



Metaspace is a new pole-top luminaire series with innovative light sources and optics. It is designed to meet high demands for sustainable illumination. Excellent glare control is achieved by indirect reflectors with LEDs which are completely shielded from view. These precise optics direct light solely onto the target area – the ground. Stray light into the sky is avoided. By using tuneable warm white colour temperatures, the orientation behaviour of insects remains undisturbed.

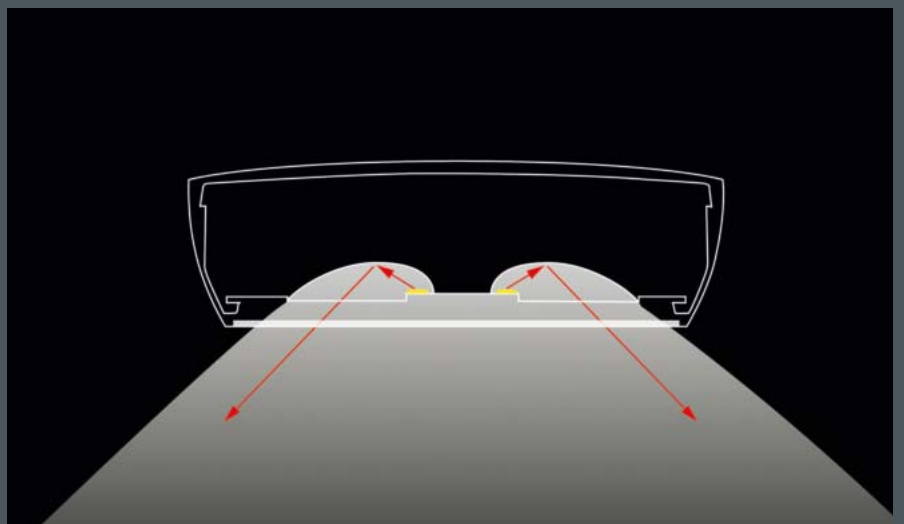


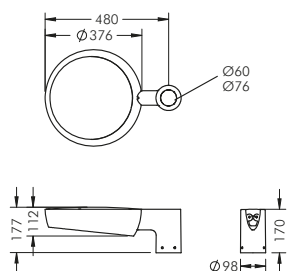
With dark sky compliant optics and perfect glare control Metaspace delivers the best light quality for humans and nocturnal animals.



With their exemplary design the luminaires are ideal for use in urban or landscaped architecture.

The light of LED modules, which are completely shielded from view, is projected onto an indirect reflector and redirected on the target area. This optic achieves excellent glare control.





Metaspace

With highly efficient LED modules, integral temperature monitoring device, CRI: > 80, Colour tolerance: max. 3 SDCM
Service life: L80/B20 > 50 000 h
protection class I, IP65 IK08
windage area AW 0.056 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient metallised PC reflector,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
5 stainless steel screws,
pole top fitter for poles Ø 60/76 mm,
4 M8 grub screws,
M20 cable gland,
with 8 m cable H07RN-F3G1,
integral driver (AC/DC)

Metaspace, asymmetrical beam

Part number*	Colour	Weight	Light source	Luminous flux	Main beam angle γ
8 215 346 049	black	5.1 kg	6 x LED module 6.3 W (38 W)	3741 lm	63°
8 215 366 049	white				
8 215 356 049	silver grey		warm white (3000 K)		

Metaspace, asymmetrical beam, High Output

Part number*	Colour	Weight	Light source	Luminous flux	Main beam angle γ
8 216 346 049	black	5.1 kg	6 x LED module 10.8 W (65 W)	6072 lm	63°
8 216 366 049	white				
8 216 356 049	silver grey		warm white (3000 K)		

Metaspace, asymmetrical wide beam

Part number*	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 215 346 089	black	5.1 kg	6 x LED module 6.3 W (38 W)	3661 lm	C 0 – 180 C 90 – 270
8 215 366 089	white				64° 133°
8 215 356 089	silver grey		warm white (3000 K)		

Metaspace, asymmetrical wide beam High Output

Part number*	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 216 346 089	black	5.1 kg	6 x LED Modul 10.8 W (65 W)	5942 lm	C 0 – 180 C 90 – 270
8 216 366 089	white				64° 133°
8 216 356 089	silver grey		warm white (3000 K)		

Metaspace, lateral wide beam

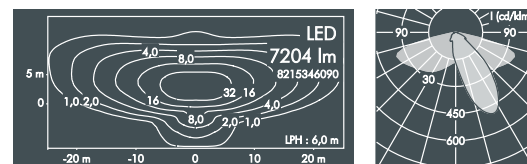
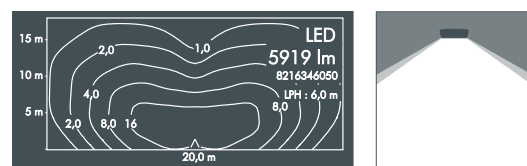
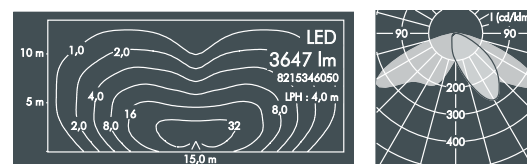
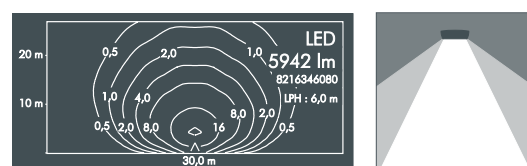
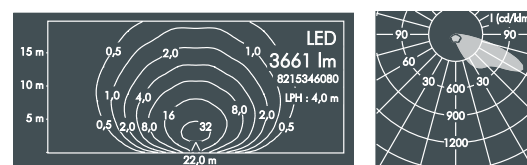
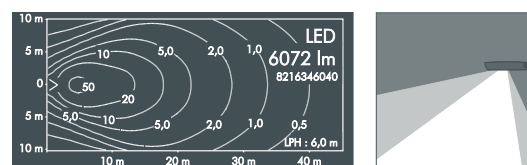
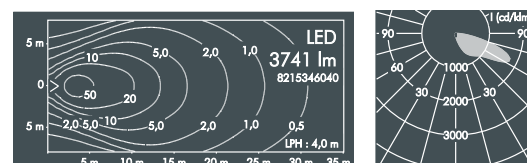
Part number*	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 215 346 059	black	5.1 kg	6 x LED module 6.3 W (38 W)	3647 lm	C 0 – 180 C 90 – 270
8 215 366 059	white				46° 142°
8 215 356 059	silver grey		warm white (3000 K)		

Metaspace, lateral wide beam, High Output

Part number*	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 216 346 059	black	5.1 kg	6 x LED module 10.8 W (65 W)	5919 lm	C 0 – 180 C 90 – 270
8 216 366 059	white				46° 142°
8 216 356 059	silver grey		warm white (3000 K)		

Metaspace, Street Optic (direct optic)

Part number*	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 215 346 099	black	5.0 kg	6 x LED module 8.6 W (52 W)	7204 lm	C 0 – 180 C 90 – 270
8 215 366 099	white				36° 155°
8 215 356 099	silver grey		warm white (3000 K)		



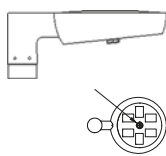
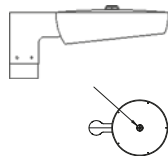
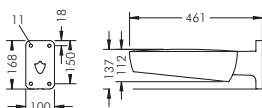
* Find more versions on page 5.

LED

Luminaires available

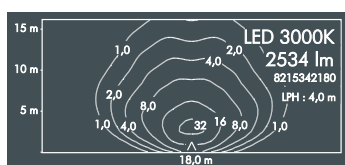
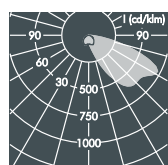
in 2200 K or other colour temperatures upon request



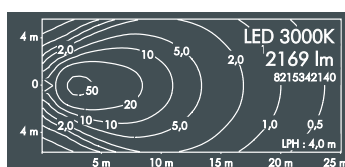
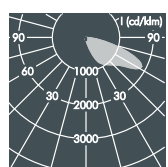


The luminaires can be equipped with a Zhaga-18 interface for communication and sensing on the top and at the bottom.

