


HB-2X2-W

~50° wide beam

TECHNICAL SPECIFICATIONS:

Dimensions	50.0 mm
Height	8.5 mm
Fastening	glue, pin, screw
ROHS compliant	yes 

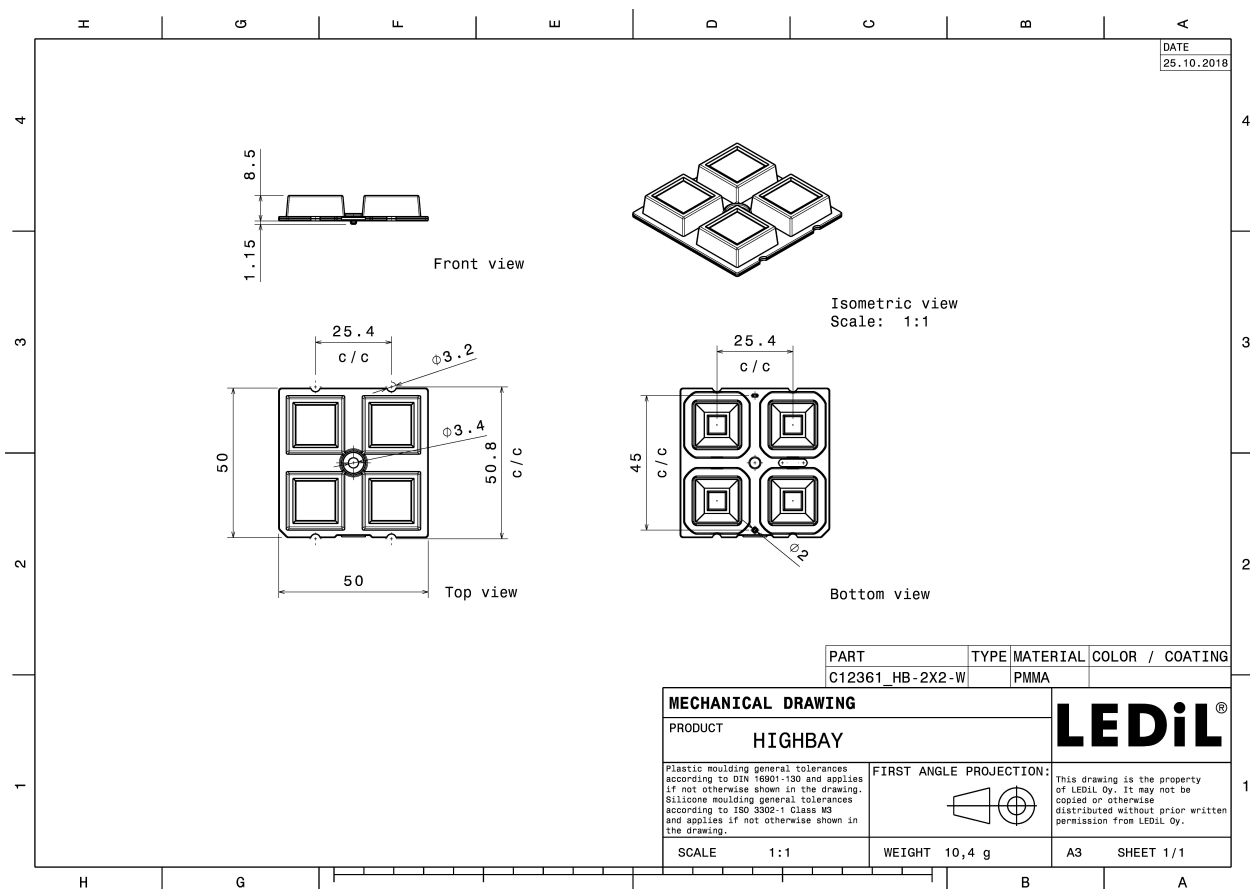
MATERIAL SPECIFICATIONS:

Component	Type	Material	Colour	Finish
HB-2X2-W	Multi-lens	PMMA	clear	

ORDERING INFORMATION:

Component	Qty in box	MOQ	MPQ	Box weight (kg)
C12361_HB-2X2-W » Box size: 480 x 280 x 300 mm	800	160	160	9.1

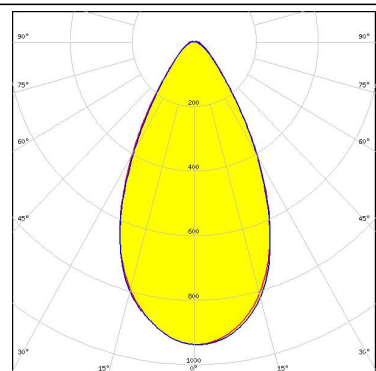
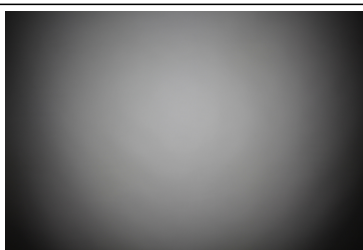




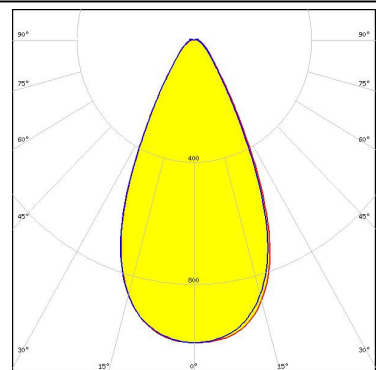
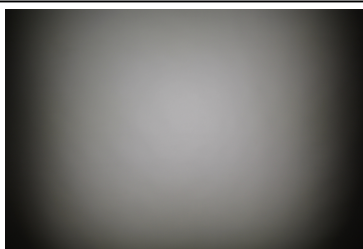
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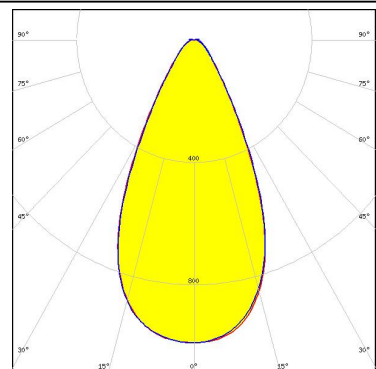
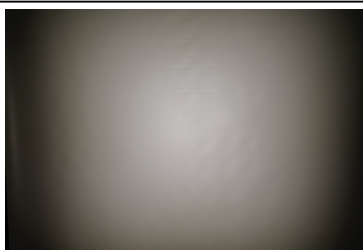
LED Bridgelux SMD 5050
FWHM 55.0°
Efficiency 94 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



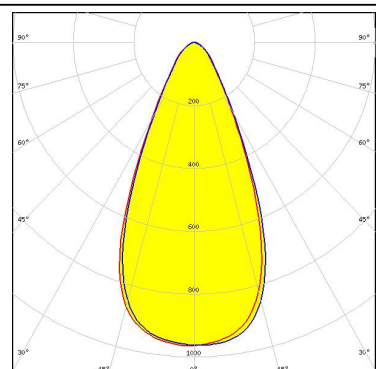
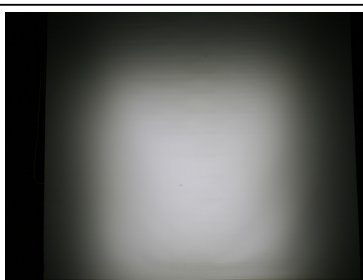
LED QUICK FLUX XTP 2x4 xxx LS G5
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED QUICK FLUX XTP 2x6 xxx LS G5
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



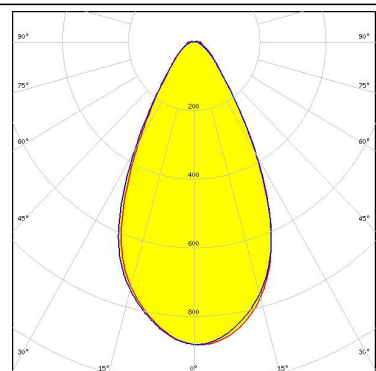
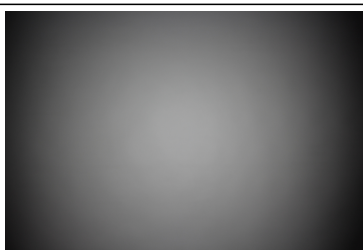
LED XB-D
FWHM 48.0°
Efficiency 86 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



