Neos LED

Designer : Michel Tortel

LENSO FLEX™ 2

Robust and versatile luminaire for all road and urban applications

Compact yet powerful, light yet robust, the Neos LED range provides multiple configurations to create comfort and security in numerous road and urban environments.

Available in three sizes and with multiple light distributions, the Neos LED provides a high-performing and energy-efficient lighting solution for pedestrian areas, streets, roads, car parks and bike paths.

This wide range of multi-purpose luminaires is designed to ensure that the lighting meets the real needs of the place to be lit.

IP 66 | IK 08 | RoHS | CE | 005 certification

URBAN & RESIDENTIAL STREETS | BRIDGES | BIKE & PEDESTRIAN PATHS | RAILWAY STATIONS & METROS | CAR PARKS | LARGE AREAS | SQUARES & PEDESTRIAN AREAS | ROADS & MOTORWAYS

Concept

The Neos LED range combines the energy efficiency of LED technology with the photometric performance of the LensoFlex®2 concept developed by Schréder.

The Neos LED luminaires are composed of a two-piece housing made of painted die-cast aluminium. The glass protector is sealed onto the cover.

Mounting by means of a fork enables the inclination to be adjusted precisely on-site. The versatility of this fork makes it perfect for mounting on a surface, a wall or on a pole/bracket.

The Neos LED luminaires are available in three sizes to suit numerous outdoor lighting applications: Neos 1 with 16 or 24 LEDs, Neos 2 with 32 or 48 LEDs and Neos 3 with 64 LEDs.

The 3 sizes of Neos LED make it suitable for multiple outdoor lighting applications.

Neos LED is composed of a two-piece housing made of painted die-cast aluminium.

TYPES OF APPLICATION

- URBAN & RESIDENTIAL STREETS
- BRIDGES
- BIKE & PEDESTRIAN PATHS
- RAILWAY STATIONS & METROS
- CAR PARKS
- LARGE AREAS
- SQUARES & PEDESTRIAN AREAS
- ROADS & MOTORWAYS

KEY ADVANTAGES

- LensoFlex®2 photometric engine with photometry adapted to various applications
- Adjustable inclination on-site
- FutureProof: easy replacement of the photometric engine and electronic assembly on-site
- Dedicated family of bracket and poles
- Designed to incorporate Owlet range of control solutions: stand-alone (PIR, photocell...), autonomous network and interoperable network
- Surge protection 10kV

Mounting by means of a fork enables the inclination to be adjusted on-site.

Tool less opening for easy installation and maintenance.

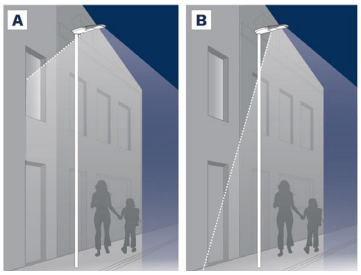
LensoFlex®2

LensoFlex®2 is based upon the addition principle of photometric distribution. Each LED is associated with a specific PMMA lens that generates the complete photometric distribution of the luminaire. The number of LEDs in combination with the driving current determines the intensity level of the light distribution.

Back Light control

As an option, the LensoFlex®2 modules can be equipped with a Back Light control system.

This additional feature minimises light spill from the back of the luminaire to avoid intrusive light towards buildings.

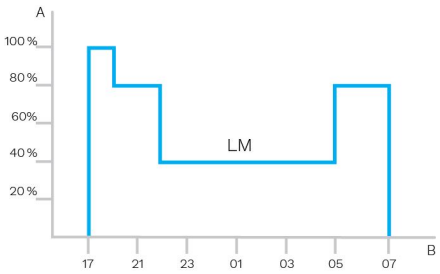


A. Without Back Light control | B. With Back Light control

Custom dimming profile

Intelligent luminaire drivers can be programmed with complex dimming profiles. Up to five combinations of time intervals and light levels are possible. This feature does not require any extra wiring.

The period between switching on and switching off is used to activate the preset dimming profile. The customised dimming system generates maximum energy savings while respecting the required lighting levels and uniformity throughout the night.



A. Dimming level | B. Time

PIR sensor: motion detection

In places with little nocturnal activity, lighting can be dimmed to a minimum most of the time. By using passive infrared (PIR) sensors, the level of light can be raised as soon as a pedestrian or a slow vehicle is detected in the area.