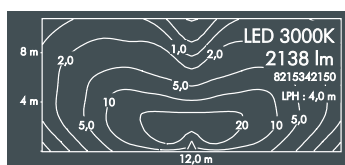
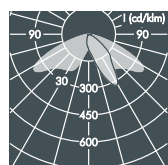
Part number	Description
. . . . 1	Luminaire for wall mounting
. . . 7	Protection class II luminaire
. . . 8	Luminaire in "High Output" version for protection class II
. 7 . . .	Luminaire with warm white LED module (2700 K)
. 1 . .	Dimmable luminaire (DALI)
. 3 . .	Luminaire with Zhaga-18 interface for communication (top)
. 4 . .	Luminaire with Zhaga-18 interface for sensing (bottom)
. 5 . .	Luminaire with Zhaga-18 interface for communication (top) and sensing (bottom)



Metaspace, Adjustable White, asymmetrical wide beam						
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)	
8 215 342 189	black	5.1 kg	12 x LED warm white (2200 K) and 12 x LED warm white (3000 K) (max 27 W)	2091 lm to 2534 lm	C 0 – 180°	C 90 – 270°
8 215 362 189	white				60°	116°
8 215 352 189	silver grey					

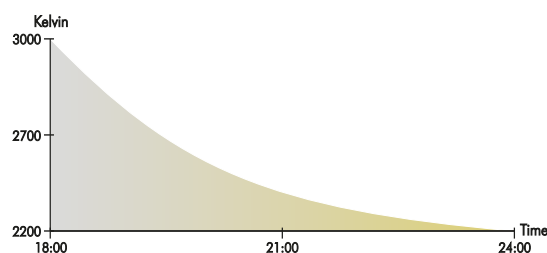


Metaspace, Adjustable White, asymmetrical beam					
Part number	Colour	Weight	Light source	Luminous flux	Main beam angle γ γ
8 215 342 149	black	5.1 kg	12 x LED warm white (2200 K) and 12 x LED warm white (3000 K) (max 27 W)	2017 lm to 2169 lm	63°
8 215 362 149	white				
8 215 352 149	silver grey				



Metaspace, Adjustable White, lateral wide beam					
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 215 342 159	black	5.1 kg	12 x LED warm white (2200 K) and 12 x LED warm white (3000 K) (max 27 W)	1989 lm to 2138 lm	C 0 – 180°
8 215 362 159	white				46°
8 215 352 159	silver grey				142°

Metaspace Adjustable White



With the Adjustable White light control colour temperatures can be adapted to the needs of sustainable illumination during the night hours and throughout the season.



Operating luminaires at approximately 3000 Kelvin is efficient and recommended during busy hours.



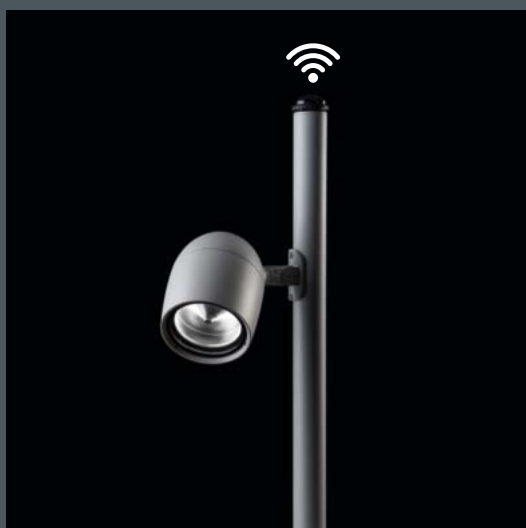
Later in the evening the luminaires are switched to operate with warm white colour temperatures. The light quality becomes more inviting and insects are attracted less.



During the late hours the luminaires are operated with 2200 Kelvin and a low proportion of blue light. The orientation behaviour of insects and nocturnal animals is disturbed only minimally.

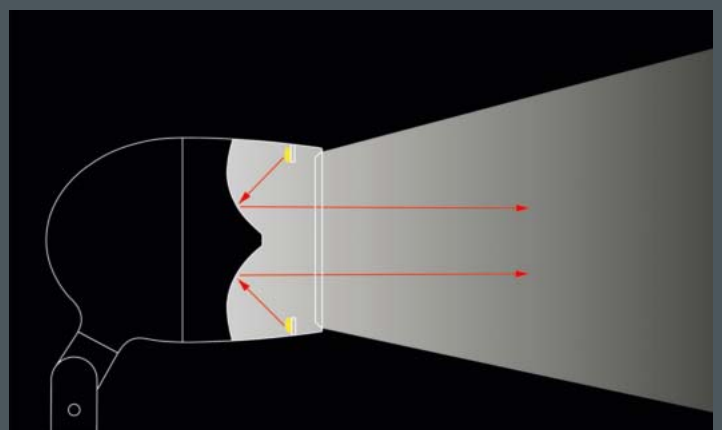


The new floodlight series Metaspot combines exemplary design with innovative optics. The elliptical shape of the luminaires harmonizes especially well with landscape architecture. The new Darkring optics are a breakthrough development for effective glare control. For Metaspot a pole-top fitter with an integral Zhaga-18 interface is available as an accessory. By the use of an antenna, up to 4 luminaires on one pole can be controlled and monitored individually. In addition to pole luminaires, there are versions for surface mounting.

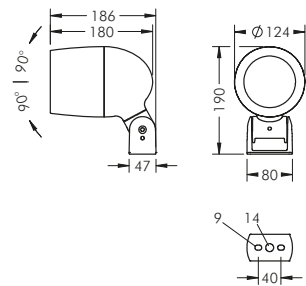


Green Heart,
University of Birmingham
Lighting design: Speirs Major, London

Metaspot pole luminaires with various sizes and optics can be combined for imaginative lighting of exterior spaces. The floodlights are equipped with a turn-and-tilt fixing system for flexible orientation. Possible applications range from uniform illumination of paths and public areas to highlighting of objects. A gobo projector version completes the series.



With the innovative Darkring optic light from a circular LED board is projected onto the target area via an indirect reflector. The light source is shielded from view and excellent glare control is achieved.

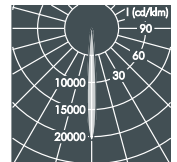
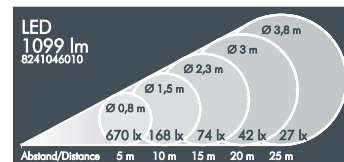


Metaspot 1 with mounting bracket

With high performance LED module (Zhaga), integral temperature monitoring device, CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area AW 0.023 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient aluminium reflector or PMMA lens (Street Optic),
all exterior steel parts are stainless steel, tempered safety glass, silicon gasket,
toolless twist lock for closure,
mounting bracket: 2 drilled holes Ø 9 mm, spacing 40 mm, 1 centre hole Ø 14 mm,
tilt range 180°, M20 cable gland,
integral driver (AC/DC)

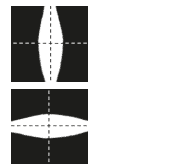
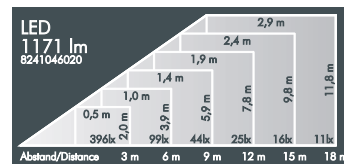
Metaspot 1, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 046 019	black	2.1 kg	1 x LED module 15 W warm white (3000 K)	1099 lm	8°
8 241 066 019	white				
8 241 056 019	silver grey				



Metaspot 1, linear beam spread, vertical

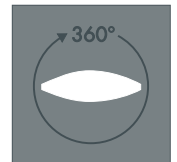
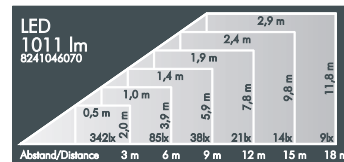
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 046 029	black	2.1 kg	1 x LED module 15 W warm white (3000 K)	1171 lm	C 0 – 180
8 241 066 029	white				C 90 – 270
8 241 056 029	silver grey				36°



. 3. Luminaire with linear beam spread, horizontal

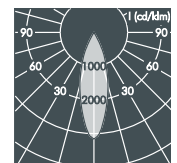
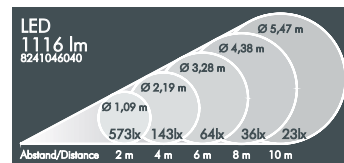
Metaspot 1, linear beam spread, rotatable

