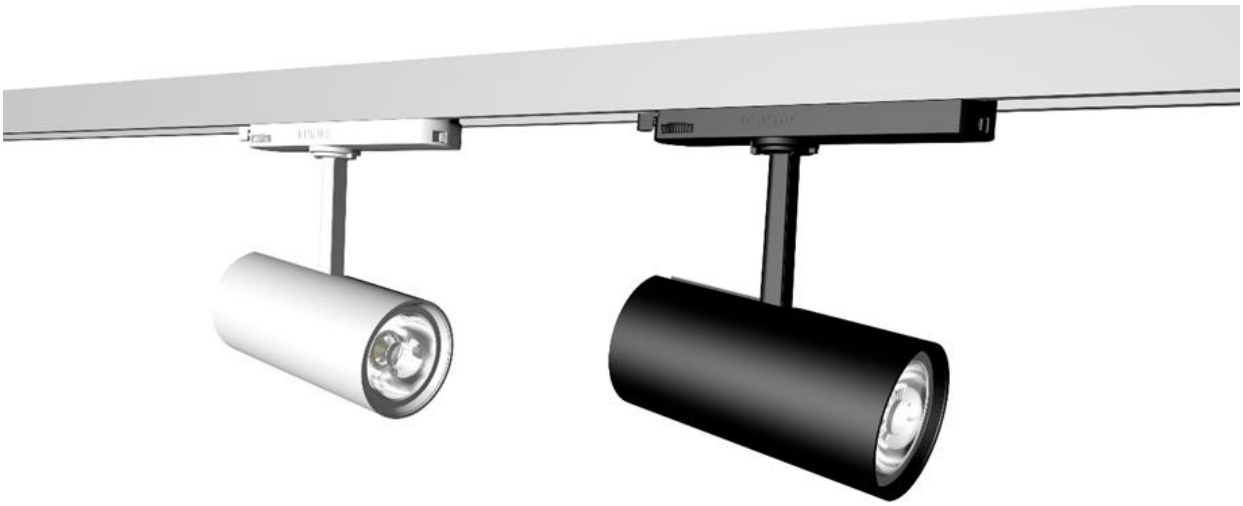
e^3 - sustainable lighting

https://www.oechsler.com/e3-sustainable-lighting



SUSTAINABLE LIGHTING

- Approx. 90 percent reduction of CO_2-consumption during manufacturing [1])
- Proven Product Carbon Footprint (PCF)
- Housing made of recycled and recyclable high performing polymer
- High-value surface without environmentally harmful (powder-) painting

LEADING ENERGY EFFICIENCY

- 1.000 to 3.700 lm luminous flux
- Up to 180 lm/W system efficiency at 1.000 to 1.999 lm
- Up to 140 lm/W system efficiency at 2.000 to 3.700 lm
- Highly efficient Oechsler Hybrid Optics (OHO) with plastic lens
- Up to 70% higher illuminance (lux) in the core light beam [2])

LEADING LIGHTING QUALITY & COMPACT DESIGN

- CRI > 90, focused core light beam and homogeneous light distribution
- Harmonic transition from the core light beam towards the peripheral area
- 4 beam angles, various light colours, optional anti-glare ring
- Adjustable without protective gloves
- Only 67 mm in diameter and 500 g in weight

MADE IN GERMANY

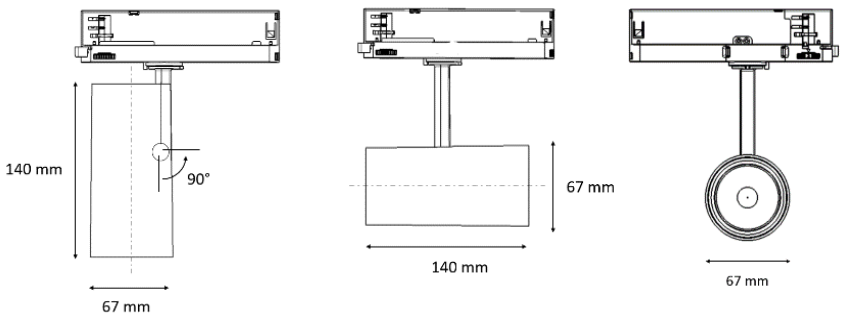
- Manufacturing on highest quality level and German environmental standards
- ISO 9001 and IATF 16949 (Automotive), ISO 14001, ISO 50001
- ENEC und EMC certified by VDE (German Association for Electrical, Electronic & Information Technologies)
- Photometric measurements by DIAL lab
- Agile supply chain with short transportations