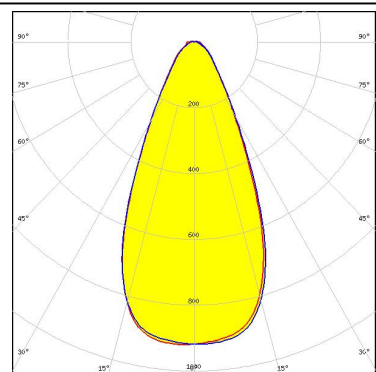
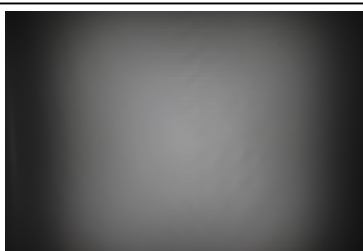
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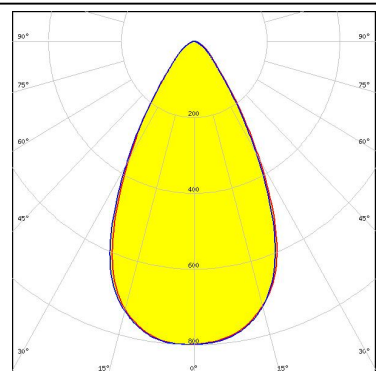
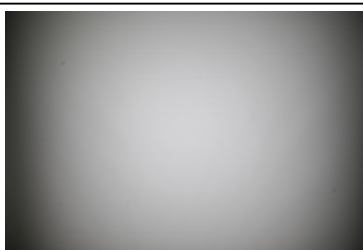
LED XD16
FWHM 54.0°
Efficiency 91 %
Peak intensity 0.9 cd/lm
LEDs/each optic 4
Light colour White
Required components:



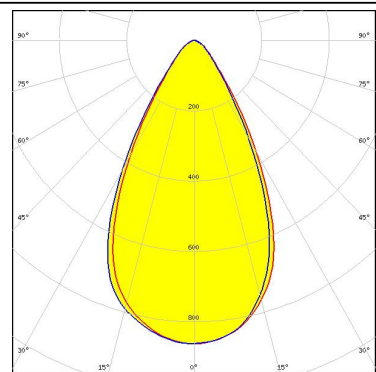
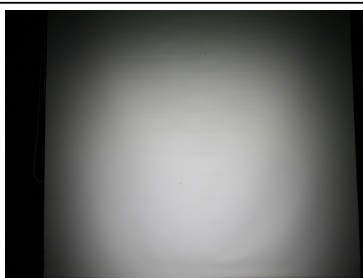
LED XD16
FWHM 48.0°
Efficiency 91 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED XHP35 HD
FWHM 57.0°
Efficiency 85 %
Peak intensity 0.8 cd/lm
LEDs/each optic 1
Light colour White
Required components:



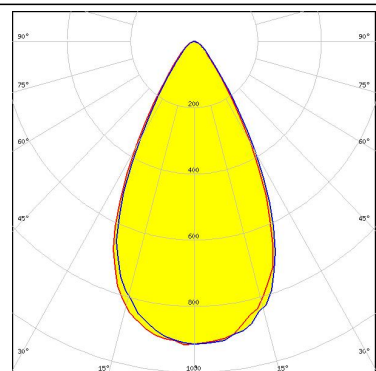
LED XM-L
FWHM 57.0°
Efficiency 89 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



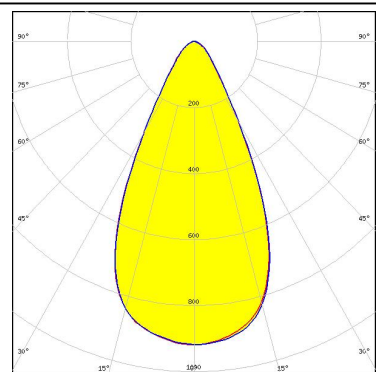
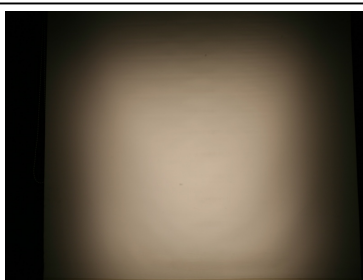
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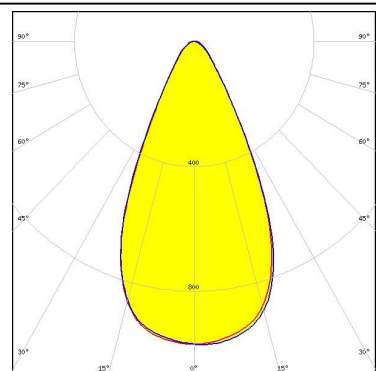
LED XM-L2
FWHM 56.0°
Efficiency 87 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



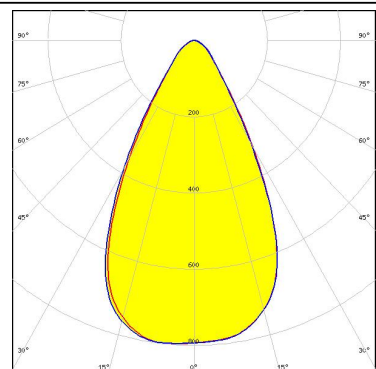
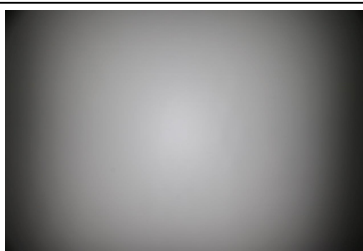
LED XP-G
FWHM 52.0°
Efficiency 88 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED XP-G2
FWHM 51.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



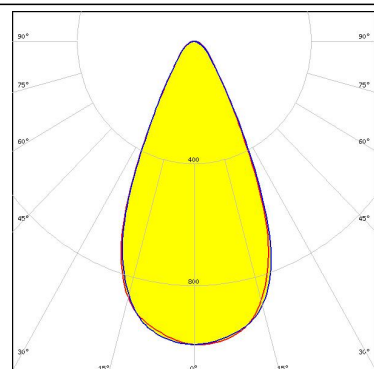
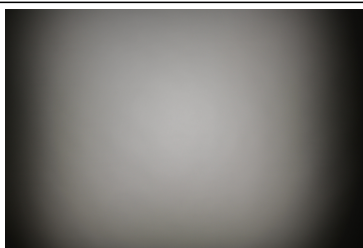
LED XP-L HD
FWHM 56.0°
Efficiency 87 %
Peak intensity 0.8 cd/lm
LEDs/each optic 1
Light colour White
Required components:



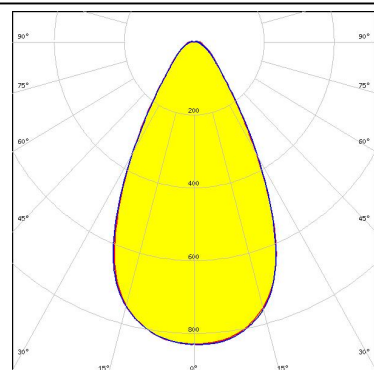
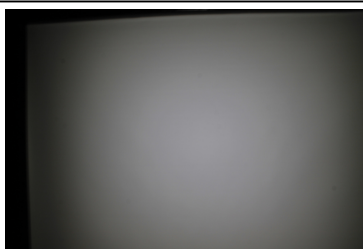
PHOTOMETRIC DATA (MEASURED):



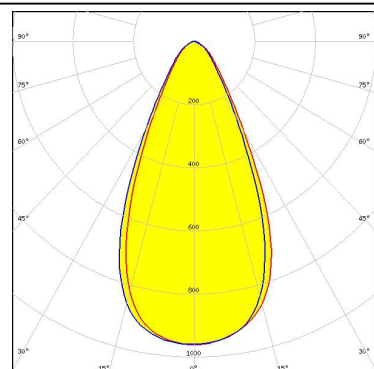
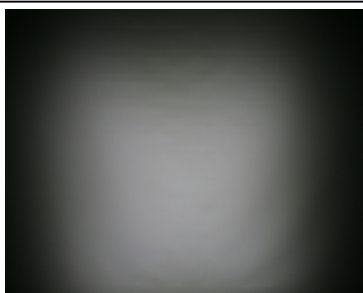
LED XP-L HI
FWHM 50.0°
Efficiency 93 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