Part number	Colour	Description	Luminous flux	Beam angle γ (FWHM)
8 241 046 079	black	Luminaire with external ribbed glass spreader lens, continuously adjustable through 360° from outside the luminaire	1011 lm	C 0 – 180
8 241 066 079	white			C 90 – 270
8 241 056 079	silver grey			36°



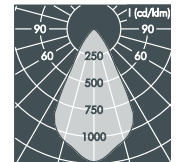
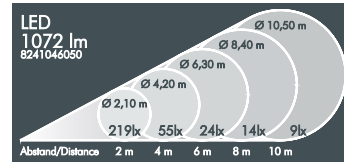
Metaspot 1, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 046 049	black	2.1 kg	1 x LED module 15 W warm white (3000 K)	1116 lm	31°
8 241 066 049	white				
8 241 056 049	silver grey				



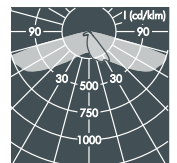
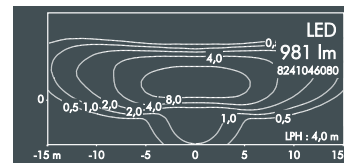
Metaspot 1, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 046 059	black	2.1 kg	1 x LED module 15 W warm white (3000 K)	1072 lm	55°
8 241 066 059	white				
8 241 056 059	silver grey				



Metaspot 1, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 046 089	black	2.2 kg	1 x LED module 14 W warm white (3000 K)	981 lm	C 0 – 180
8 241 066 089	white				C 90 – 270
8 241 056 089	silver grey				41°



Part number	Description
. . . 5	Protection class II luminaire
. 7 . . .	Luminaire with warm white LED module (2700 K)
. 1 . .	Dimmable luminaire (DALI)



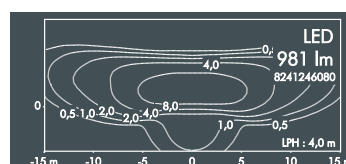
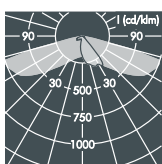
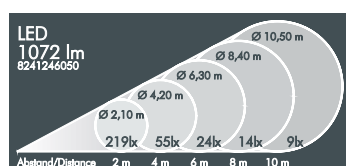
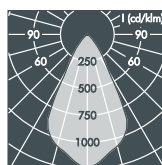
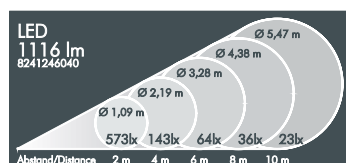
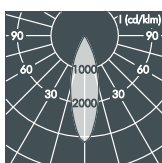
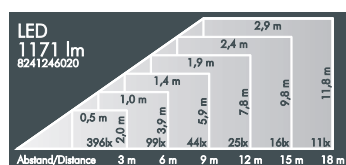
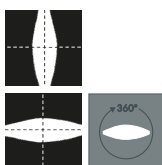
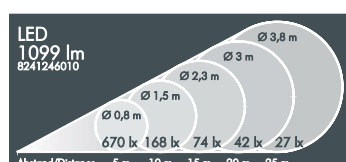
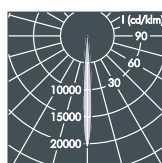
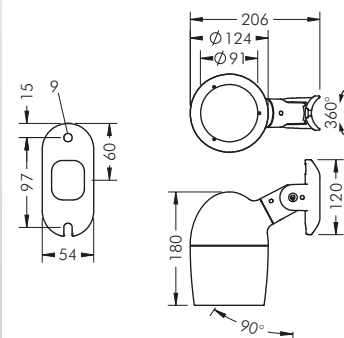
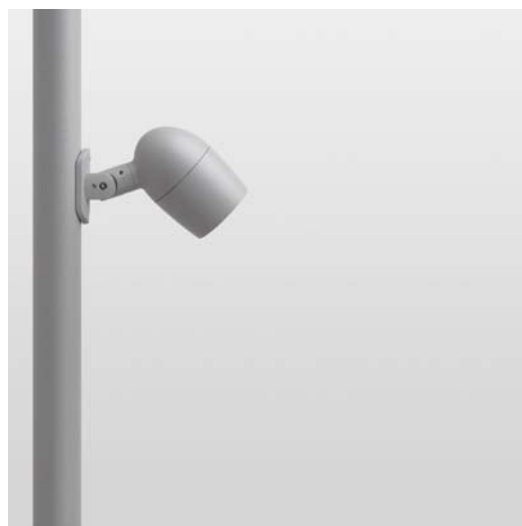
LED

Luminaires available
in 2200 K or other colour temperatures upon request



Metaspot 1 pole luminaire

With high performance LED module (Zhaga),
integral temperature monitoring device,
CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.026 m²
corrosion-resistant die cast aluminium housing AlSi12,
polyester powder coated,
highly efficient aluminium reflector or
PMMA lens (Street Optic),
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm,
tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm,
1 centre hole Ø 40 mm, tilt range 90°,
swivel range 360°, M20 cable gland,
integral driver (AC/DC)



Metaspot 1 pole luminaire, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 246 019	black	2.1 kg	1 x LED module 15 W	1099 lm	8°
8 241 266 019	white		warm white (3000 K)		
8 241 256 019	silver grey				

Metaspot 1 pole luminaire, linear beam spread, vertical

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 246 029	black	2.1 kg	1 x LED module 15 W	1171 lm	C 0 - 180
8 241 266 029	white		warm white (3000 K)		C 90 - 270
8 241 256 029	silver grey				36°

... 3. Luminaire with linear beam spread, horizontal

... 7. Luminaire with linear beam spread, rotatable

Metaspot 1 pole luminaire, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 246 049	black	2.1 kg	1 x LED module 15 W	1116 lm	31°
8 241 266 049	white		warm white (3000 K)		
8 241 256 049	silver grey				

Metaspot 1 pole luminaire, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 246 059	black	2.1 kg	1 x LED module 15 W	1072 lm	55°
8 241 266 059	white		warm white (3000 K)		
8 241 256 059	silver grey				

Metaspot 1 pole luminaire, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 241 246 089	black	2.2 kg	1 x LED module 14 W	981 lm	C 0 - 180
8 241 266 089	white		warm white (3000 K)		C 90 - 270
8 241 256 089	silver grey				41°

Part number	Description
... 5 ...	Protection class II luminaire
... 7 ...	Luminaire with warm white LED module (2700 K)
... 1 ...	Dimmable luminaire (DALI)



LED

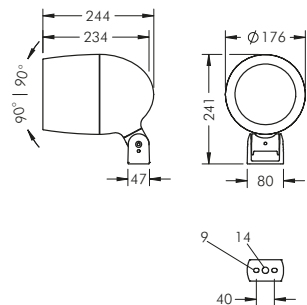
Luminaires available

in 2200 K or other colour temperatures upon request



Accessories Metaspot 1

Part number	Description
129 0 728 940	Radial louvre, internal, factory fitted
129 0 752 000	Honeycomb louvre, internal, factory fitted
	Colour
122 0 571 940	black
122 0 571 960	white
122 0 571 950	silver grey
	Cowl, Length 38 mm
122 0 631 940	black
122 0 631 960	white
122 0 631 950	silver grey
	Cowl, Length 63 mm

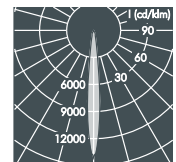
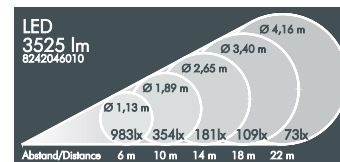


Metaspot 2 with mounting bracket

With high performance LED module (Zhaga), integral temperature monitoring device, CRI: > 80, Colour tolerance: 3 SDCM
Service life: L90/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area AW 0.042 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient aluminium reflector or lens made of optical silicon (Street Optic),
all exterior steel parts are stainless steel, tempered safety glass, silicon gasket,
toolless twist lock for closure,
mounting bracket: 2 drilled holes Ø 9 mm, spacing 40 mm, 1 centre hole Ø 14 mm,
tilt range 180°, M20 cable gland,
integral driver (AC/DC)