Each luminaire level can be configured individually with several parametres such as minimum and maximum light output, delay period and ON/OFF duration time. PIR sensors can be used in an autonomous or interoperable network.

Neos LED | CHARACTERISTICS

Schréder

GENERAL INFORMATION

Recommended installation height	4m to 8m | 13' to 26'
FutureProof	Easy replacement of the photometric engine and electronic assembly on-site
Driver included	Yes
CE Mark	Yes
ENEC certified	Yes
ROHS compliant	Yes
French law of December 27th 2018 - Compliant with application type(s)	a, b, c, d, e, f, g
BE 005 certified	Yes
Testing standard	LM 79-08 (all measurements in ISO17025 accredited laboratory)

HOUSING AND FINISH

Housing	Aluminium
Optic	PMMA
Protector	Tempered glass
Housing finish	Polyester powder coating
Standard colour(s)	AKZO grey 900 sanded
Tightness level	IP 66
Impact resistance	IK 08

· Any other RAL or AKZO colour upon request

ELECTRICAL INFORMATION

Electrical class	Class I EU, Class II EU
Nominal voltage	220-240V – 50-60Hz
Surge protection options (kV)	10
Control protocol(s)	1-10V, DALI
Control options	AmpDim, Bi-power, Custom dimming profile, Photocell
Associated control system(s)	Owlet Nightshift
Sensor	PIR (optional)

OPTICAL INFORMATION

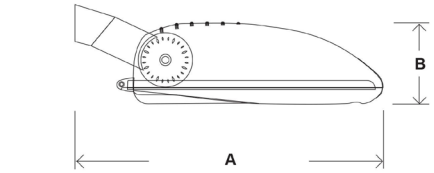
LED colour temperature	2700K (Warm White 727) 3000K (Warm White 730) 3000K (Warm White 830) 4000K (Neutral White 740)
Colour rendering index (CRI)	>70 (Warm White 727) >70 (Warm White 730) >80 (Warm White 830) >70 (Neutral White 740)
Upward Light Output Ratio (ULOR)	0%

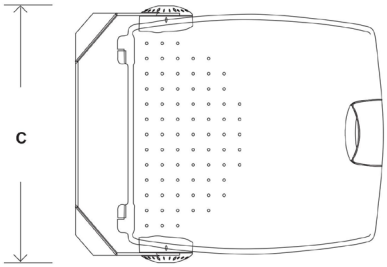
LIFETIME OF THE LEDS @ TQ 25°C

All configurations	100,000h - L90

DIMENSIONS AND MOUNTING

AxBxC (mm | inch)	NEOS 1 LED - 360x100x320 | 14.2x3.9x12.6 NEOS 2 LED - 441x140x398 | 17.4x5.5x15.7 NEOS 3 LED - 600x160x500 | 23.6x6.3x19.7
Weight (kg | lbs)	NEOS 1 LED - 3.4 | 7.5 NEOS 2 LED - 8 | 17.6 NEOS 3 LED - 8 | 17.6
Aerodynamic resistance (CxS)	NEOS 1 LED - 0.11 NEOS 2 LED - 0.18 NEOS 3 LED - 0.30
Mounting possibilities	Bracket enabling adjustable inclination





Neos LED | PERFORMANCE

Schréder

Luminaire	Number of LEDs	Current (mA)	Luminaire output flux (lm) Warm White 727		Luminaire output flux (lm) Warm White 730		Luminaire output flux (lm) Warm White 830		Luminaire output flux (lm) Neutral White 740		Power consumption (W)		Luminaire efficacy (lm/W)	Photometry
			Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Up to	
NEOS 1 LED	16	350	1600	2100	1800	2300	1600	2100	1900	2400	18.3	18.3	131	LENSO FLEX 2
	16	500	2200	2800	2500	3100	2200	2800	2600	3200	25.9	25.9	124	LENSO FLEX 2
	24	350	2500	3200	2800	3500	2500	3200	2900	3700	26.2	26.2	141	LENSO FLEX 2
	24	500	3300	4200	3700	4700	3300	4200	3900	4900	37.6	37.6	130	LENSO FLEX 2
NEOS 2 LED	32	350	3300	4200	3700	4700	3300	4200	3900	4900	34.5	34.5	142	LENSO FLEX 2
	32	500	4400	5600	4900	6200	4400	5600	5100	6400	49	49	131	LENSO FLEX 2
	48	350	5000	6300	5600	7100	5000	6300	5800	7300	50	50	146	LENSO FLEX 2
	48	500	6700	8400	7400	9400	6700	8400	7700	9700	73	73	133	LENSO FLEX 2
NEOS 3 LED	64	350	6500	8100	7300	9000	6500	8100	7500	9400	66.5	66.5	141	LENSO FLEX 2
	64	500	8600	10700	9600	11900	8600	10700	9900	12300	97	97	127	LENSO FLEX 2

