

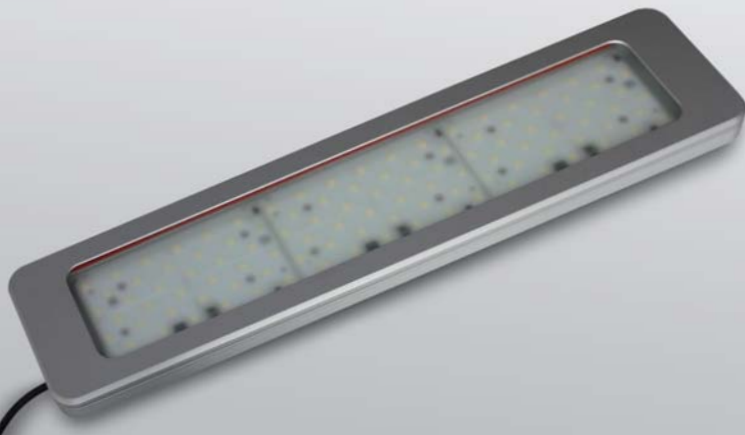
HEMA

LIGHTING SYSTEMS

HEMA



MASCHINEN- UND
APPARATESCHUTZ GMBH



PROTECTION

CLAMPING
&
BRAKING

VISION

SERVICE

WE ARE THERE FOR YOU WORLDWIDE

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● Sites HEMA Group
● Sales Partner

Please find a detailed overview of our sales partners at www.hema-group.com

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HEMA CATALOGUE PROTECTION



Further information on

- Bellows
- Backwallsystems
- Spiral springs
- Telescopic steel covers
- Roller covers
- Machine protection windows
- Visiport spin windows

HEMA CATALOGUE CLAMPING AND BRAKING



Further information on manual, pneumatic and electrical clamping and braking systems.

- RotoClamp
- DiskClamp
- LinClamp
- PClamp

WORKPLACE LIGHTING

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MACHINE LIGHTING

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INTEGRATED LIGHTING

The optimal lighting at the workplace or inside the machine not only raises safety, but also enhances well being and counteracts work fatigue.

The decisive factor here is the choice of light source. Lamps fitted with modern LED technology emit an optimal and unvarying level of neutral colour light that does not flicker or contain UV or IR components.



HE-BC - short lamp arm with ball joint

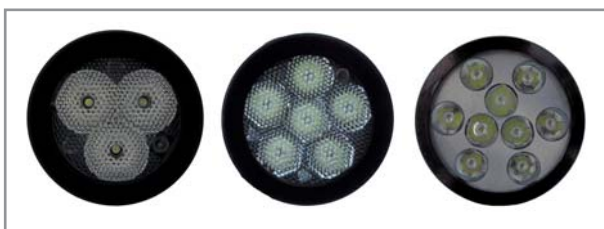
The temperature near the lamp is constantly low, which is important for maintenance work. Unlike halogen or neon lamps, this does not have a filament and so makes work possible even under difficult conditions.

The average life of the LEDs is 50,000 hours, equivalent to six years of continuous duty. Compared with the conventional filament bulb, this reduces operating costs by 50%, without replacements or maintenance work. A 700 mA LED consumes 3 W.

There are three housing variants available for installation at the workplace, all with the ON/OFF switch directly on the lamp head:

- HE-BC - short lamp arm with ball joint
- HE-BF - long lamp arm, flexible
- HE-BL - long lamp arm, rigid

All lamp types have an anodised aluminium head and are secured with screws through their base.



Lamp head with 3, 6, and 9 LEDs



HE-BF - long lamp arm, flexible

The ON/OFF switch is placed directly on the lamp head. The lamp base can be screwed in position at the workplace or inside the machine. Alternative fasteners are a clip foot and magnetic base for more flexible solutions.

For the perfect illumination and brightness control, every one of these lamp types can be fitted with three, six, or nine LEDs and with an 8°, 25°, or 40° lens.



HE-BL - long lamp arm, rigid

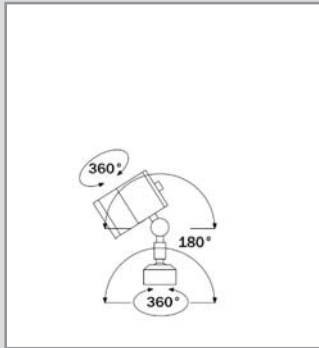
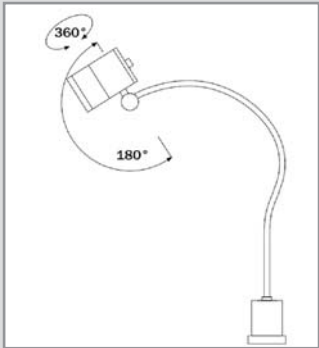
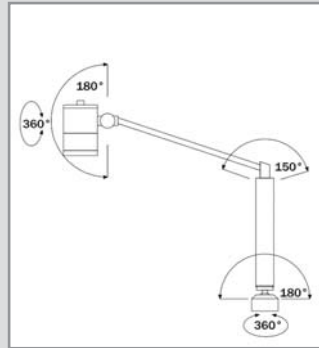
CE