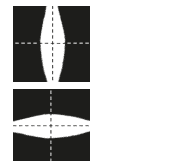
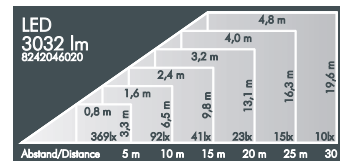
Metaspot 2, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 046 019	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3525 lm	10°
8 242 066 019	white				
8 242 056 019	silver grey				



Metaspot 2, linear beam spread, vertical

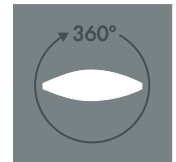
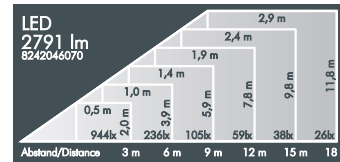
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 046 029	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3032 lm	C 0 – 180
8 242 066 029	white				C 90 – 270
8 242 056 029	silver grey				36°



. 3. Luminaire with linear beam spread, horizontal

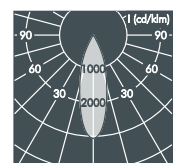
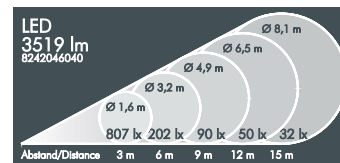
Metaspot 2, linear beam spread, rotatable

Part number	Colour	Description	Luminous flux	Beam angle γ (FWHM)
8 242 046 079	black	Luminaire with external ribbed glass spreader lens, continuously adjustable through 360° from outside the luminaire	2791 lm	C 0 – 180
8 242 066 079	white			C 90 – 270
8 242 056 079	silver grey			36°



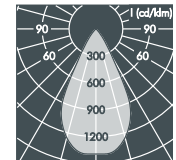
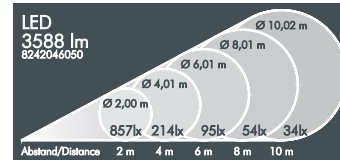
Metaspot 2, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 046 049	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3519 lm	30°
8 242 066 049	white				
8 242 056 049	silver grey				



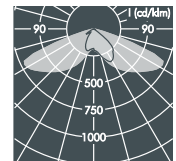
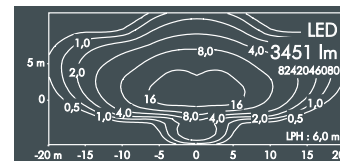
Metaspot 2, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 046 059	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3588 lm	53°
8 242 066 059	white				
8 242 056 059	silver grey				



Metaspot 2, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 046 089	black	3.7 kg	1 x LED module 35 W warm white (3000 K)	3451 lm	C 0 – 180
8 242 066 089	white				C 90 – 270
8 242 056 089	silver grey				51°



Part number	Description
. . . 6	Protection class II luminaire
. 7 . . .	Luminaire with warm white LED module (2700 K)
. 1 . .	Dimmable luminaire (DALI)
. 3 . .	Luminaire with Zhaga-18 interface for communication



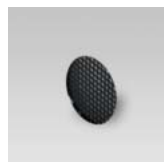
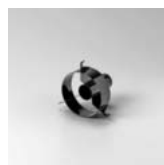
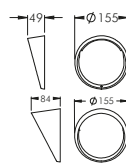
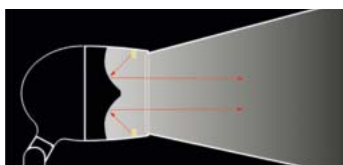
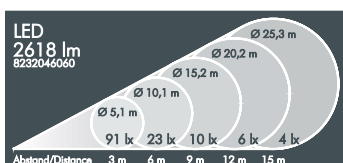
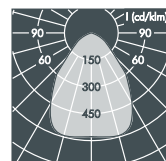
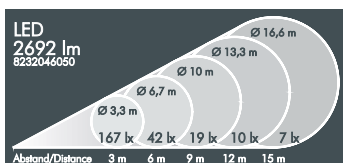
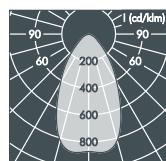
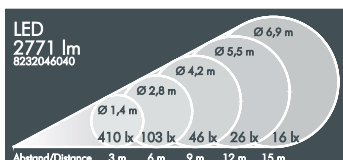
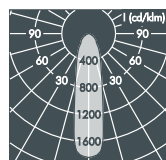
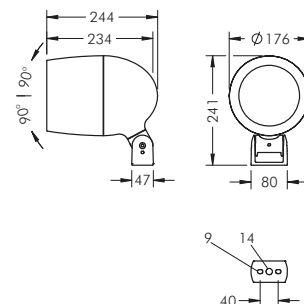
LED

Luminaires available
in 2200 K or other colour temperatures upon request



Metaspot 2 Darkring Optic with mounting bracket

With highly efficient LED modules,
integral temperature monitoring device,
CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.042 m²
corrosion-resistant die cast aluminium housing AlSi12,
polyester powder coated,
light source completely shielded,
high gloss aluminum reflector,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
mounting bracket: 2 drilled holes Ø 9 mm,
spacing 40 mm, 1 centre hole Ø 14 mm,
tilt range 180°, M20 cable gland,
integral driver (AC/DC)



Metaspot 2 Darkring Optic, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 046 049	black	3.8 kg	3 x LED module 13 W (39 W) warm white (3000 K)	2771 lm	27°
8 232 066 049	white				
8 232 056 049	silver grey				

Metaspot 2 Darkring Optic, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 046 059	black	3.8 kg	3 x LED module 13 W (39 W) warm white (3000 K)	2692 lm	58°
8 232 066 059	white				
8 232 056 059	silver grey				

Metaspot 2 Darkring Optic, extra wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 046 069	black	3.8 kg	3 x LED module 13 W (39 W) warm white (3000 K)	2618 lm	81°
8 232 066 069	white				
8 232 056 069	silver grey				

Part number	Description
... 6 ...	Protection class II luminaire
... 7 ...	Luminaire with warm white LED module (2700 K)
... 1 ...	Dimmable luminaire (DALI)
... 3 ...	Luminaire with Zhaga-18 interface for communication

Accessories Metaspot 2 external, for retro-fitting

Part number		Description: Cowl , external, stainless steel	
Part number	Colour	Part number	Colour
122 0 572 940	black	122 0 632 940	black
122 0 572 960	white	122 0 632 960	white
122 0 572 950	silver grey	122 0 632 950	silver grey

Accessories Metaspot 2 internal, factory fitted (not available for Darkring Optic/Street Optic)

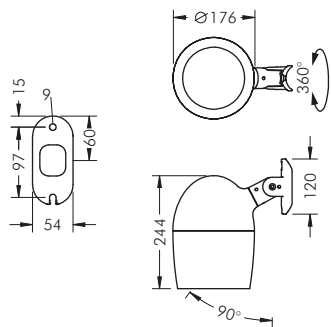
Part number	Description
129 0 729 940	Radial louvre , internal (factory fitted), to reduce lateral glare

Part number	Description
129 0 893 000	Honeycomb louvre , internal (factory fitted), to avoid glare

LED

Luminaires available
in 2200 K or other colour temperatures upon request



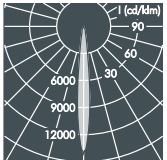
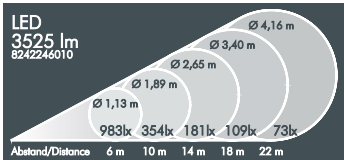


Metaspot 2 pole luminaire

With high performance LED module (Zhaga), integral temperature monitoring device, CRI: > 80, Colour tolerance: 3 SDCM
Service life: L90/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.045 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient aluminium reflector or lens made of optical silicon (Street Optic),
all exterior steel parts are stainless steel, tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm, tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm, 1 centre hole Ø 40 mm, tilt range 90°,
swivel range 360°, M20 cable gland, integral driver (AC/DC)

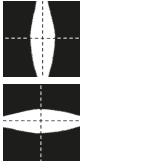
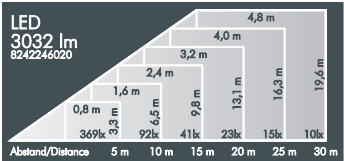
Metaspot 2 pole luminaire, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 246 019	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3525 lm	10°
8 242 266 019	white				
8 242 256 019	silver grey				