[1]) compared to spot track lights with aluminium housing and reflector

[2]) compared to spot track lights with reflector

Type of luminaire	LED track light
Application	Accent lighting
LED luminous flux	1.000 to 3.700 lm
System efficiency	up to 180 lm/W (1.000 to 1.999 lm) up to 140 lm/W (2.000 to 3.700 lm)
PCF Cradle to Gate	Ø 4,18 kg CO_2e / track light (black) Ø 4,51 kg CO_2e / track light (white)
PCF Cradle to Grave (over 5 years)	Up to 99,1 kg CO_2e / track light (1.000 bis 1.999 lm) Up to 189 kg CO_2e / track light (2.000 bis 3.700 lm)
UGR	20,7 [3])
Mounting	3 phases power track (not suitable for vertical mounting)
Pan/tilt range	330° turning range, 90° swivel range
LED-Modules	Philips Fortimo SLM HE+
Driver	Philips Xitanium LED adapter driver
Light colour	927, Premium White: 930, 935, 940 additional light colours on request
Colour consistency	2 SDCM
Colour rendering index	>90
Beam angles	Super Spot, Spot, Flood, Wide Flood
LED lifetime	66.000 h L90B10 @ 25°C | (Spot, Flood) 50.000 h L80B10 @ 25°C | (Super Spot, Wide Flood)
Nominal voltage	220 – 240 V, 50/60 Hz
Housing	Recycled high performing polymer Matt, fine-structured surface
Cooling	passive
Luminaire colour	black (similar RAL 9004), white (similar RAL 9003), additional colours on request
Weight	0,5 kg
Warrenty	5 years
IP-Class	IP20
Protection Class	II
Test seals	CE, ENEC, EMV