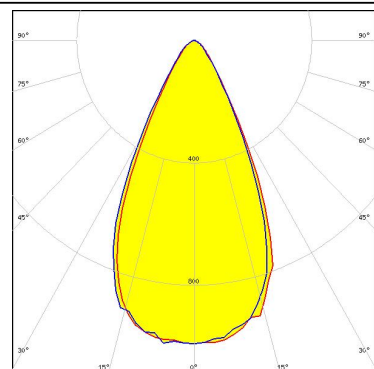
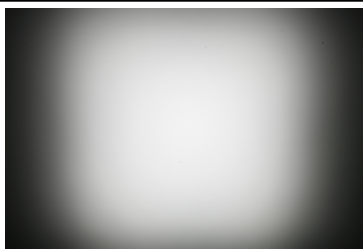
LED XP-L2
FWHM 56.0°
Efficiency 92 %
Peak intensity 0.8 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED XT-E
FWHM 50.0°
Efficiency 87 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



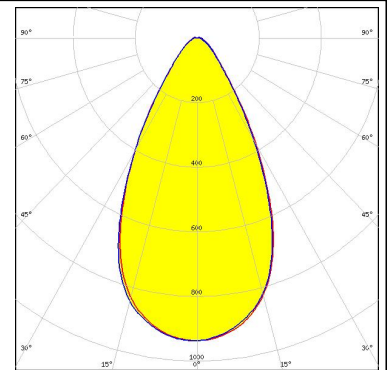
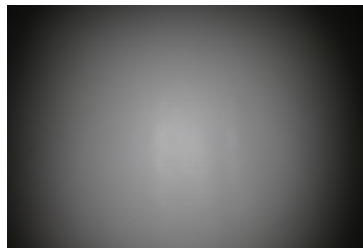
LED H35C1 (LEMWA33)
FWHM 53.0°
Efficiency 86 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



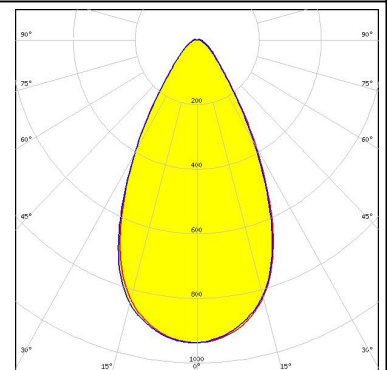
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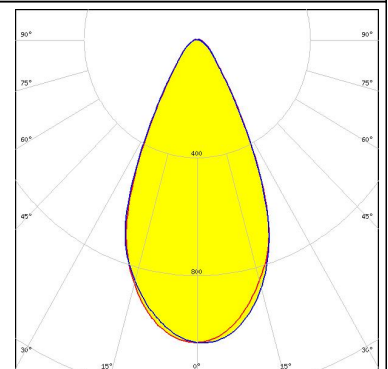
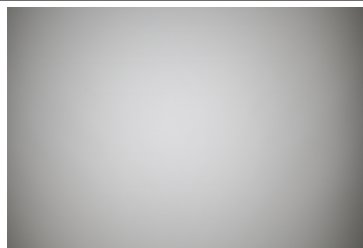
LED LUXEON 5050 Round LES
FWHM 55.0°
Efficiency 94 %
Peak intensity 0.9 cd/Im
LEDs/each optic 1
Light colour White
Required components:



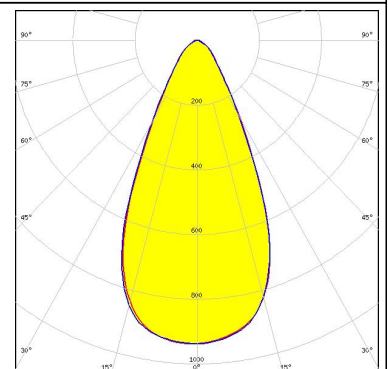
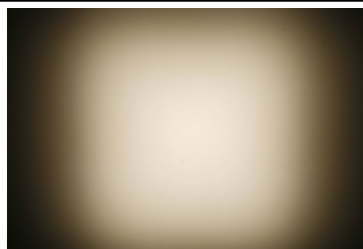
LED LUXEON 5050 Square LES
FWHM 55.0°
Efficiency 94 %
Peak intensity 0.9 cd/Im
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON MZ
FWHM 53.0°
Efficiency 92 %
Peak intensity 1 cd/Im
LEDs/each optic 1
Light colour White
Required components:



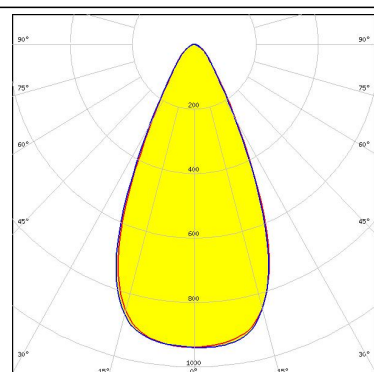
LED LUXEON Q
FWHM 50.0°
Efficiency 86 %
Peak intensity 0.9 cd/Im
LEDs/each optic 1
Light colour White
Required components:



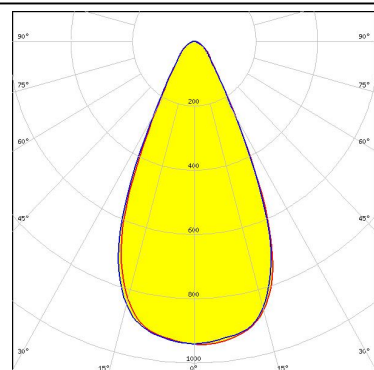
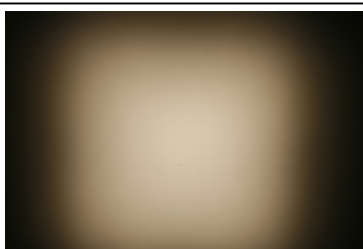
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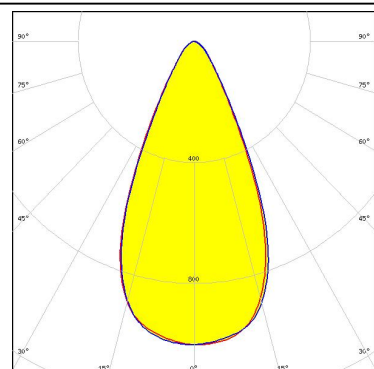
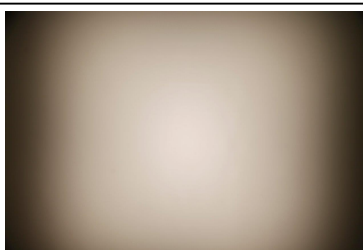
LED LUXEON Rebel ES
FWHM 51.0°
Efficiency 87 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



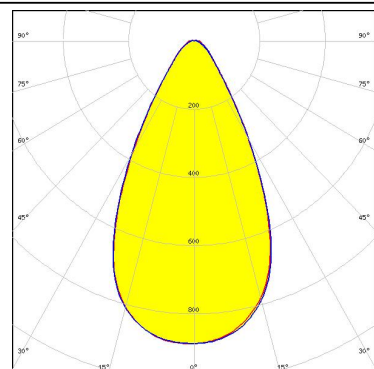
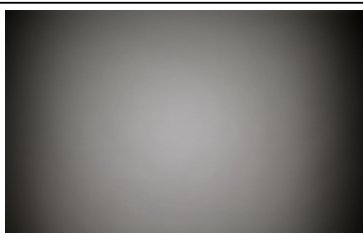
LED LUXEON T
FWHM 55.0°
Efficiency 87 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON TX
FWHM 50.0°
Efficiency 88 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



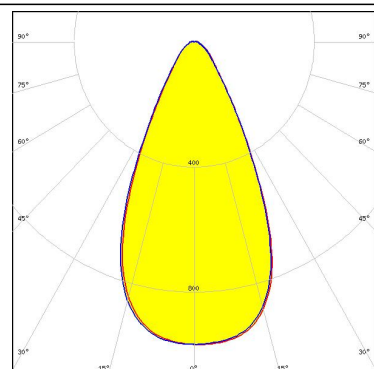
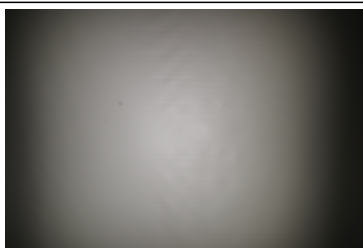
LED LUXEON V
FWHM 55.0°
Efficiency 93 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