Metaspot 2 pole luminaire, linear beam spread, vertical

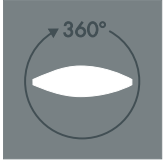
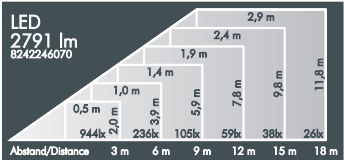
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 246 029	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3032 lm	C 0 – 180
8 242 266 029	white				C 90 – 270
8 242 256 029	silver grey				36°



. 3. Luminaire with linear beam spread, horizontal

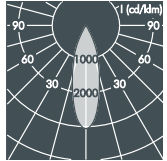
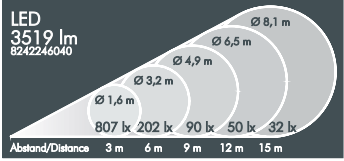
Metaspot 2 pole luminaire, linear beam spread, rotatable

Part number	Colour	Description	Luminous flux	Beam angle γ (FWHM)
8 242 246 079	black	Luminaire with external ribbed glass spreader lens, continuously adjustable through 360° from outside the luminaire	2791 lm	C 0 – 180
8 242 266 079	white			C 90 – 270
8 242 256 079	silver grey			36°



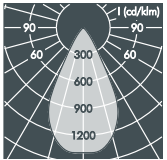
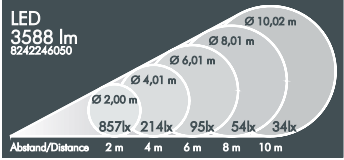
Metaspot 2 pole luminaire, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 246 049	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3519 lm	30°
8 242 266 049	white				
8 242 256 049	silver grey				



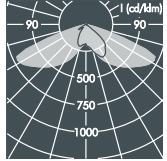
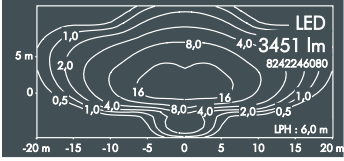
Metaspot 2 pole luminaire, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 246 059	black	3.6 kg	1 x LED module 35 W warm white (3000 K)	3588 lm	53°
8 242 266 059	white				
8 242 256 059	silver grey				



Metaspot 2 pole luminaire, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 242 246 089	black	3.7 kg	1 x LED module 35 W warm white (3000 K)	3451 lm	C 0 – 180
8 242 266 089	white				C 90 – 270
8 242 256 089	silver grey				51°



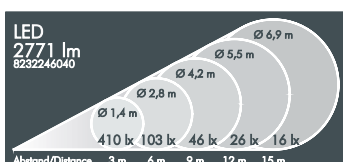
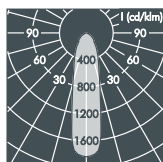
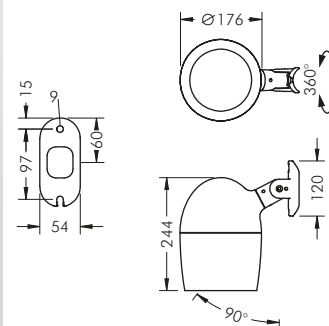
Part number	Description
. . . 6	Protection class II luminaire
. 7	Luminaire with warm white LED module (2700 K)
. 1	Dimmable luminaire (DALI)
. 2	Dimmable luminaire (DALI D4i)
. 3	Luminaire with Zhaga-18 interface for communication

LED Luminaire available in 2200 K or other colour temperatures upon request



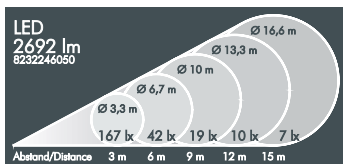
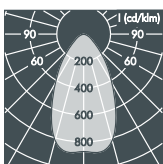
Metaspot 2 Darkring Optic pole luminaire

With highly efficient LED modules,
integral temperature monitoring device,
CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.045 m²
corrosion-resistant die cast aluminium housing AlSi12,
polyester powder coated,
light source completely shielded,
high gloss aluminum reflector,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm,
tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm,
1 centre hole Ø 40 mm, tilt range 90°,
swivel range 360°, M20 cable gland,
integral driver (AC/DC)



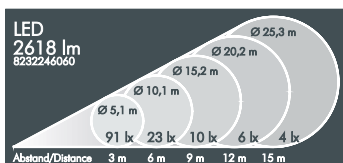
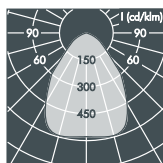
Metaspot 2 Darkring Optic pole luminaire, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 246 049	black	3.8 kg	3 x LED module 13 W	2271 lm	27°
8 232 266 049	white		(39 W)		
8 232 256 049	silver grey		warm white (3000 K)		



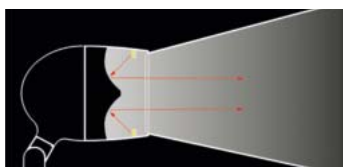
Metaspot 2 Darkring Optic pole luminaire, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 246 059	black	3.8 kg	3 x LED module 13 W	2692 lm	58°
8 232 266 059	white		(39 W)		
8 232 256 059	silver grey		warm white (3000 K)		

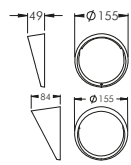


Metaspot 2 Darkring Optic pole luminaire, extra wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 232 246 069	black	3.8 kg	3 x LED module 13 W	2618 lm	81°
8 232 266 069	white		(39 W)		
8 232 256 069	silver grey		warm white (3000 K)		



Part number	Description
... 6 ...	Protection class II luminaire
... 7 ...	Luminaire with warm white LED module (2700 K)
... 1 ...	Dimmable luminaire (DALI)
... 2 ...	Dimmable luminaire (DALI D4i)
... 3 ...	Luminaire with Zhaga-18 interface for communication

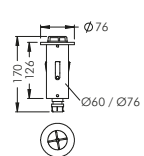
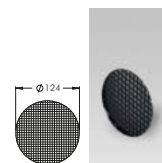


Accessories Metaspot 2 external, for retro-fitting

		Description: Cowl , external, stainless steel			
Part number	Colour	Cowl, Length 49 mm	Part number	Colour	Cowl, Length 84 mm
122 0 572 940	black		122 0 632 940	black	
122 0 572 960	white		122 0 632 960	white	
122 0 572 950	silver grey		122 0 632 950	silver grey	

Accessories Metaspot 2 internal, factory fitted (not available for Darkring Optic/Street Optic)

Part number	Description
129 0 729 940	Radial louvre , internal (factory fitted), to reduce lateral glare
129 0 893 000	Honeycomb louvre , internal (factory fitted), to avoid glare



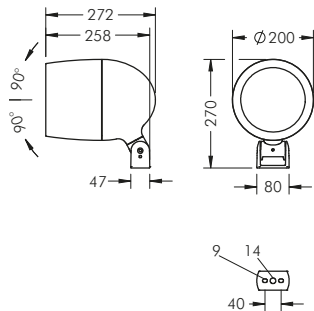
Accessories Metaspot 2 pole luminaire

Part number	Part number	Colour	Description
120 0 699 940	120 0 700 940	black	Post-top fitter for insertion, with Zhaga 18-interface, with 8 m cable, for control and monitoring of max. 4 luminaires with D4i LED driver
120 0 699 960	120 0 700 960	white	
120 0 699 950	120 0 700 950	silver grey	

LED

Luminaires available
in 2200 K or other colour temperatures upon request



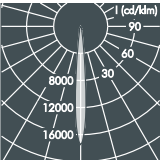
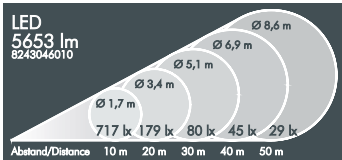


**Metaspot 3
with mounting bracket**

With high performance LED module (Zhaga), integral temperature monitoring device, CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area AW 0.052 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient aluminium reflector or lens made of optical silicon (Street Optic),
all exterior steel parts are stainless steel, tempered safety glass, silicon gasket,
toolless twist lock for closure,
mounting bracket: 2 drilled holes Ø 9 mm, spacing 40 mm, 1 centre hole Ø 14 mm,
tilt range 180°, M20 cable gland,
integral driver (AC/DC)

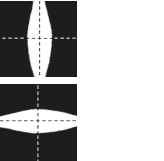
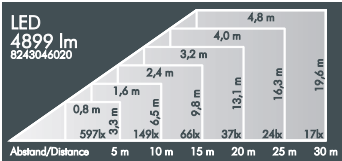
Metaspot 3, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 046 019	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5653 lm	9°
8 243 066 019	white				
8 243 056 019	silver grey				