IP65



WORKPLACE LIGHTING

Type	HE-BC	HE-BF	HE-BL
No. of LEDs	3 / 6 / 9	3 / 6 / 9	3 / 6 / 9
LED life	50,000 h	50,000 h	50,000 h
Brightness/lens	diffuse / 8°, 25°, 40°	diffuse / 8°, 25°, 40°	diffuse / 8°, 25°, 40°
Light temperature	5000° K	5000° K	5000° K
Reflector Ø mm	64x86 (3/6 LED), 90x101 (9 LED)	64x86 (3/6 LED), 90x101 (9 LED)	64x86 (3/6 LED), 90x101 (9 LED)
Basic dimensions	60x60 mm, H 36 mm	80 x 63 mm, H 102 mm	60x60 mm, H 36 mm
Lamp arm	-	Ø15 mm x L 700 mm, flexible	top Ø12 x L420 mm bottom 35 x 35 x 240 mm
Fasteners	4 screws	4 screws	4 screws
Switches	single pole, ON/OFF	single pole, ON/OFF	single pole, ON/OFF
Plug-in transformer	integrated in lamp head	integrated in lamp head	integrated in lamp head
IP rating	IP 65	IP 65	IP 65
Colour	black, other colours on request	black, other colours on request	black, other colours on request
Adjustable angle			

Electrical properties

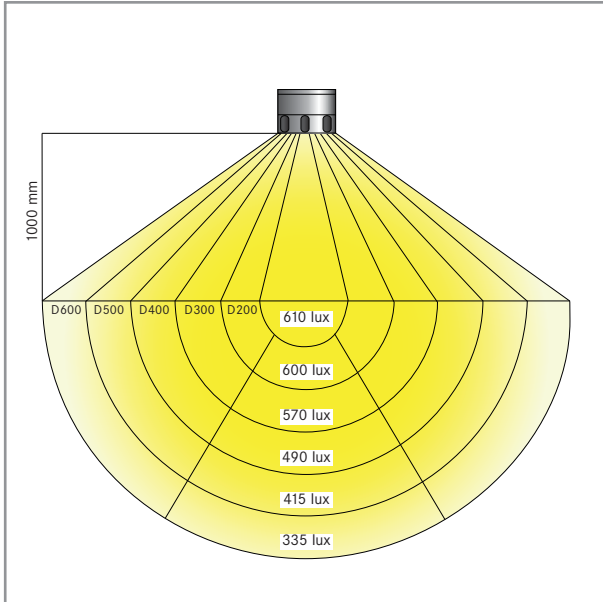
Lampentyp	HE-BC/HE-BF/HE-BL - 3 LED	HE-BC/HE-BF/HE-BL - 6 LED	HE-BC, HE-BF, HE-BL- 9 LED
Operating voltage	12-24 VDC/230 VAC	12-24 VDC/230 VAC	230 VAC
Current 350 mA	-	-	9 W
Current 500 mA	6 W	12 W	-
IEC marking	III	III	III

HEMA also supplies an adapter matching the ordered illuminant type. Solely the operating voltage must be specified on the order (see table above). Cable length 1.5 m. 12-24 Vdc cable ends of bare wires, 230 Vac cables fitted with two-pin plug on option.

ILLUMINATION DISTRIBUTION CHARTS

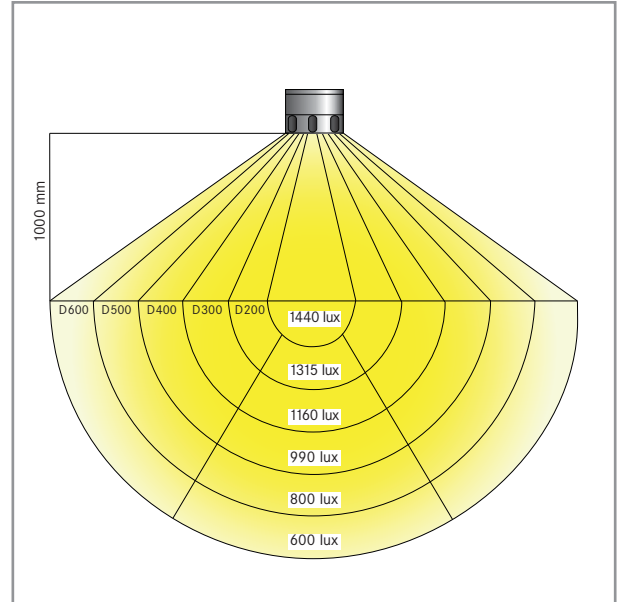
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HE-BC3, HE-BF3, HE-BL3