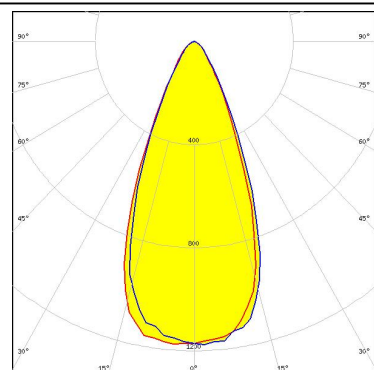
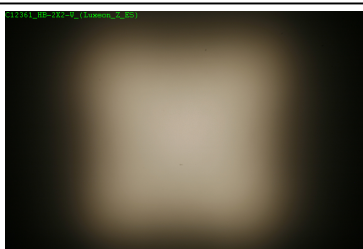
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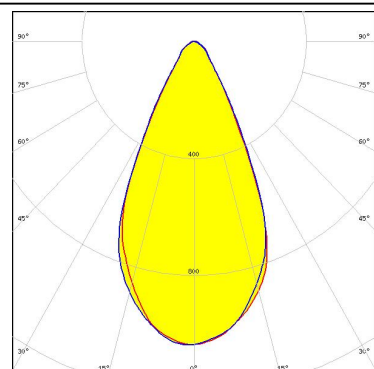
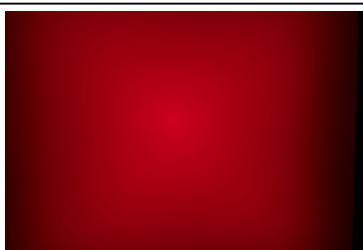
LED LUXEON V2
FWHM 51.0°
Efficiency 94 %
Peak intensity 1 cd/Im
LEDs/each optic 1
Light colour White
Required components:



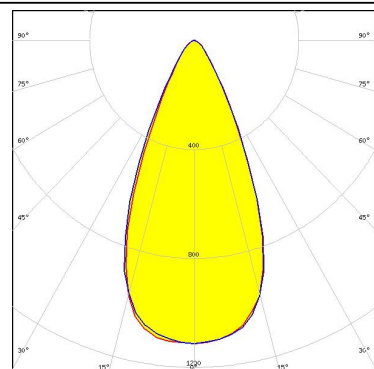
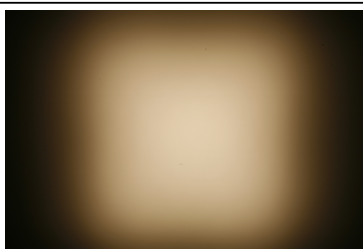
LED LUXEON Z ES
FWHM 46.0°
Efficiency 87 %
Peak intensity 1.2 cd/Im
LEDs/each optic 1
Light colour White
Required components:



LED SST-10-B130
FWHM 51.0°
Efficiency 99 %
Peak intensity 1 cd/Im
LEDs/each optic 1
Light colour Deep Red
Required components:



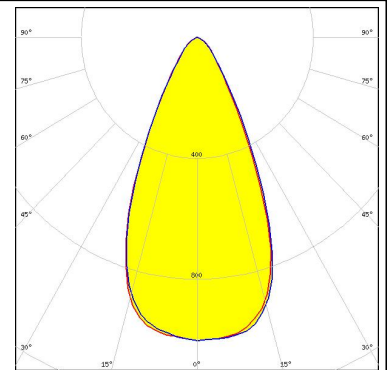
LED NCSxx19A
FWHM 48.0°
Efficiency 85 %
Peak intensity 1.1 cd/Im
LEDs/each optic 1
Light colour White
Required components:



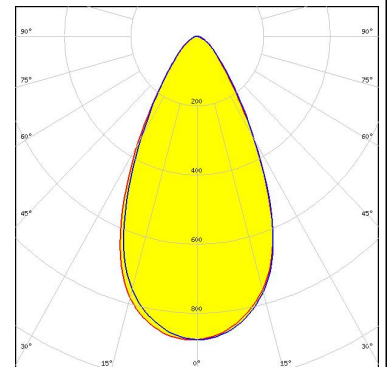
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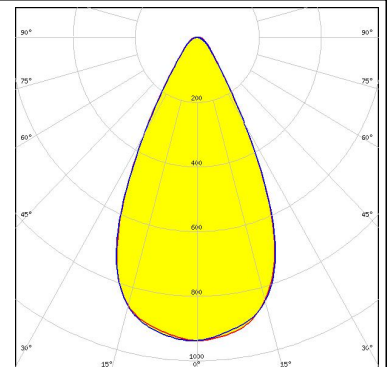
LED NCSxx19B
FWHM 50.0°
Efficiency 85 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



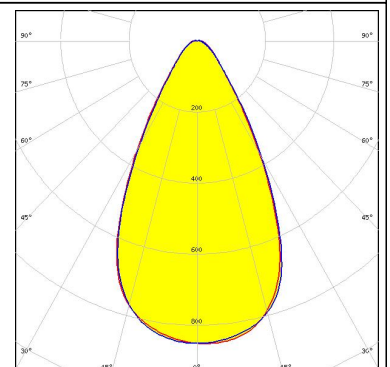
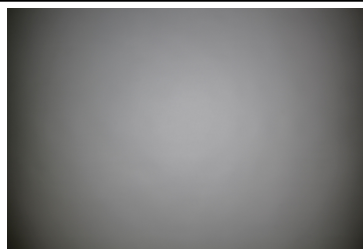
LED NS9x383
FWHM 54.0°
Efficiency 86 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED NVSW219D
FWHM 53.0°
Efficiency 94 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



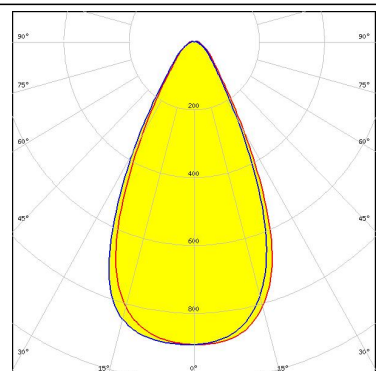
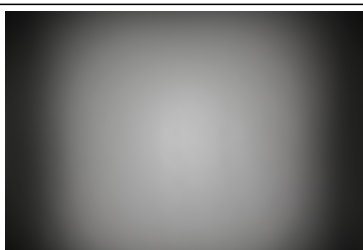
LED NVSW319B
FWHM 56.0°
Efficiency 93 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



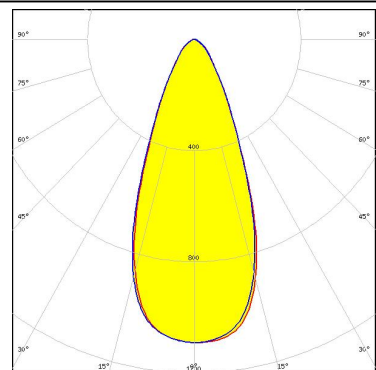
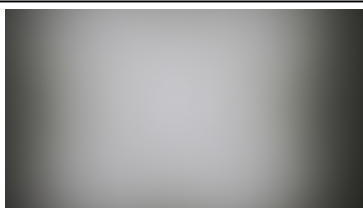
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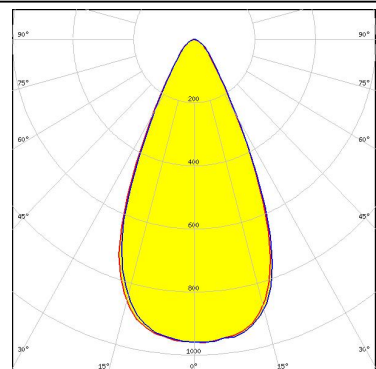
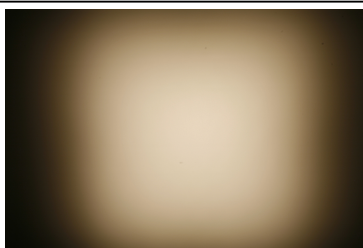
LED NVSW3x9A
FWHM 53.0°
Efficiency 92 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