Metaspot 3, linear beam spread, vertical

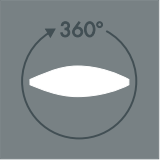
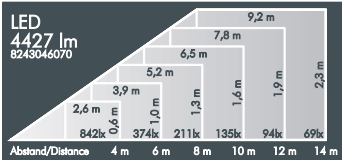
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 046 029	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	4899 lm	C 0 – 180
8 243 066 029	white				C 90 – 270
8 243 056 029	silver grey				36°



. 3. Luminaire with linear beam spread, horizontal

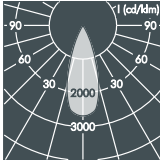
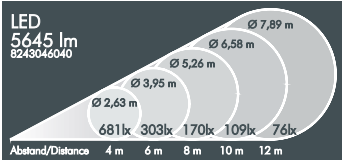
Metaspot 3, linear beam spread, rotatable

Part number	Colour	Description	Luminous flux	Beam angle γ (FWHM)
8 243 046 079	black	Luminaire with external ribbed glass spreader lense, continuously adjustable through 360° from outside the luminaire	4427 lm	C 0 – 180
8 243 066 079	white			C 90 – 270
8 243 056 079	silver grey			36°



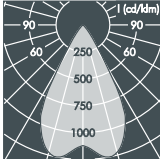
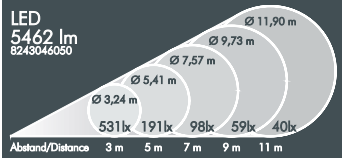
Metaspot 3, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 046 049	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5645 lm	36°
8 243 066 049	white				
8 243 056 049	silver grey				



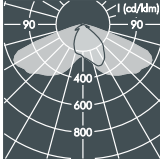
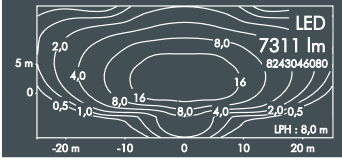
Metaspot 3, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 046 059	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5462 lm	57°
8 243 066 059	white				
8 243 056 059	silver grey				



Metaspot 3, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 046 089	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	7311 lm	C 0 – 180
8 243 066 089	white				C 90 – 270
8 243 056 089	silver grey				60°



Part number	Description
. . . 7	Protection class II luminaire
. 7	Luminaire with warm white LED module (2700 K)
. 1	Dimmable luminaire (DALI)
. 3	Luminaire with Zhaga-18 interface for communication
. 9 0	Luminaire with LED module RGBW * max. 49 W

* Not available for Street Optic/Darkring Optic

LED

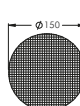
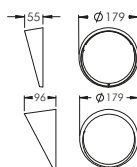
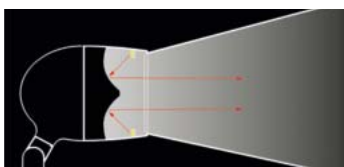
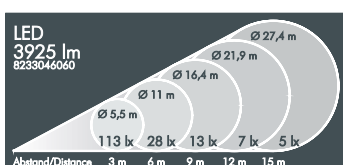
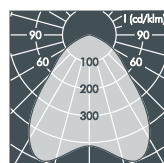
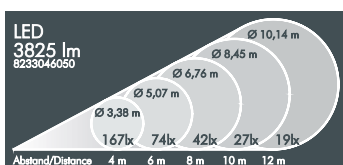
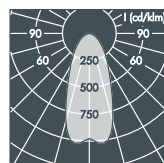
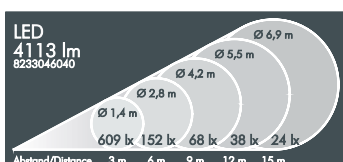
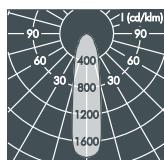
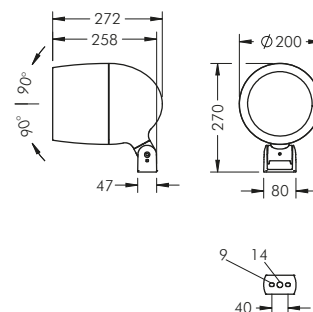
Luminaires available

in 2200 K or other colour temperatures upon request



Metaspot 3 Darkring Optic with mounting bracket

With highly efficient LED modules,
integral temperature monitoring device,
CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.052 m²
corrosion-resistant die cast aluminium housing AlSi12,
polyester powder coated,
light source completely shielded,
high gloss aluminum reflector,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
mounting bracket: 2 drilled holes Ø 9 mm,
spacing 40 mm, 1 centre hole Ø 14 mm,
tilt range 180°, M20 cable gland,
integral driver (AC/DC)



LED

Luminaires available
in 2200 K or other colour temperatures upon request



Metaspot 3 Darkring Optic, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 046 049	black	4.4 kg	3 x LED module 19 W (58 W)	4113 lm	26°
8 233 066 049	white				
8 233 056 049	silver grey		warm white (3000 K)		

Metaspot 3 Darkring Optic, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 046 059	black	4.4 kg	3 x LED module 19 W (58 W)	3825 lm	46°
8 233 066 059	white				
8 233 056 059	silver grey		warm white (3000 K)		

Metaspot 3 Darkring Optic, extra wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 046 069	black	4.4 kg	3 x LED module 19 W (58 W)	3925 lm	85°
8 233 066 069	white				
8 233 056 069	silver grey		warm white (3000 K)		

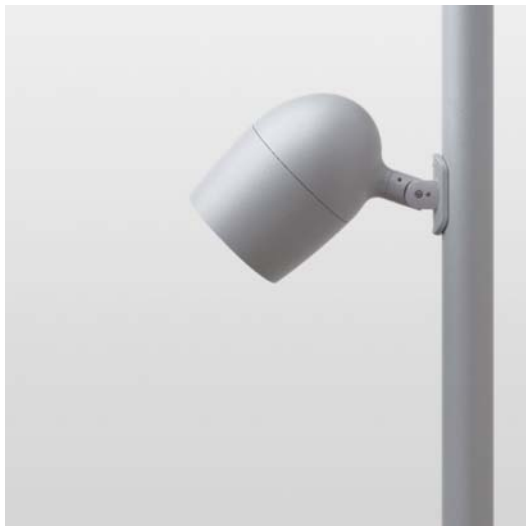
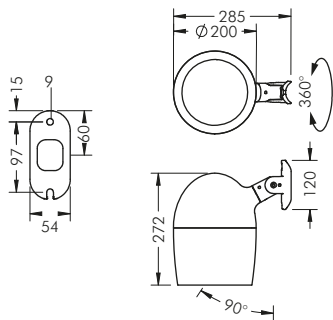
Part number	Description
... 6 ...	Protection class II luminaire
... .. 7 ...	Luminaire with warm white LED module (2700 K)
... .. 1 ...	Dimmable luminaire (DALI)
... .. 3 ..	Luminaire with Zhaga-18 interface for communication

Accessories Metaspot 3 external, for retro-fitting

		Description: Cowl , external, stainless steel			
Part number	Colour	Cowl, Length 55 mm	Part number	Colour	Cowl, Length 96 mm
122 0 573 940	black		122 0 633 940	black	
122 0 573 960	white		122 0 633 960	white	
122 0 573 950	silver grey		122 0 633 950	silver grey	

Accessories Metaspot 3 internal, factory fitted (not available for Darkring Optic/Street Optic)

Part number	Description
129 0 730 940	Radial louvre , internal (factory fitted), to reduce lateral glare
129 0 754 000	Honeycomb louvre , internal (factory fitted), to avoid glare

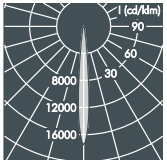
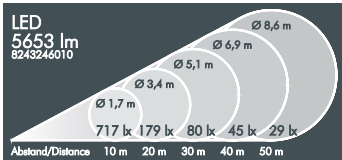


Metaspot 3 pole luminaire

With high performance LED module (Zhaga), integral temperature monitoring device, CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.055 m²
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated,
highly efficient aluminium reflector or lens made of optical silicon (Street Optic),
all exterior steel parts are stainless steel, tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm,
tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm,
1 centre hole Ø 40 mm, tilt range 90°, swivel range 360°, M20 cable gland,
integral driver (AC/DC)