Tolerance on LED flux is ± 7% and on total luminaire power ± 5 %

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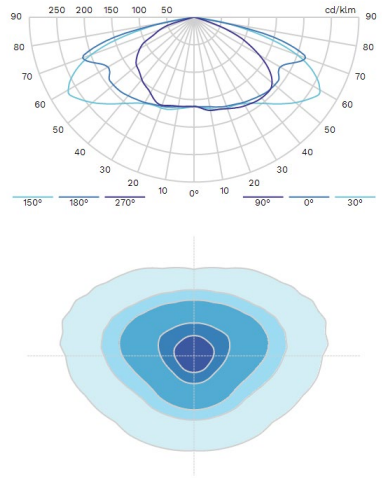

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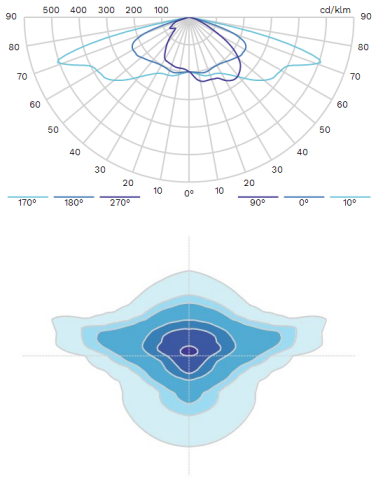

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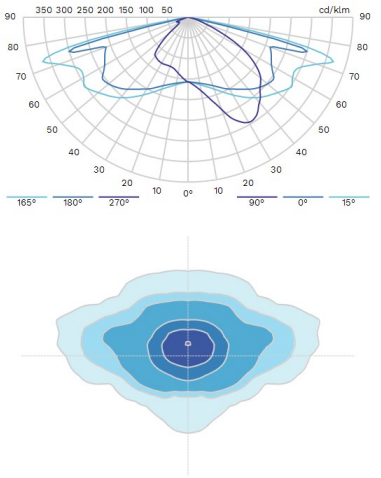

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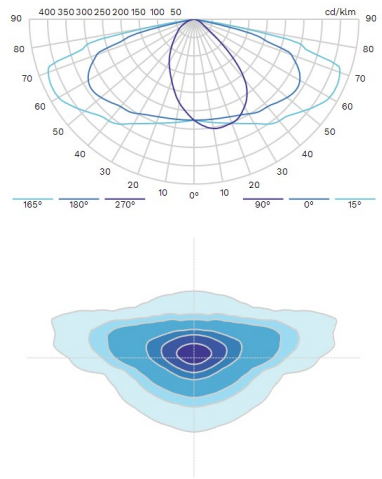

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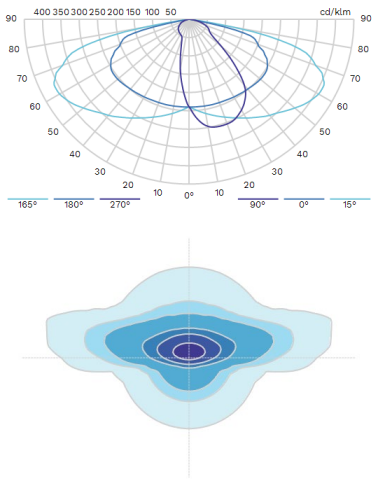

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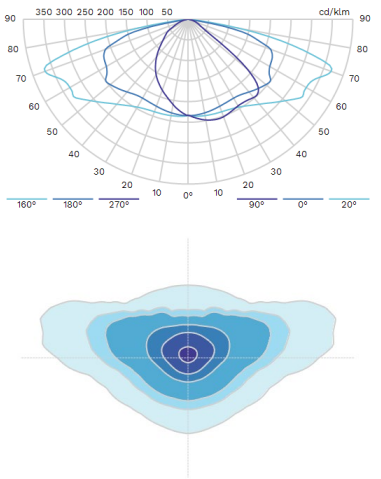