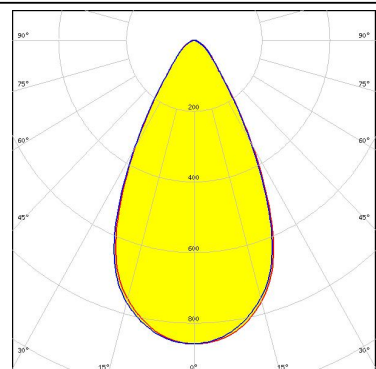
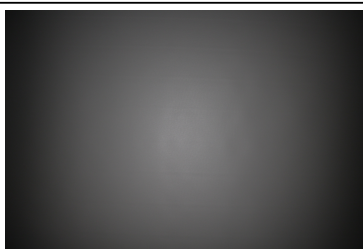
LED NVSxE21A
FWHM 43.0°
Efficiency 86 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED NVSxx19B/NVSxx19C
FWHM 51.0°
Efficiency 85 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



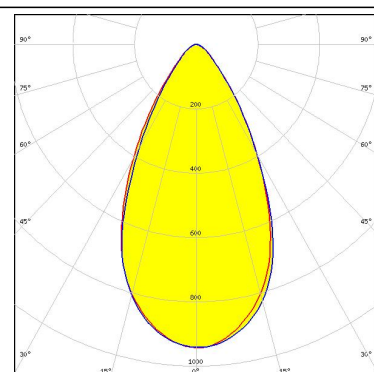
LED NWSx229A
FWHM 57.0°
Efficiency 86 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (MEASURED):

OPTOGAN

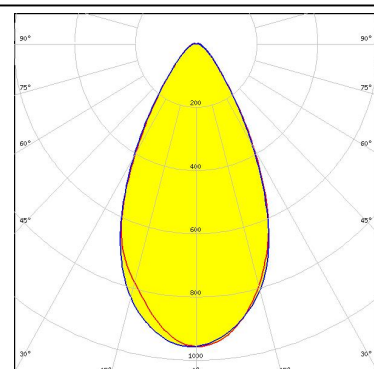
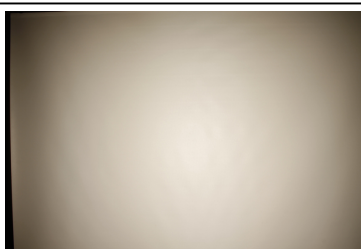
LED OLP-5065F6L-06A
 FWHM 56.0°
 Efficiency 88 %
 Peak intensity 0.9 cd/lm
 LEDs/each optic 1
 Light colour White
 Required components:



OSRAM

Opto Semiconductors

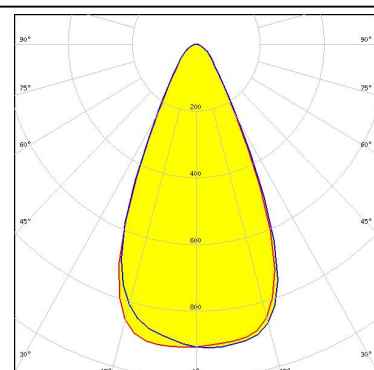
LED Duris S8
 FWHM 55.0°
 Efficiency 93 %
 Peak intensity 1 cd/lm
 LEDs/each optic 1
 Light colour White
 Required components:



OSRAM

Opto Semiconductors

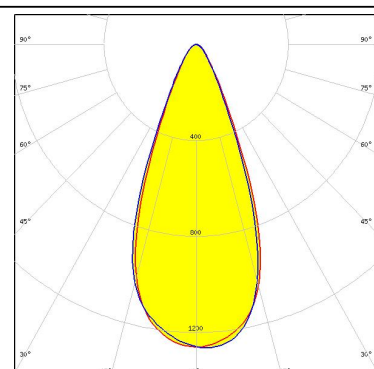
LED OSLOM Square PC
 FWHM 54.0°
 Efficiency 87 %
 Peak intensity 0.9 cd/lm
 LEDs/each optic 1
 Light colour White
 Required components:



OSRAM

Opto Semiconductors

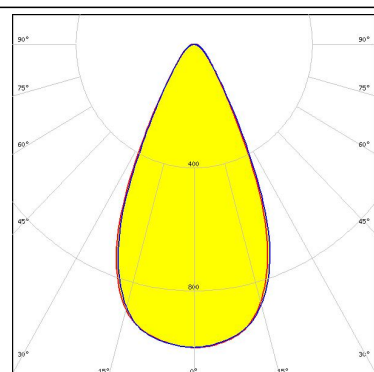
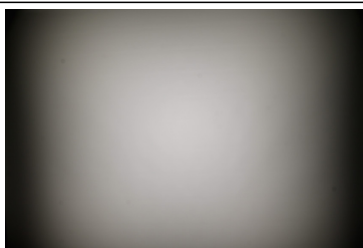
LED OSLOM SSL 80
 FWHM 43.0°
 Efficiency 89 %
 Peak intensity 1.3 cd/lm
 LEDs/each optic 1
 Light colour White
 Required components:



PHOTOMETRIC DATA (MEASURED):

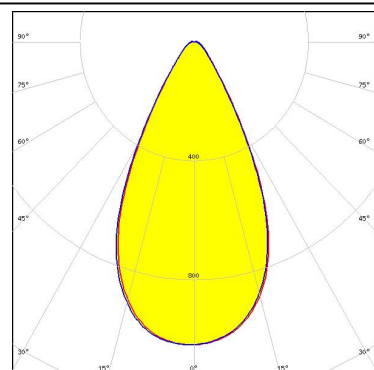
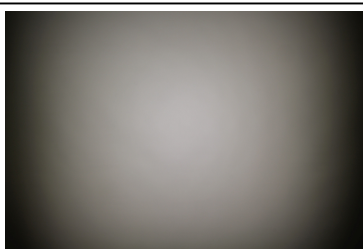
PHILIPS

LED Fortimo FastFlex LED 2x8 DA G4
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



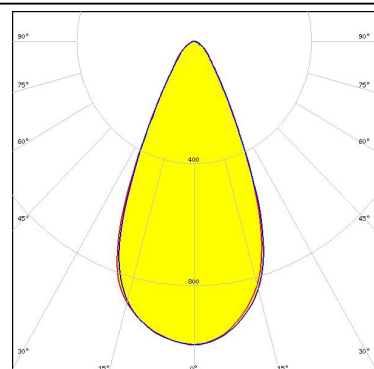
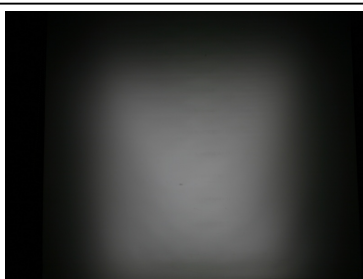
SAMSUNG

LED HiLOM RH16 (LH351C)
FWHM 53.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



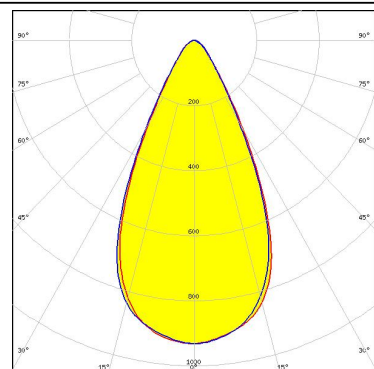
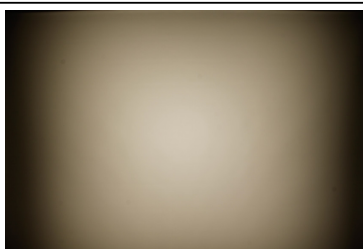
SAMSUNG

LED LH351A
FWHM 49.0°
Efficiency 89 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



SAMSUNG

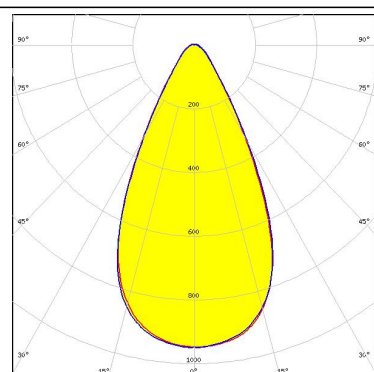
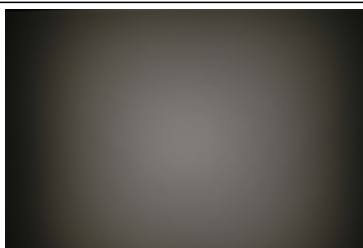
LED LH351B
FWHM 55.0°
Efficiency 86 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (MEASURED):