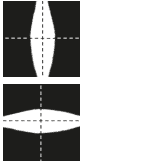
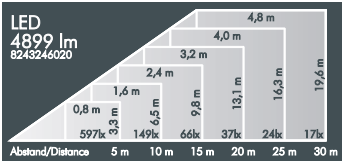
Metaspot 3 pole luminaire, narrow beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 246 019	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5653 lm	9°
8 243 266 019	white				
8 243 256 019	silver grey				



Metaspot 3 pole luminaire, linear beam spread, vertical

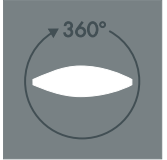
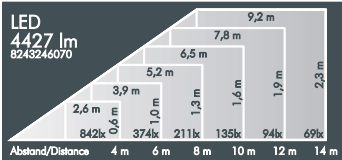
Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 246 029	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	4899 lm	C 0 – 180
8 243 266 029	white				C 90 – 270
8 243 256 029	silver grey				36°



. 3. Luminaire with linear beam spread, horizontal

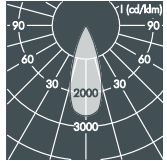
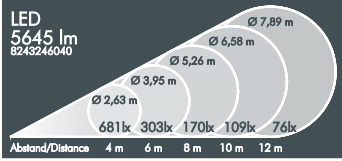
Metaspot 3 pole luminaire, linear beam spread, rotatable

Part number	Colour	Description	Luminous flux	Beam angle γ (FWHM)
8 243 246 079	black	Luminaire with external ribbed glass spreader lens, continuously adjustable through 360° from outside the luminaire	4427 lm	C 0 – 180
8 243 266 079	white			C 90 – 270
8 243 256 079	silver grey			36°



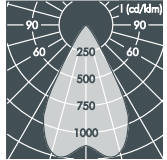
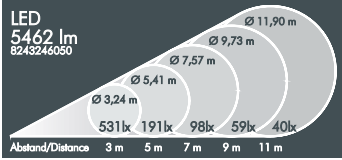
Metaspot 3 pole luminaire, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 246 049	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5645 lm	36°
8 243 266 049	white				
8 243 256 049	silver grey				



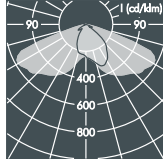
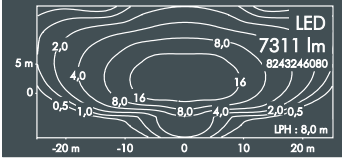
Metaspot 3 pole luminaire, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 246 059	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	5462 lm	57°
8 243 266 059	white				
8 243 256 059	silver grey				



Metaspot 3 pole luminaire, Street Optic

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 243 246 089	black	5.0 kg	1 x LED module 67 W warm white (3000 K)	7311 lm	C 0 – 180
8 243 266 089	white				C 90 – 270
8 243 256 089	silver grey				60°



Part number	Description
. . . 7	Protection class II luminaire
. 7	Luminaire with warm white LED module (2700 K)
. 1	Dimmable luminaire (DALI)
. 2	Dimmable luminaire (DALI D4i)
. 3	Luminaire with Zhaga-18 interface for communication
. 9 0	Luminaire with LED module RGBW * max. 49 W

* Not available for Street Optic/Darking Optic

LED

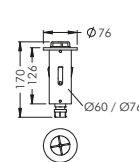
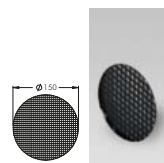
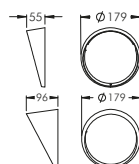
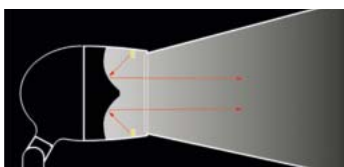
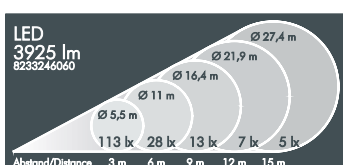
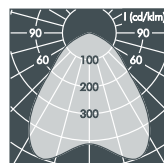
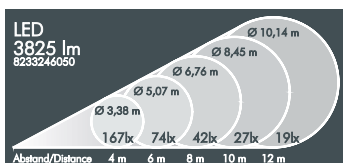
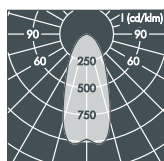
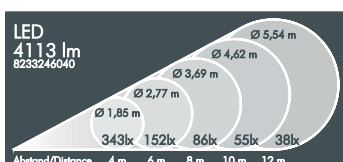
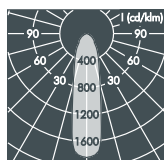
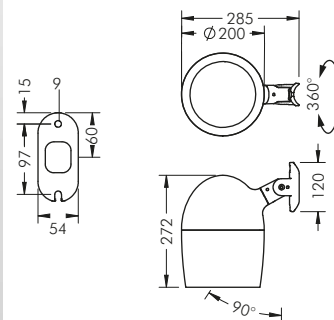
Luminaires available

in 2200 K or other colour temperatures upon request



Metaspot 3 Darkring Optic pole luminaire

With highly efficient LED modules,
integral temperature monitoring device,
CRI: > 80, Colour tolerance: 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I or II, IP65 , IK08
windage area A_W 0.055 m²
corrosion-resistant die cast aluminium housing AlSi12,
polyester powder coated,
light source completely shielded,
high gloss aluminum reflector,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm,
tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm,
1 centre hole Ø 40 mm, tilt range 90°,
swivel range 360°, M20 cable gland,
integral driver (AC/DC)



LED

Luminaires available

in 2200 K or other colour temperatures upon request



Metaspot 3 Darkring Optic pole luminaire, medium wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 246 049	black	4.4 kg	3 x LED module 19 W (58 W) warm white (3000 K)	4113 lm	26°
8 233 266 049	white				
8 233 256 049	silver grey				

Metaspot 3 Darkring Optic pole luminaire, wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 246 059	black	4.4 kg	3 x LED module 19 W (58 W) warm white (3000 K)	3825 lm	46°
8 233 266 059	white				
8 233 256 059	silver grey				

Metaspot 3 Darkring Optic pole luminaire, extra wide beam

Part number	Colour	Weight	Light source	Luminous flux	Beam angle γ (FWHM)
8 233 246 069	black	4.4 kg	3 x LED module 19 W (58 W) warm white (3000 K)	3925 lm	91°
8 233 266 069	white				
8 233 256 069	silver grey				

Part number	Description
... 7 ...	Protection class II luminaire
... 7 ...	Luminaire with warm white LED module (2700 K)
... 1 ...	Dimmable luminaire (DALI)
... 2 ...	Dimmable luminaire (DALI D4i)
... 3 ...	Luminaire with Zhaga-18 interface for communication

Accessories Metaspot 3 external, for retro-fitting

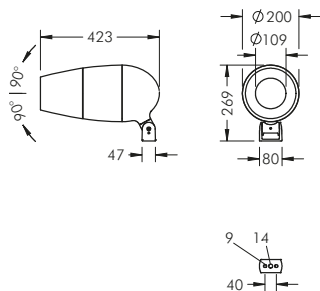
		Description: Cowl , external, stainless steel			
Part number	Colour	Cowl, Length 55 mm	Part number	Colour	Cowl, Length 96 mm
122 0 573 940	black		122 0 633 940	black	
122 0 573 960	white		122 0 633 960	white	
122 0 573 950	silver grey		122 0 633 950	silver grey	

Accessories Metaspot 3 internal, factory fitted (not available for Darkring Optic/Street Optic)

Part number	Description
129 0 730 940	Radial louvre , internal (factory fitted), to reduce lateral glare
129 0 754 000	Honeycomb louvre , internal (factory fitted), to avoid glare

Accessories Metaspot 3 pole luminaire

Part number	Part number	Colour	Description
Ø 60 mm	Ø 76 mm		
120 0 699 940	120 0 700 940	black	Post-top fitter for insertion, with Zhaga-18 interface, with 8 m cable, for control and monitoring of max. 4 luminaires with D4i LED driver
120 0 699 960	120 0 700 960	white	
120 0 699 950	120 0 700 950	silver grey	