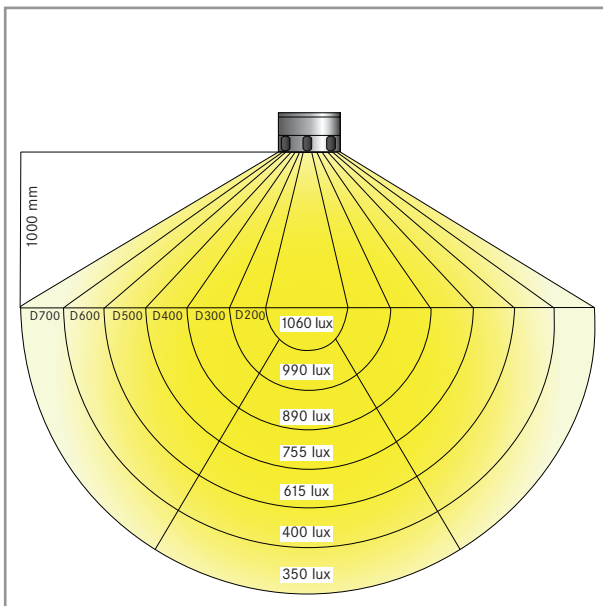
Technical details	Pages 4 - 5
Lens	40°
Current	500 mA / 6W
Lighting systems	HE-BC3, HE-BF3, HE-BL3

HE-BC6, HE-BF6, HE-BL6



Technical details	Pages 4 - 5
Lens	40°
Current	500 mA / 12W
Lighting systems	HE-BC6, HE-BF6, HE-BL6

HE-BC9, HE-BF9, HE-BL9



Technical details	Pages 4 - 5
Lens	40°
Current	350 mA / 9W
Lighting systems	HE-BC9, HE-BF9, HE-BL9

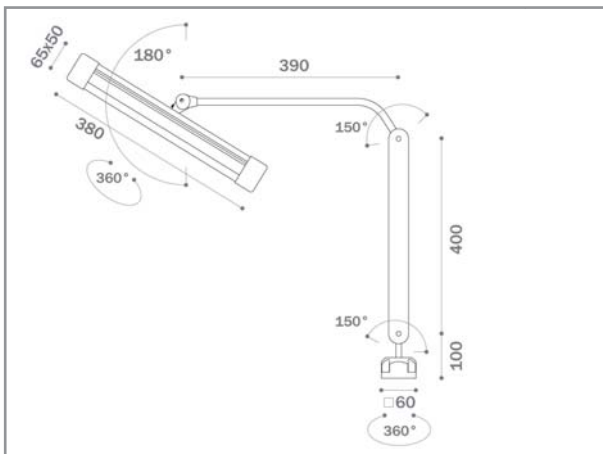
WORKPLACE LIGHTING HE-JOB-BRLED

The HE-JOB-BRLED is an adjustable workplace lamp featuring the latest LED technology. Thanks to the highly flexible jointed arm, lighting at the workplace can be set with ease to the optimal effect.

The lamp head of aluminium complies with protection class IP 65, and the entire unit IP 40. The ON/OFF switch is fitted directly on the lamp head for ease of use.

The advantages of the HE-JOB-BRLED workplace lamps:

- Jointed arm for great flexibility
- ON/OFF switch fitted directly on the lamp head
- Integrated ballast
- Optional dimmer



HE-JOB-BRLED Dimensions

	HE-JOB-BRLED
Operating voltage	230 VAC
IEC marking	II
Cabel length	1.5 m
LED life	50 000 h
No of LEDs	24
Light temperatur	5000 K
Fasteners	4 drilled holes or optional mounting devices (optional component parts)
Colour	Aluminium
Protection class	IP40 lamp IP65 lamp head