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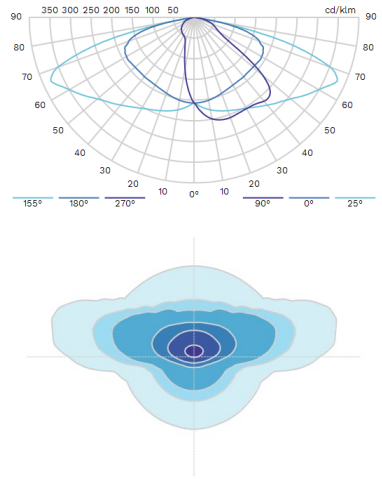

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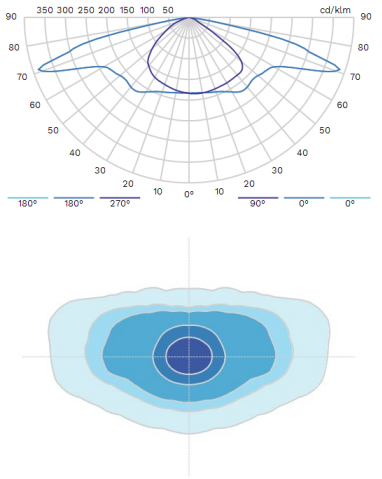

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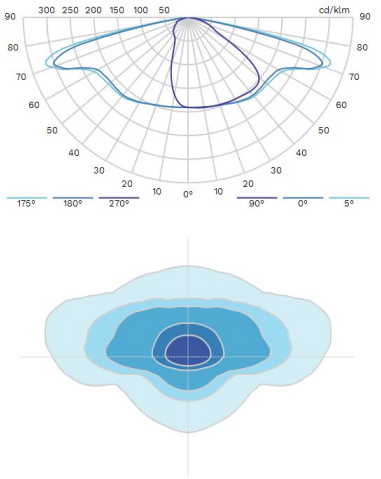

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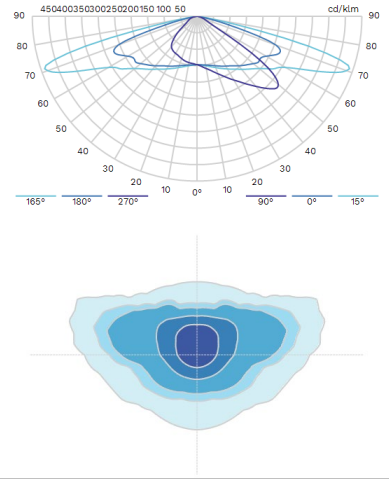

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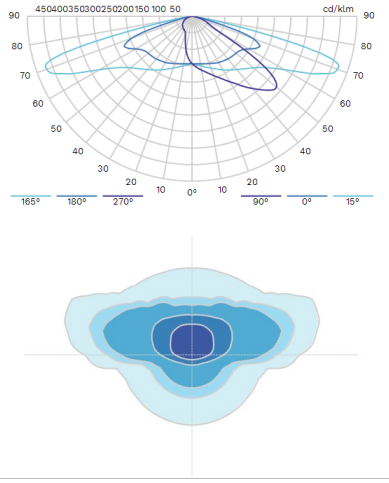

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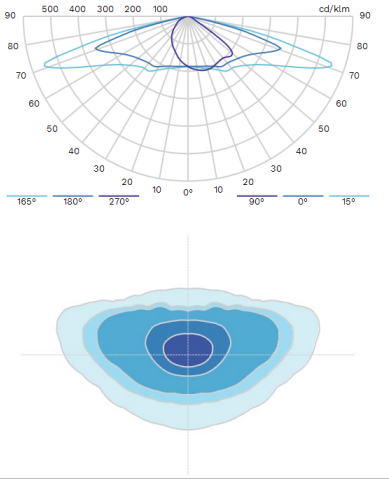