Metaspot Gobo

With high performance LED module, integral temperature monitoring device, CRI: > 70, Colour tolerance: max. 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I, IP65 , IK08
windage area A_W 0.077 m²,
corrosion-resistant die cast aluminium housing AlSi12, polyester powder coated, focusable lens, carrier for gobos and colour filters, active ventilation, all exterior steel parts are stainless steel, tempered safety glass, silicon gasket, toolless twist lock for closure, mounting bracket: 2 drilled holes Ø 9 mm, spacing 40 mm, 1 centre hole Ø 14 mm, tilt range 180°, M20 cable gland, integral driver (AC/DC)

Metaspot Gobo, 45 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 044 069	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1535 lm	41°
8 244 064 069	white				
8 244 054 069	silver grey				

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 046 069	black	6.5 kg	1 x LED module 49 W warm white (3000 K)	1401 lm	41°
8 244 066 069	white				
8 244 056 069	silver grey				

Metaspot Gobo, 63 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 044 059	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1127 lm	29°
8 244 064 059	white				
8 244 054 059	silver grey				

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 046 059	black	6.5 kg	1 x LED module 49 W warm white (3000 K)	1029 lm	29°
8 244 066 059	white				
8 244 056 059	silver grey				

Metaspot Gobo, 85 mm focal length

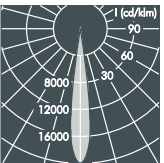
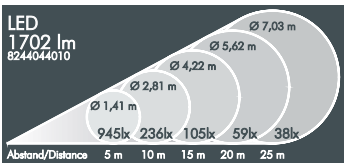
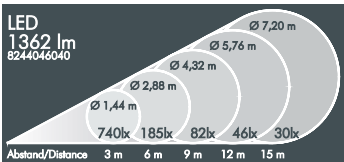
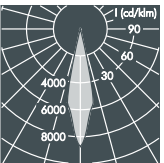
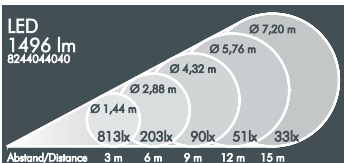
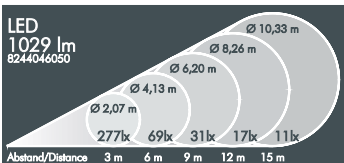
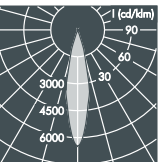
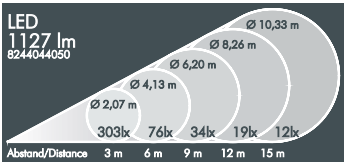
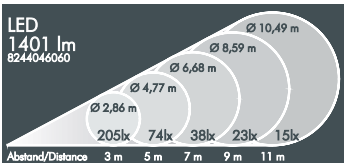
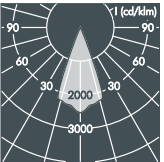
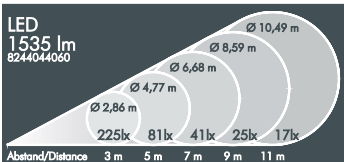
Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 044 049	black	6.5 kg	1x LED module 49 W cool white (6500 K)	1496 lm	22°
8 244 064 049	white				
8 244 054 049	silver grey				

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 046 049	black	6.5 kg	1x LED module 49 W warm white (3000 K)	1362 lm	22°
8 244 066 049	white				
8 244 056 049	silver grey				

Metaspot Gobo, 150 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 044 019	black	6.5 kg	1x LED module 49 W cool white (6500 K)	1702 lm	14°
8 244 064 019	white				
8 244 054 019	silver grey				

Part number	Description
... 6 ...	Luminaire with warm white LED module (3000 K)
... 1 ..	Dimmable version (DALI)
... 3 ..	Luminaire with Zhaga-18 interface for communication

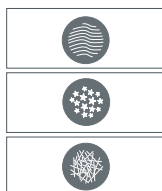
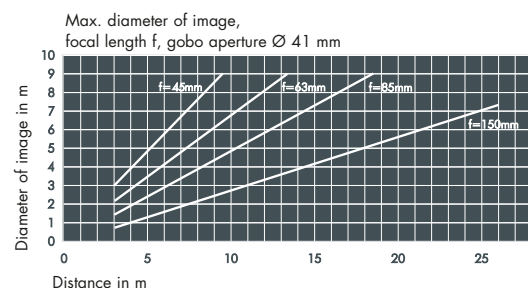
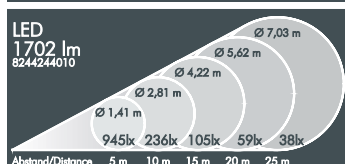
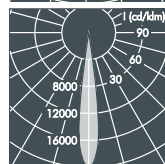
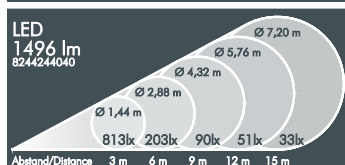
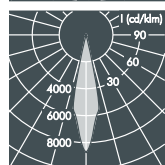
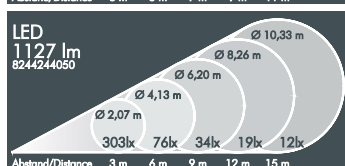
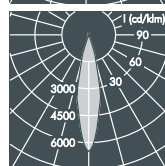
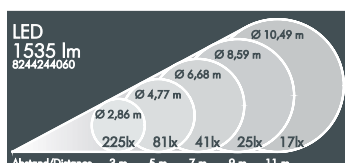
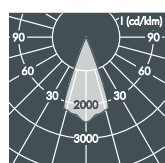
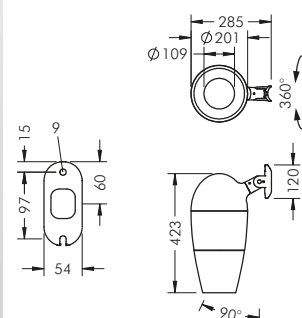


LED



Metaspot Gobo pole luminaire

With high performance LED module,
integral temperature monitoring device,
CRI: > 70, Colour tolerance: max. 3 SDCM
Service life: L80/B10 > 50 000 h
protection class I, IP65 , IK08
windage area AW 0.077 mm²,
corrosion-resistant die cast aluminium housing AISi12,
polyester powder coated, focusable lens,
carrier for gobos and colour filters, active ventilation,
all exterior steel parts are stainless steel,
tempered safety glass, silicon gasket,
toolless twist lock for closure,
for installation on poles Ø 60 - 100 mm,
tiltable base made of powder coated aluminium,
2 drilled holes Ø 9 mm, spacing 97 mm,
1 centre hole Ø 40 mm, tilt range 90°,
swivel range 360°, M20 cable gland,
integral driver (AC/DC)



Metaspot Gobo pole luminaire, 45 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 244 069	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1535 lm	41°
8 244 264 069	white				
8 244 254 069	silver grey				

Metaspot Gobo pole luminaire, 63 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 244 059	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1127 lm	29°
8 244 264 059	white				
8 244 254 059	silver grey				

Metaspot Gobo pole luminaire, 85 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 244 049	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1496 lm	22°
8 244 264 049	white				
8 244 254 049	silver grey				

Metaspot Gobo pole luminaire, 150 mm focal length

Part number	Colour	Weight	Light source	Luminous flux	Beam angle
8 244 244 019	black	6.5 kg	1 x LED module 49 W cool white (6500 K)	1702 lm	14°
8 244 264 019	white				
8 244 254 019	silver grey				

Part number	Description
... 6 ...	Luminaire with warm white LED module (3000 K)
... 1 ..	Dimmable version (DALI)
... 2 ..	Dimmable version (DALI D4i)
... 3 ..	Luminaire with Zhaga-18 interface for communication

Accessoires Metaspot Gobo *

Part number	Description
129 0 780 000	Framer, for sharp edges on 3- or 4-sided images
	Pattern
129 0 489 000	waves
129 0 490 000	stars
129 0 491 000	hash
	Standard gobos Ø 50 mm (outer diameter)

Custom made gobos can be produced from image data in one of the following file formats:

EPS (min. 300 dpi), **TIF** (min. 300 dpi), **JPG** (in low compression). Max. image size D on gobo: D = 38 mm

* **Dichroic colour filter** (yellow, red, blue, green) are available upon request.

LED



Metaspot

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