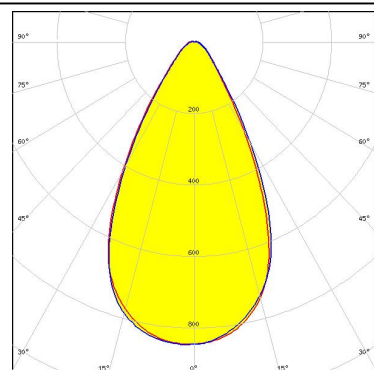
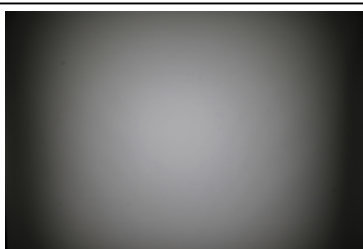
SAMSUNG

LED LH351C
FWHM 53.0°
Efficiency 93 %
Peak intensity 1 cd/Im
LEDs/each optic 1
Light colour White
Required components:



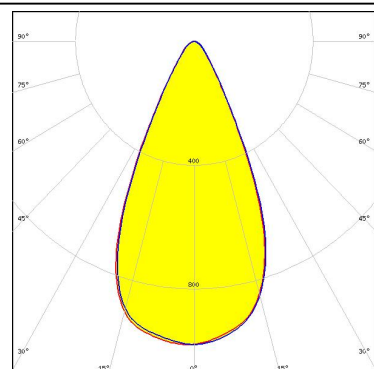
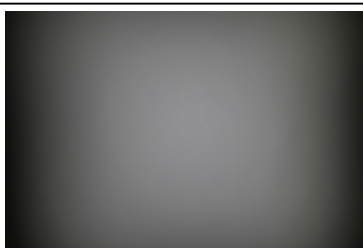
SAMSUNG

LED LH351D
FWHM 56.0°
Efficiency 91 %
Peak intensity 0.9 cd/Im
LEDs/each optic 1
Light colour White
Required components:



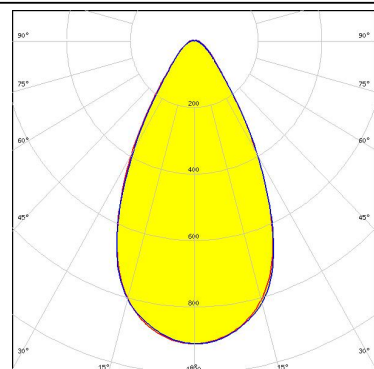
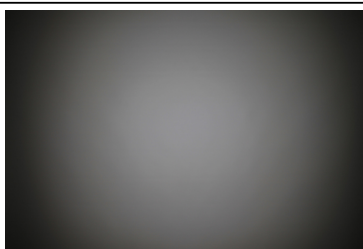
SAMSUNG

LED LH351Z
FWHM 50.0°
Efficiency 87 %
Peak intensity 1 cd/Im
LEDs/each optic 1
Light colour White
Required components:







SAMSUNG

LED LH508A
FWHM 56.0°
Efficiency 93 %
Peak intensity 0.9 cd/Im
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (MEASURED):

<p> SEOUL SEMICONDUCTOR</p> <p>LED 2x2 Y22 module - SMJQ-D48W16AA-XX FWHM 54.0° Efficiency 92 % Peak intensity 0.8 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p> SEOUL SEMICONDUCTOR</p> <p>LED Z5 FWHM 48.0° Efficiency 88 % Peak intensity 1 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p> SEOUL SEMICONDUCTOR</p> <p>LED Z5M1/Z5M2 FWHM 51.0° Efficiency 85 % Peak intensity 1 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p> SEOUL SEMICONDUCTOR</p> <p>LED Z5M3 FWHM 53.0° Efficiency 94 % Peak intensity 0.9 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		

PHOTOMETRIC DATA (MEASURED):

<p>SEOL SEOUL SEMICONDUCTOR</p> <p>LED Z5M4</p> <p>FWHM 54.0°</p> <p>Efficiency 97 %</p> <p>Peak intensity 1 cd/Im</p> <p>LEDs/each optic 1</p> <p>Light colour White</p> <p>Required components:</p>		
<p>SEOL SEOUL SEMICONDUCTOR</p> <p>LED Z8Y15</p> <p>FWHM 45.0°</p> <p>Efficiency 79 %</p> <p>Peak intensity 0.9 cd/Im</p> <p>LEDs/each optic 1</p> <p>Light colour White</p> <p>Required components:</p>		
<p>SEOL SEOUL SEMICONDUCTOR</p> <p>LED Z8Y19</p> <p>FWHM 46.0°</p> <p>Efficiency 79 %</p> <p>Peak intensity 0.9 cd/Im</p> <p>LEDs/each optic 1</p> <p>Light colour White</p> <p>Required components:</p>		
<p>SEOL SEOUL SEMICONDUCTOR</p> <p>LED Z8Y19</p> <p>FWHM 54.0°</p> <p>Efficiency 92 %</p> <p>Peak intensity 0.8 cd/Im</p> <p>LEDs/each optic 4</p> <p>Light colour White</p> <p>Required components:</p>		

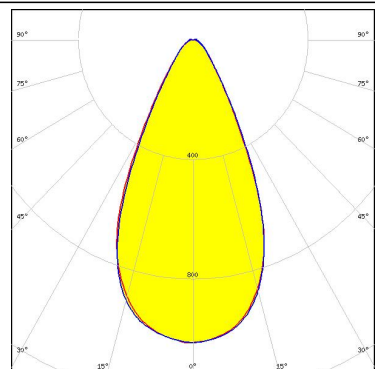
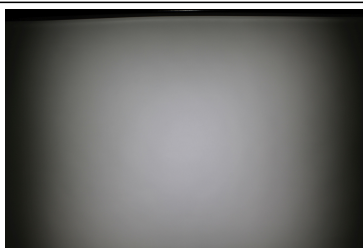
PHOTOMETRIC DATA (MEASURED):

<p>SEOUL SEOUL SEMICONDUCTOR</p> <p>LED Z8Y22 FWHM 48.0° Efficiency 92 % Peak intensity 0.9 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p>SEOUL SEOUL SEMICONDUCTOR</p> <p>LED Z8Y22P FWHM 51.0° Efficiency 92 % Peak intensity 0.9 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p>TOSHIBA Leading Innovation >>></p> <p>LED TL1L4 FWHM 48.0° Efficiency 81 % Peak intensity 1 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		
<p>TRIDONIC</p> <p>LED RLE 2x4 2000lm HP EXC2 OTD FWHM 51.0° Efficiency 94 % Peak intensity 1 cd/lm LEDs/each optic 1 Light colour White Required components:</p>		

PHOTOMETRIC DATA (MEASURED):

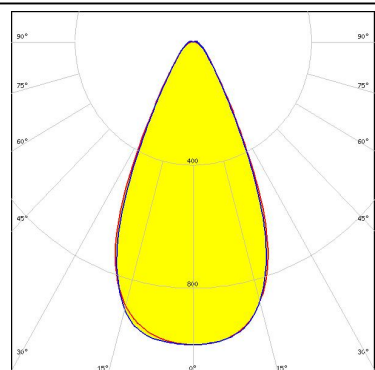
TRIDONIC

LED RLE 2x8 4000lm HP EXC2 OTD
FWHM 51.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



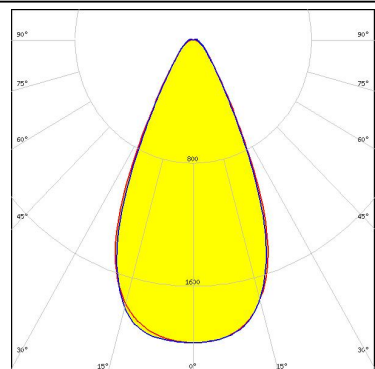
TRIDONIC

LED RLE G1 49x121mm 2000lm xxx EXC OTD
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



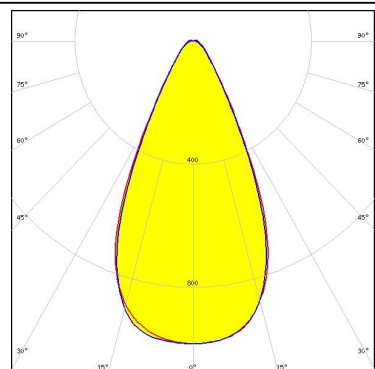
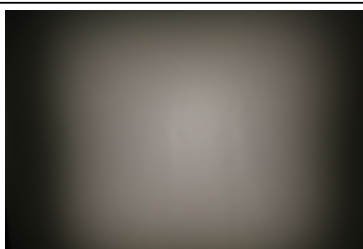
TRIDONIC