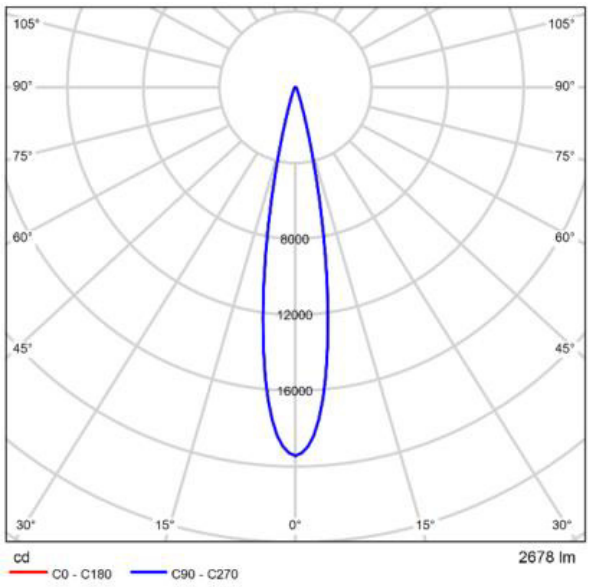
[3]) Super Spot



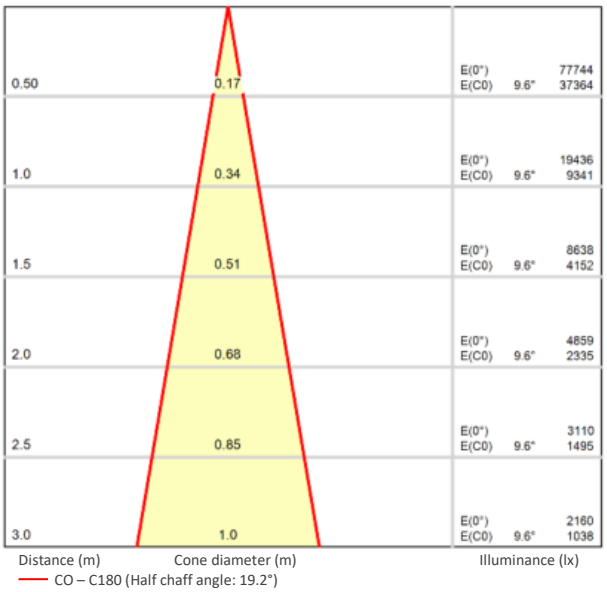
Super Spot

Luminous flux class	Light colour	System luminous flux	CRI	System wattage	System efficiency
1.000 – 1.499 lm	930	1195 lm	> 90	8,2 W	146 lm/W
	935	1250 lm	> 90	8,2 W	152 lm/W
	940	1340 lm	> 90	8,2 W	163 lm/W
1.500 – 1.999 lm	930	1620 lm	> 90	14,4 W	113 lm/W
	935	1695 lm	> 90	14,4 W	118 lm/W
	940	1810 lm	> 90	14,4 W	126 lm/W
2.000 – 2.499 lm	930	2190 lm	> 90	21,0 W	104 lm/W
	935	2295 lm	> 90	21,0 W	109 lm/W
	940	2450 lm	> 90	21,0 W	117 lm/W
2.500 – 3.000 lm	930	2680 lm	> 90	24,6 W	105 lm/W
	935	2805 lm	> 90	24,6 W	110 lm/W
	940	2875 lm	> 90	24,6 W	113 lm/W

Polar luminous intensity distribution



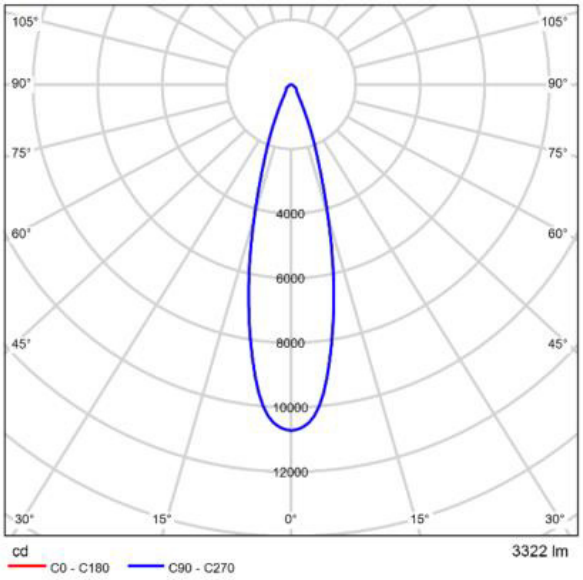
Cone diagram



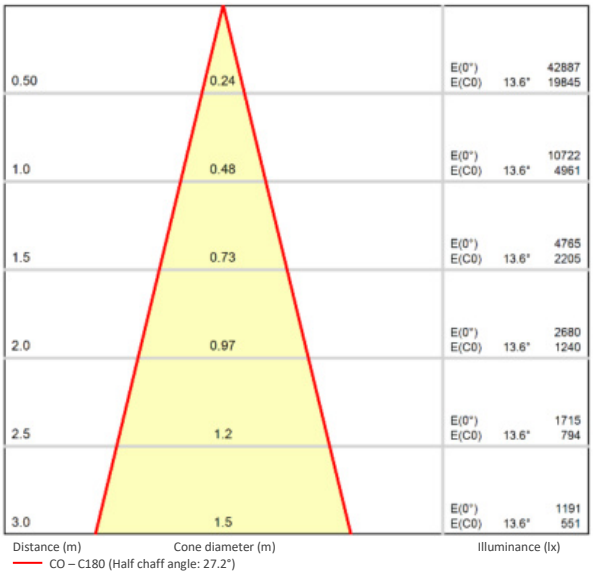
Spot

Luminous flux class	Light colour	System luminous flux	CRI	System wattage	System efficiency
1.000 – 1.499 lm	927	1255 lm	> 90	8,0 W	157 lm/W
	930	1365 lm	> 90	8,0 W	171 lm/W
	935	1400 lm	> 90	8,0 W	175 lm/W
	940	1470 lm	> 90	8,0 W	184 lm/W
1.500 – 1.999 lm	927	1685 lm	> 90	13,6 W	124 lm/W
	930	1835 lm	> 90	13,6 W	135 lm/W
	935	1885 lm	> 90	13,6 W	139 lm/W
	940	1980 lm	> 90	13,6 W	146 lm/W
2.000 – 2.499 lm	927	2255 lm	> 90	19,9 W	113 lm/W
	930	2470 lm	> 90	19,9 W	124 lm/W
	935	2540 lm	> 90	19,9 W	128 lm/W
	940	2660 lm	> 90	19,9 W	134 lm/W
2.500 – 2.999 lm	927	2740 lm	> 90	24,2 W	113 lm/W
	930	2725 lm	> 90	22,0 W	124 lm/W
	935	2800 lm	> 90	22,0 W	127 lm/W
	940	2940 lm	> 90	22,0 W	134 lm/W
3.000 – 3.700 lm	927	3235 lm	> 90	26,4 W	123 lm/W
	930	3510 lm	> 90	26,4 W	133 lm/W
	935	3610 lm	> 90	26,4 W	137 lm/W
	940	3695 lm	> 90	26,4 W	140 lm/W

