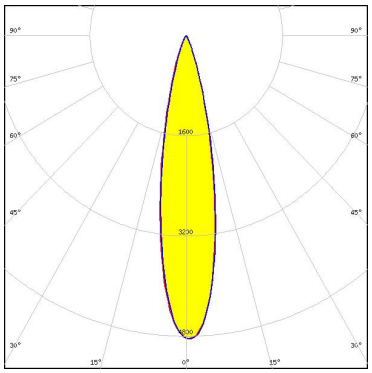
OPTICAL RESULTS (MEASURED):

OSRAM Opto Semiconductors

LED	OSLON Square EC
FWHM / FWTM	21.0° / 40.0°
Efficiency	82 %
Peak intensity	4.9 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



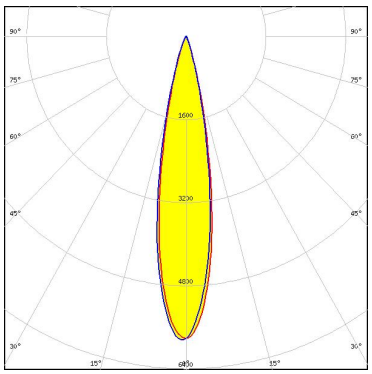


OSRAM Opto Semiconductors

LED	OSLON SSL 150
FWHM / FWTM	20.0° / 36.0°
Efficiency	86 %
Peak intensity	5.8 cd/lm
LEDs/each optic	1
Light colour	White

Required components:



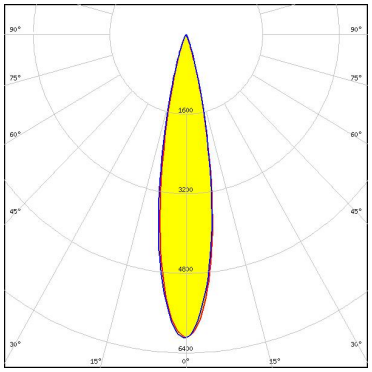


OSRAM Opto Semiconductors

LED	OSLON SSL 150
FWHM / FWTM	20.0° / 35.0°
Efficiency	83 %
Peak intensity	6.1 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



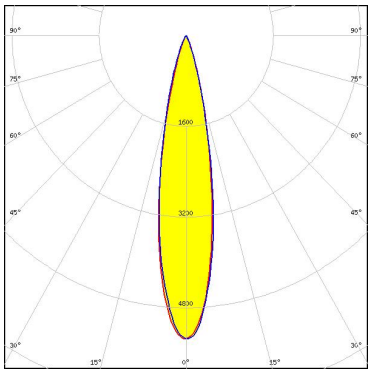


OSRAM Opto Semiconductors

LED	OSLON SSL 80
FWHM / FWTM	20.0° / 38.0°
Efficiency	83 %
Peak intensity	5.4 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD





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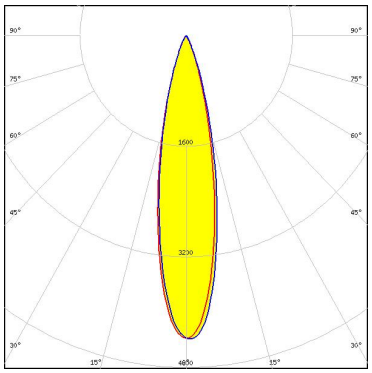
OPTICAL RESULTS (MEASURED):

SAMSUNG

LED	LH351B
FWHM / FWTM	22.0° / 43.0°
Efficiency	84 %
Peak intensity	4.4 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



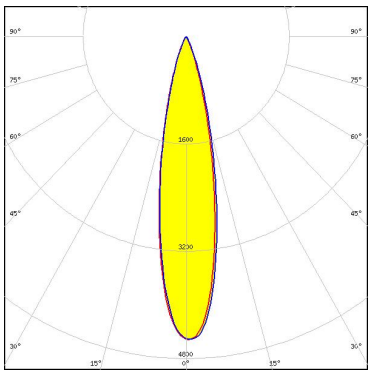


TOSHIBA
Leading Innovation

LED	TL1L4
FWHM / FWTM	22.0° / 42.0°
Efficiency	81 %
Peak intensity	4.5 cd/lm
LEDs/each optic	1
Light colour	White

Required components:
C14446_FLORENTINA-SHD



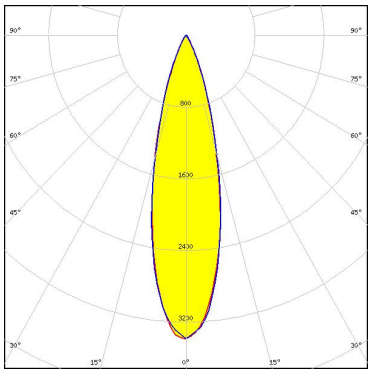


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OPTICAL RESULTS (SIMULATED):