HE-JOB-BRLED Workplace lighting for benches



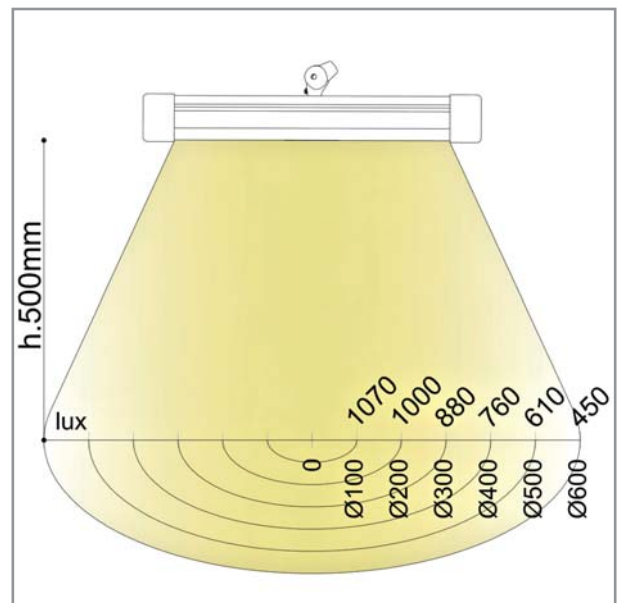
Optional mounting



ON/OFF switch on lamp head

ILLUMINATION DISTRIBUTION CHART

HE-JOB-BRLED



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SPOT LIGHTING

3

LIGHTING SYSTEMS

These recessed spot lamps are a compact LED lighting system for space saving solutions. The lamp head is of anodised aluminium in the standard colour black, with other colours available on request.

The spot lamps must be fitted in a recess matching their diameters and secured with a screw.

4

WORKPLACE LIGHTING

The advantages of the HE-P LED spot lamps:

- Fitted in the machine housing for space saving solutions
- No projecting edges where swarf, etc., can collect
- Lighting angles 8°, 25°, 40°
- Resistant to most coolants and lubricants
- Variable number of LEDs: 1, 3, or 6 LEDs per head

8

SPOT FITTING LIGHTING



Type HE-P6 with 6 LEDs

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MACHINE LIGHTING



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INTEGRATED LIGHTING

Type	HE-P1	HE-P3	HE-P6
No of LEDs	1	3	6
LED life	50,000 h	50,000 h	50,000 h
Brightness/Lens	diffuse / 8°, 25°, 40°	diffuse / 8°, 25°, 40°	diffuse / 8°, 25°, 40°
Light temperature	5000 K	5000 K	5000 K
Dimensions	A = 40mm B = 31.5mm C = 30mm	A = 70mm B = 53mm C = 61mm	A = 70mm B = 53mm C = 61mm
Fasteners	groove nut	groove nut	groove nut
IP rating	IP 67	IP 67	IP 67
Colour	black, other colours on request	black, other colours on request	black, other colours on request

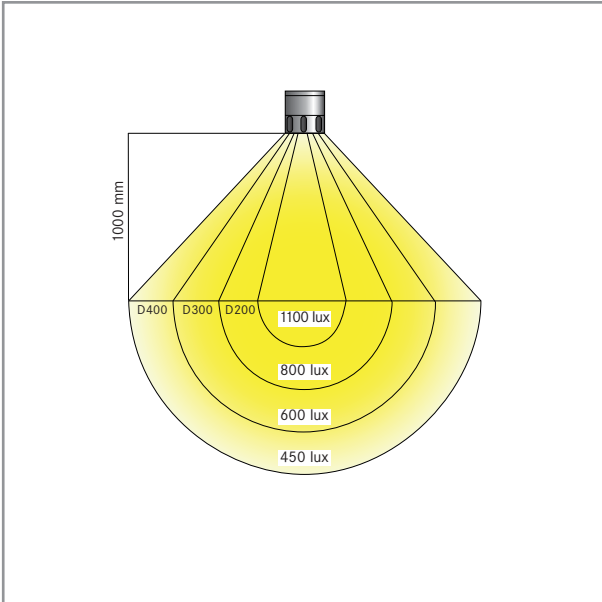
Electrical properties

Lamp type	HE-P1	HE-P3	HE-P6
Operating voltage	12-24 VDC/230 VAC	12-24 VDC/230 VAC	12-24 VDC/230 VAC
Current 700 mA	3 W	9 W	18 W
IEC marking	III	III	III

HEMA also supplies an adapter matching the ordered illuminant type. Solely the operating voltage must be specified on the order (see table above). Delivered with cable lengths from 1.5 to 6 m. 230 Vac cables fitted with two-pin plug, 12-24 Vdc cable ends of bare wires.