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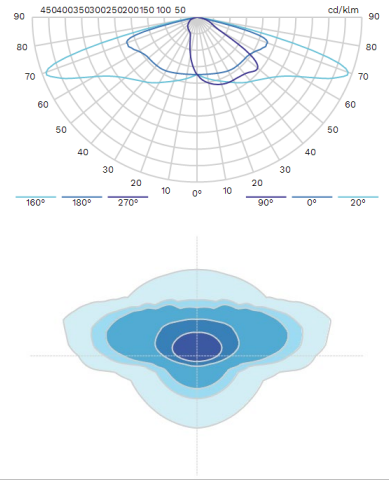

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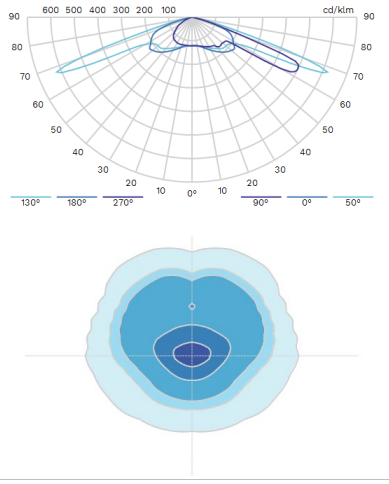

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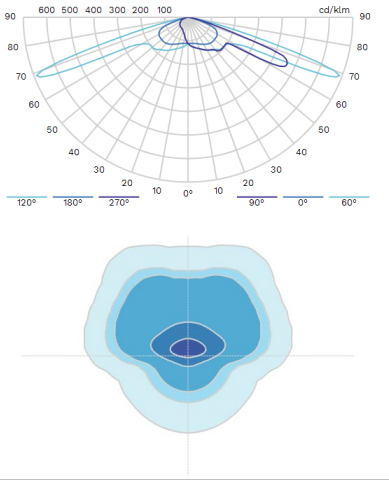

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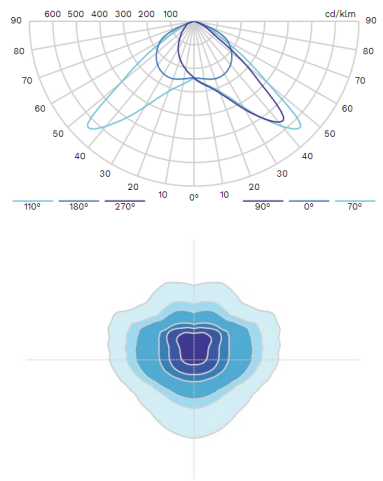

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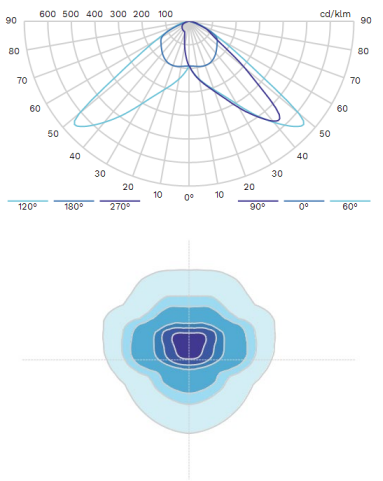

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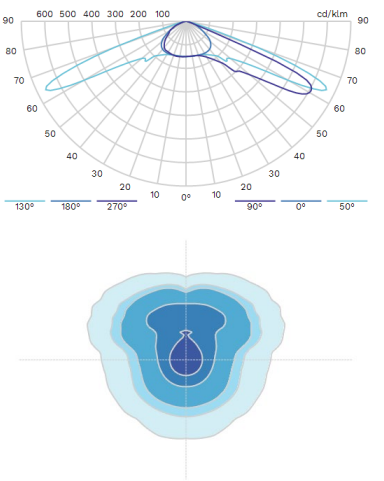

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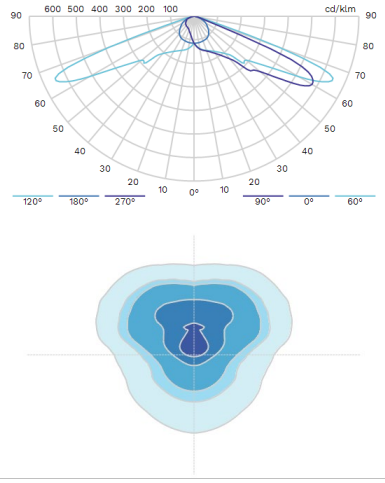