LED RLE G1 49x133mm 2000lm xxx EXC OTD
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



TRIDONIC

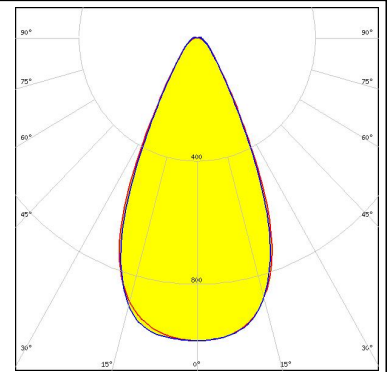
LED RLE G1 49x223mm 4000lm xxx EXC OTD
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (MEASURED):

TRIDONIC

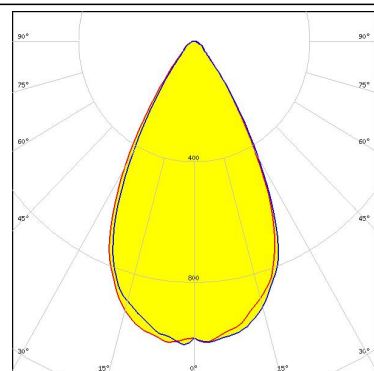
LED RLE G1 49x245mm 4000lm xxx EXC OTD
FWHM 52.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



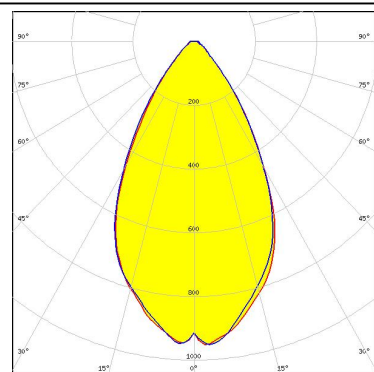
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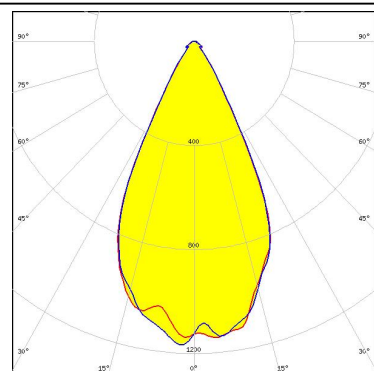
LED J Series 5050
FWHM 57.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



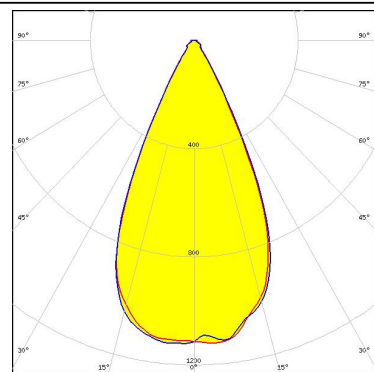
LED MHB-A/B
FWHM 58.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED XHP35 HI
FWHM 52.0°
Efficiency 93 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:



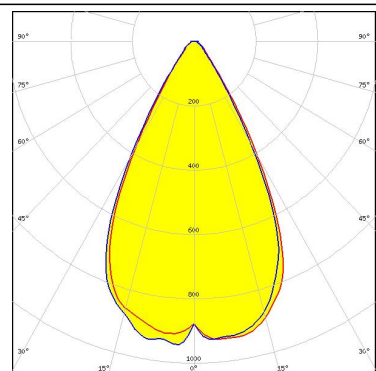
LED XP-E
FWHM 50.0°
Efficiency 94 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:



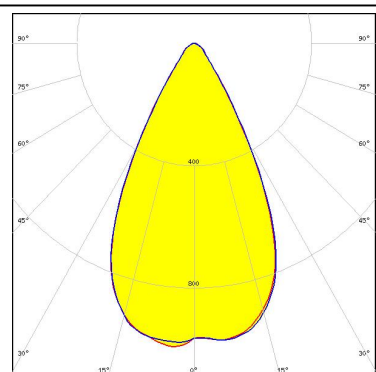
PHOTOMETRIC DATA (SIMULATED):



LED XP-G2 HE
FWHM 57.0°
Efficiency 95 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:



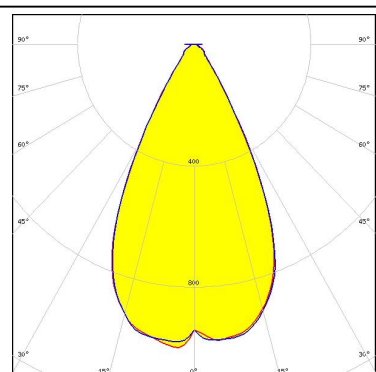
LED XP-G3
FWHM 55.0°
Efficiency 88 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



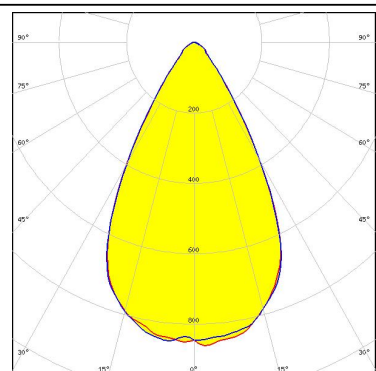
Transparent protective cover



LED XP-G3
FWHM 54.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED XP-L2
FWHM 58.0°
Efficiency 89 %
Peak intensity 0.9 cd/lm
LEDs/each optic 1
Light colour White
Required components:

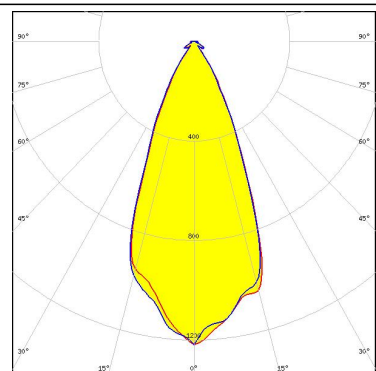


Transparent protective cover

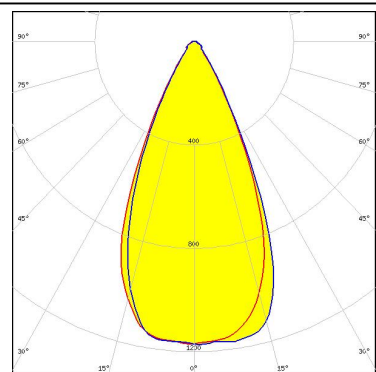
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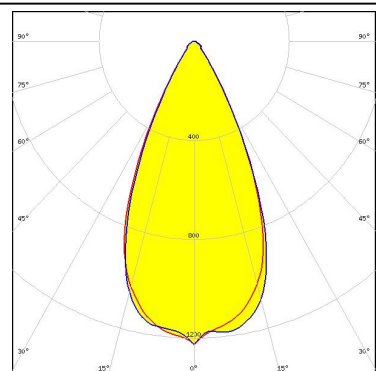
LED XQ-E HI
FWHM 42.0°
Efficiency 93 %
Peak intensity 1.4 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON 3030 2D (Round LES)
FWHM 49.0°
Efficiency 94 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:

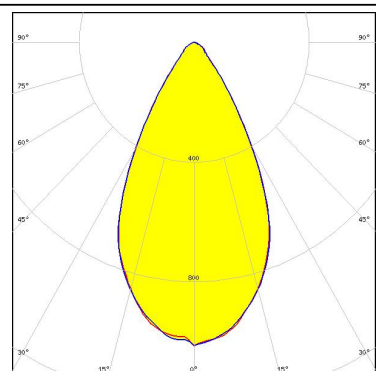


LED LUXEON 3535L
FWHM 49.0°
Efficiency 94 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON 5050 Square LES
FWHM 54.0°
Efficiency 89 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:

Transparent protective cover



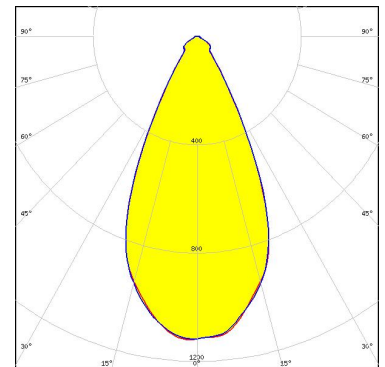
PHOTOMETRIC DATA (SIMULATED):