Polar luminous intensity distribution



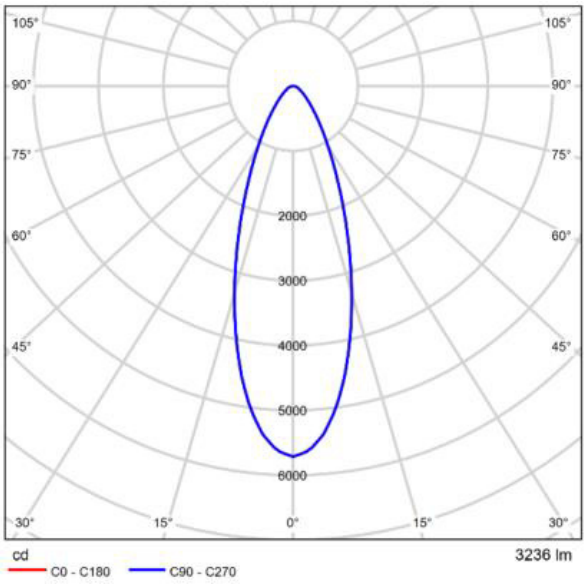
Cone diagram



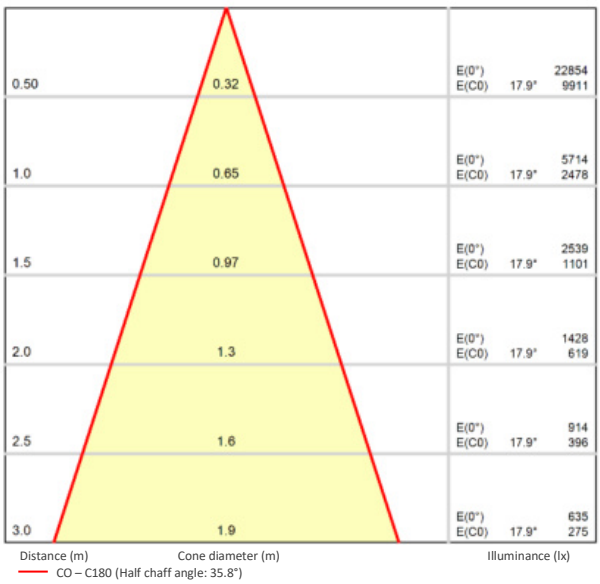
Flood

Luminous flux class	Light colour	System luminous flux	CRI	System wattage	System efficiency
1.000 – 1.499 lm	927	1220 lm	> 90	7,9 W	154 lm/W
	930	1320 lm	> 90	7,9 W	167 lm/W
	935	1360 lm	> 90	7,9 W	172 lm/W
	940	1430 lm	> 90	7,9 W	181 lm/W
1.500 – 1.999 lm	927	1630 lm	> 90	13,6 W	120 lm/W
	930	1780 lm	> 90	13,6 W	131 lm/W
	935	1830 lm	> 90	13,6 W	138 lm/W
	940	1920 lm	> 90	13,6 W	144 lm/W
2.000 – 2.499 lm	927	2190 lm	> 90	19,8 W	111 lm/W
	930	2395 lm	> 90	19,8 W	121 lm/W
	935	2460 lm	> 90	19,8 W	124 lm/W
	940	2580 lm	> 90	19,8 W	130 lm/W
2.500 – 2.999 lm	927	2660 lm	> 90	24,0 W	111 lm/W
	930	2645 lm	> 90	21,9 W	120 lm/W
	935	2720 lm	> 90	21,9 W	124 lm/W
	940	2850 lm	> 90	21,9 W	130 lm/W
3.000 – 3.700 lm	927	3150 lm	> 90	26,0 W	121 lm/W
	930	3420 lm	> 90	26,0 W	132 lm/W
	935	3515 lm	> 90	26,0 W	135 lm/W
	940	3560 lm	> 90	26,0 W	137 lm/W