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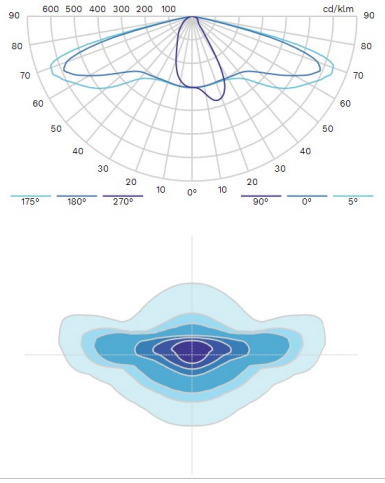

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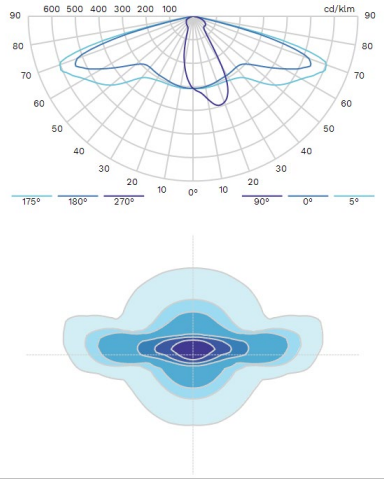

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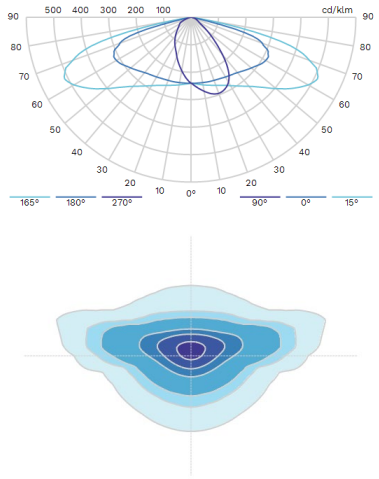

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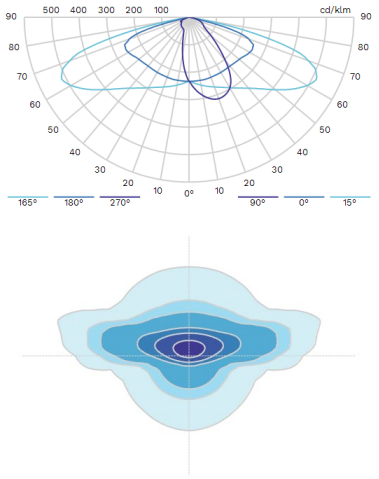

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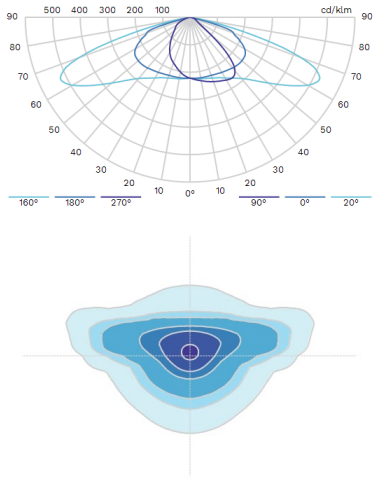

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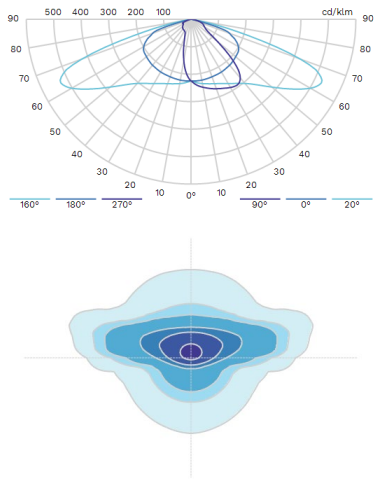