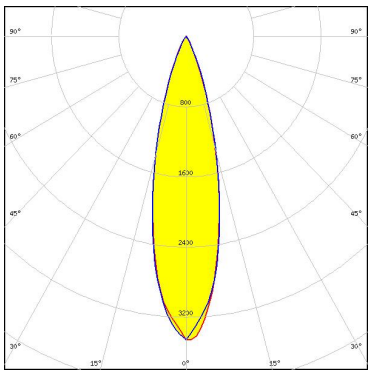
CREE LEDs

LED	J Series 3030
FWHM / FWTM	26.0° / 50.0°
Efficiency	89 %
Peak intensity	3.4 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	



CREE LEDs

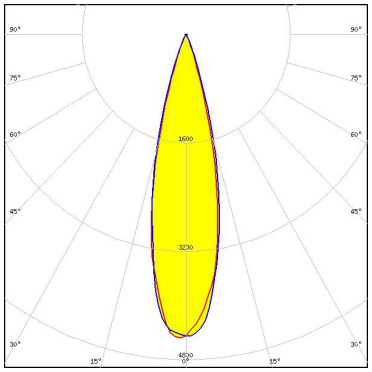
LED	J Series 3030
FWHM / FWTM	26.0° / 48.0°
Efficiency	84 %
Peak intensity	3.5 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	
C14446_FLORENTINA-SHD	



CREE LEDs

LED	XQ-E HD
FWHM / FWTM	25.0° / 41.0°
Efficiency	89 %
Peak intensity	4.6 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	
C14446_FLORENTINA-SHD	

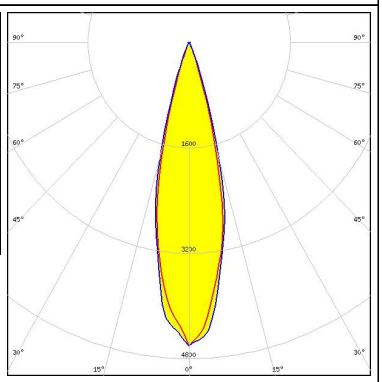




CREE LEDs

LED	XQ-E HI
FWHM / FWTM	26.0° / 40.0°
Efficiency	89 %
Peak intensity	4.7 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	
C14446_FLORENTINA-SHD	



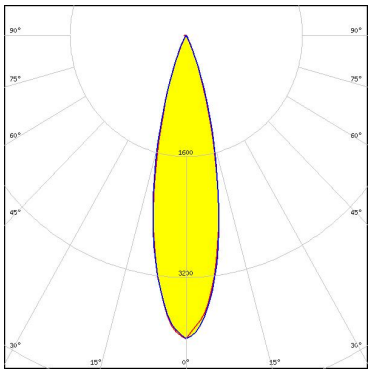


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OPTICAL RESULTS (SIMULATED):

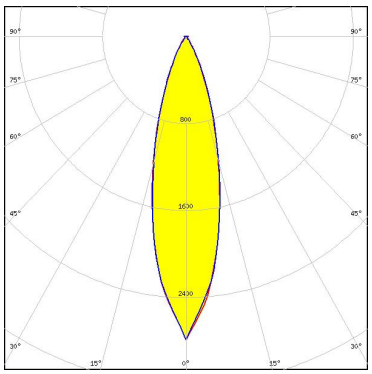
NICHIA

LED	NVSxE21A
FWHM / FWTM	25.0° / 45.0°
Efficiency	86 %
Peak intensity	4.9 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	
C14446_FLORENTINA-SHD	



NICHIA

LED	NWSx229A
FWHM / FWTM	27.0° / 54.0°
Efficiency	84 %
Peak intensity	2.8 cd/lm
LEDs/each optic	1
Light colour	White
Required components:	
C14446_FLORENTINA-SHD	



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GENERAL INFORMATION:

NOTE: The typical beam angle will be changed by different color, chip size and chip position tolerance. The typical total beam angle is the full angle measured where the luminous intensity is half of the peak value.

MATERIALS:

As part of our continuous research and improvement processes, and to ensure the best possible quality and availability of our products, LEDiL reserves the right to change material grades without notice.

PRODUCT DATA USER AGREEMENT AND DISCLAIMER:

The measured data in the provided downloadable LEDiL Product Datasheets and Mechanical 2D-Drawings is rounded and provided as reference for planning. LEDiL Oy's optical specifications have been verified by conducting performance testing of the products in accordance with the company's quality system. The reported data are averaged results of multiple measurements with typical variation. LEDiL Oy reserves the right to without prior notification make changes and improvements to its products.

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