Polar luminous intensity distribution



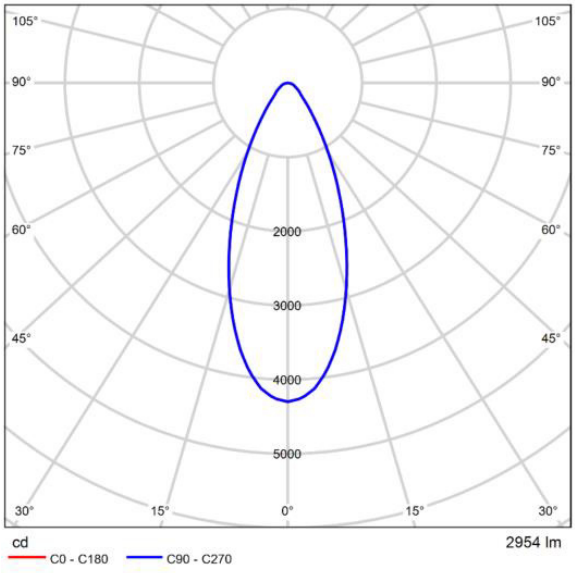
Cone diagram



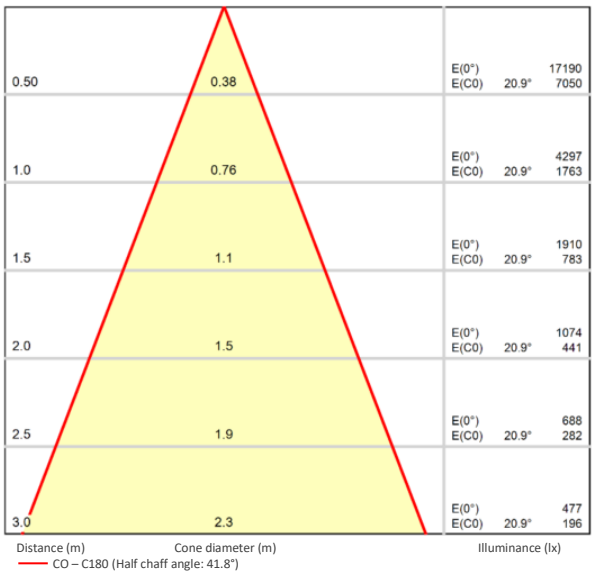
Wide Flood

Luminous flux class	Light colour	System luminous flux	CRI	System wattage	System efficiency
1.000 – 1.499 lm	930	1270 lm	> 90	8,1 W	157 lm/W
	935	1365 lm	> 90	8,1 W	169 lm/W
	940	1420 lm	> 90	8,1 W	175 lm/W
1.500 – 1.999 lm	930	1745 lm	> 90	14,1 W	124 lm/W
	935	1875 lm	> 90	14,1 W	133 lm/W
	940	1950 lm	> 90	14,1 W	138 lm/W
2.000 – 2.499 lm	930	2155 lm	> 90	20,9 W	103 lm/W
	935	2315 lm	> 90	20,9 W	111 lm/W
	940	2405 lm	> 90	20,9 W	115 lm/W
2.500 – 2.999 lm	930	2660 lm	> 90	24,6 W	108 lm/W
	935	2855 lm	> 90	24,6 W	116 lm/W
	940	2970 lm	> 90	24,6 W	121 lm/W
3.000 – 3.700 lm	930	3250 lm	> 90	27,9 W	116 lm/W
	935	3315 lm	> 90	27,9 W	119 lm/W
	940	3380 lm	> 90	27,9 W	121 lm/W

Polar luminous intensity distribution



Cone diagram



Glare Ring

Colour	black (similar RAL 9004)
Material	Up to 100% Recycled polymer Matt, fine-structured surface
Mounting	Assembly ex works
Fastening	Bayonet lock
Dimensions	luminaire extends by 10 mm
UGR	< 18 [4])

[4]) Super Spot, Spot

Luminous flux and illuminance with glare ring

	Super Spot	Spot	Flood	Wide Flood
Luminous flux [lm]	95 %	93 %	90 %	90 %

Illuminance at half scattering angle:

- Super Spot, Spot: no reduction
- Flood, Wide Flood: marginal reduction in the peripheral area