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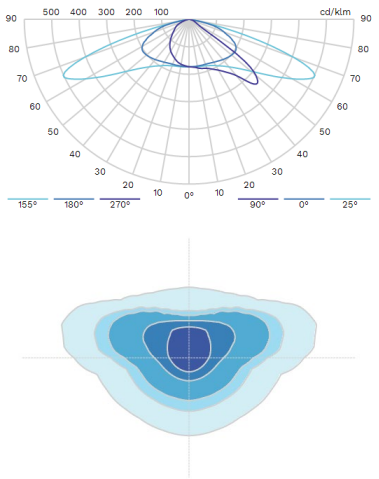

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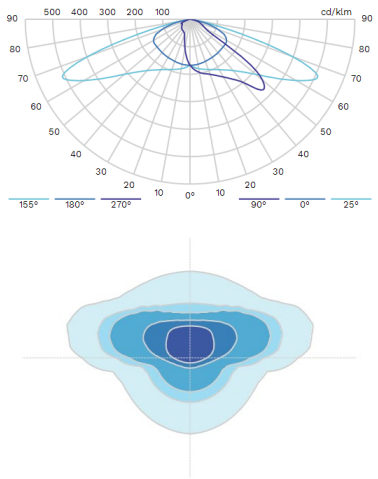

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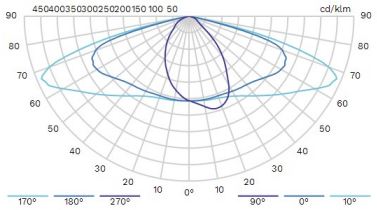

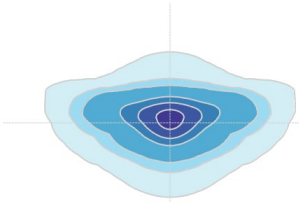

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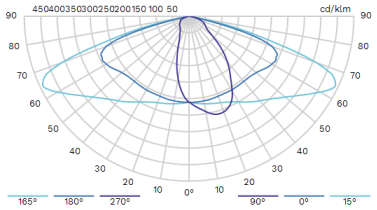

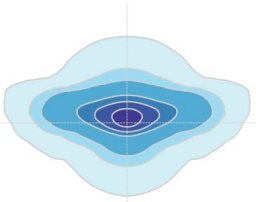

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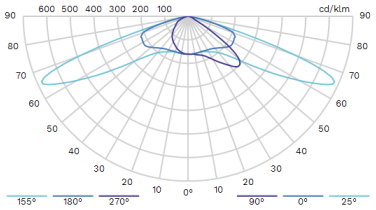

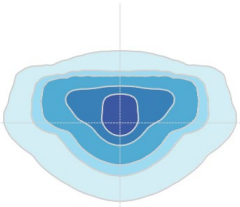

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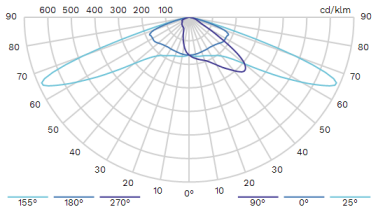
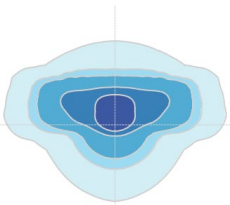
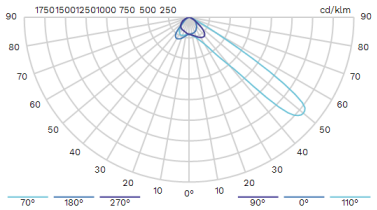
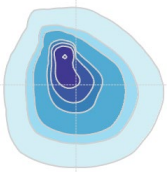




LENSO FLEX 2

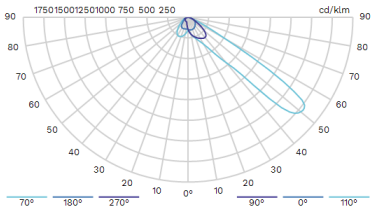
5144 Zebra left





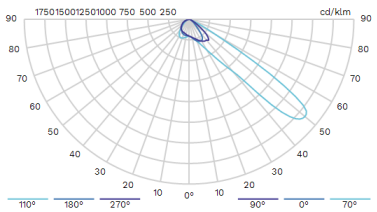
LENSO FLEX 2

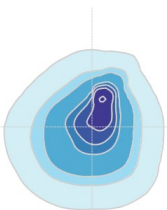
5144 Zebra left BL



LENSO FLEX 2

5145 Zebra right





LENSO FLEX 2

5145 Zebra right BL