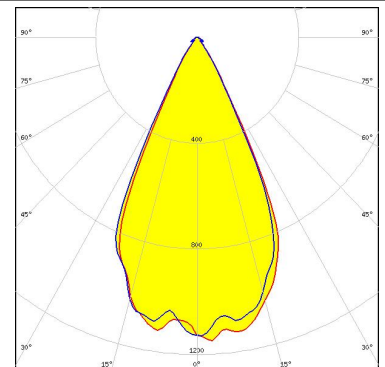
LED LUXEON A
FWHM 52.0°
Efficiency %
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON C
FWHM 50.0°
Efficiency 94 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED LUXEON H50-2
FWHM 52.0°
Efficiency 91 %
Peak intensity 4.7 cd/lm
LEDs/each optic 1
Light colour White
Required components:

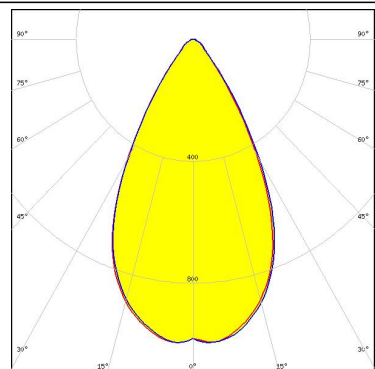


LED LUXEON Rebel
FWHM 52.0°
Efficiency %
LEDs/each optic 1
Light colour White
Required components:

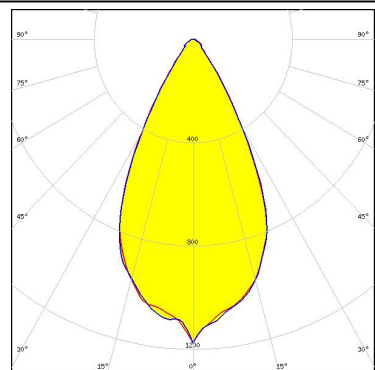
PHOTOMETRIC DATA (SIMULATED):



LED NFMW48xA
FWHM 57.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



LED NV4WB35AM
FWHM 54.0°
Efficiency 95 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:

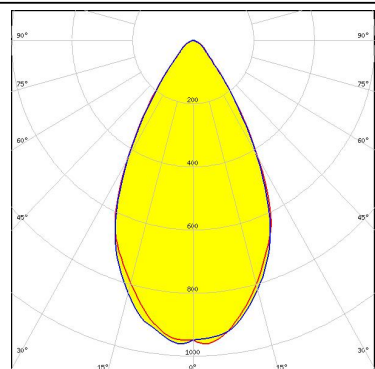


LED NVSxx19A
FWHM 50.0°
Efficiency %
LEDs/each optic 1
Light colour White
Required components:



LED Duris S8
FWHM 57.0°
Efficiency 90 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:

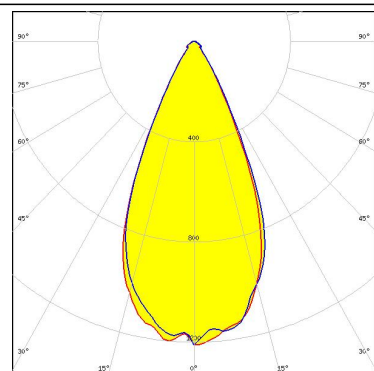
Transparent protective cover



PHOTOMETRIC DATA (SIMULATED):

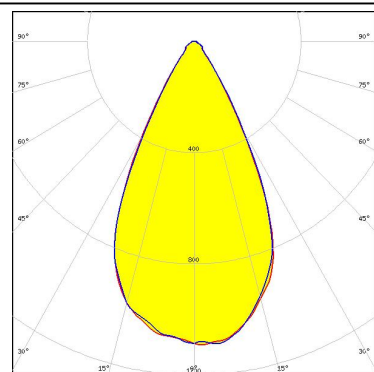
OSRAM
Opto Semiconductors

LED OSCONIQ P 3737 (2W version)
FWHM 48.0°
Efficiency 93 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:



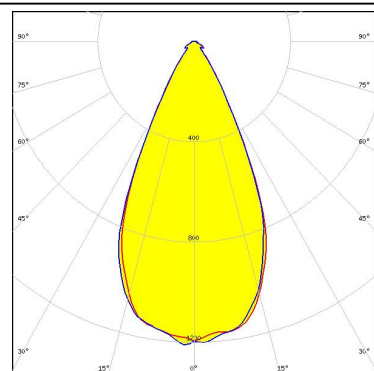
OSRAM
Opto Semiconductors

LED OSCONIQ P 3737 (3W version)
FWHM 54.0°
Efficiency 94 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



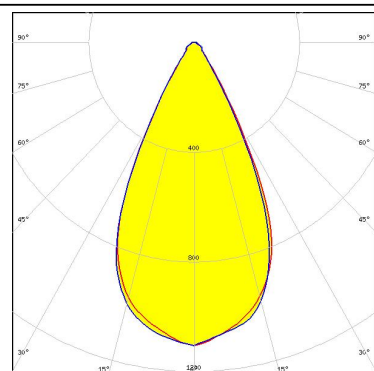
OSRAM
Opto Semiconductors

LED OSCONIQ P 3737 Flat
FWHM 50.0°
Efficiency 96 %
Peak intensity 1.2 cd/lm
LEDs/each optic 1
Light colour White
Required components:



OSRAM
Opto Semiconductors

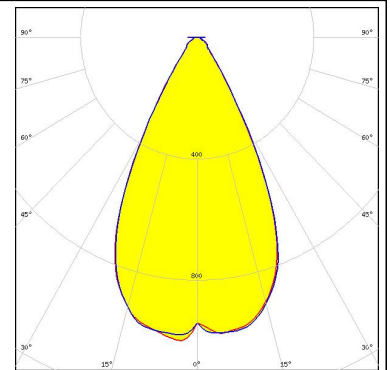
LED OSLON Square CSSRM2/CSSRM3
FWHM 52.0°
Efficiency 96 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (SIMULATED):

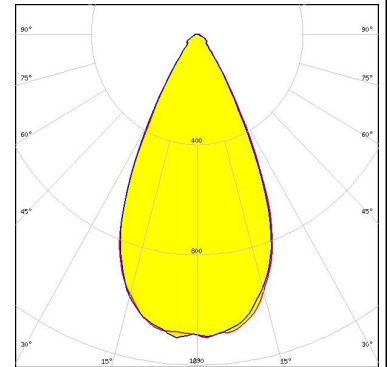
PHILIPS

LED Fortimo FastFlex LED 2x8 DAX G4
FWHM 54.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



SEOUL SEMICONDUCTOR

LED Acrich MJT 4040
FWHM 52.0°
Efficiency 94 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



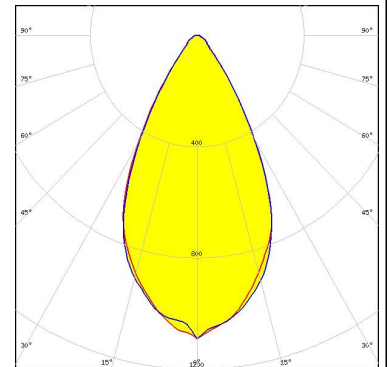
SEOUL SEMICONDUCTOR

LED MJT 5050
FWHM 57.0°
Efficiency 94 %
Peak intensity 1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



SEOUL SEMICONDUCTOR

LED SEOUL DC 5050 6V
FWHM 54.0°
Efficiency 94 %
Peak intensity 1.1 cd/lm
LEDs/each optic 1
Light colour White
Required components:



PHOTOMETRIC DATA (SIMULATED):

 SEOUL SEMICONDUCTOR	LED Z5M1/Z5M2 FWHM 52.0° Efficiency 94 % Peak intensity 1.1 cd/lm LEDs/each optic 1 Light colour White Required components:	
 SEOUL SEMICONDUCTOR	LED Z8Y22T FWHM 50.0° Efficiency 94 % Peak intensity 1.2 cd/lm LEDs/each optic 1 Light colour White Required components:	

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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LEDiL Oy

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where_to_buy](http://www.ledil.com/where_to_buy)

Shipping locations

Salo, Finland
Hong Kong, China

Distribution Partners

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