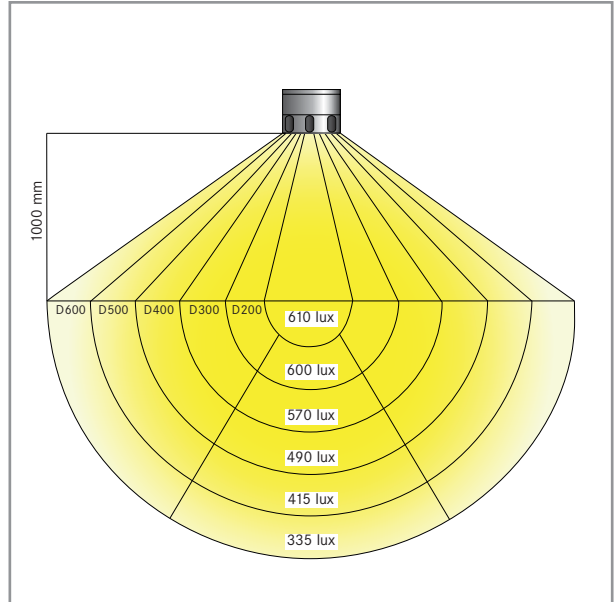
ILLUMINATION DISTRIBUTION CHARTS

HE-P1



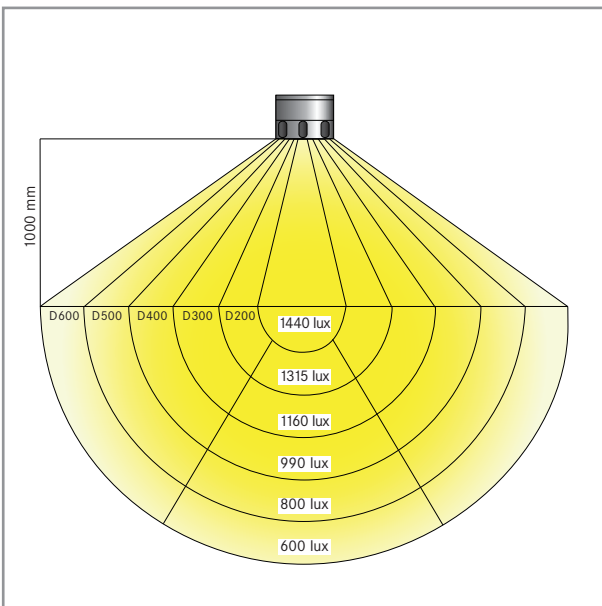
Technical details	Page 8
Lens	40°
Current	700 mA / 3W
Lighting systems	HE-P1

HE-P3



Technical details	Page 8
Lens	40°
Current	700 mA / 9W
Lighting systems	HE-P3

HE-P6



Technical details	Page 8
Lens	40°
Current	700 mA / 18W
Lighting systems	HE-P6

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HE-EXLIGHT-LED MACHINE LIGHTING

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LIGHTING SYSTEMS

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SPOT FITTING LIGHTING



HE-EXLIGHT-E, external version with 6 LED

10

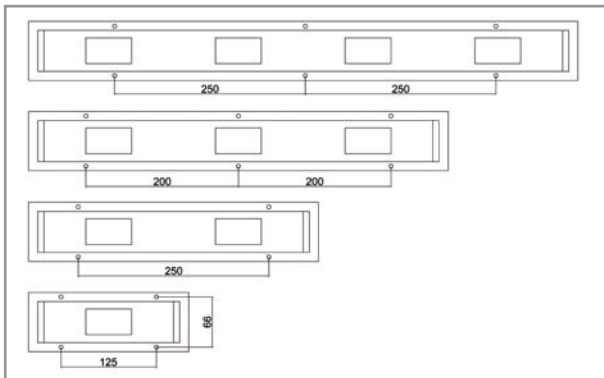
MACHINE LIGHTING



HE-EXLIGHT-I, integrated version with 12 LED

22

INTEGRATED LIGHTING



The compact measurements and the flat, robust housing of the HE-EXLIGHT-LED machine lamps make them the ideal solution in small and mid sized machines.

The HE-EXLIGHT-LED machine lamp is available in two versions for the best possible configuration in the machine, also as a retrofit. The housings of both versions are of robust, anodised aluminium with a safety pane 4 mm thick.

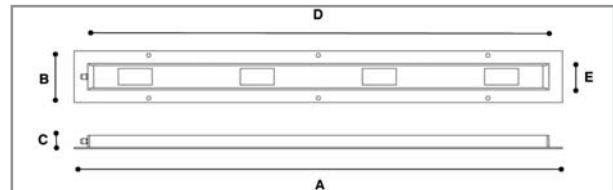
The lamps are impact resistant, impervious to vibrations, and can also operate in environments with coolants and lubricants. The HE-EXLIGHT-LED machine lamps are extremely low maintenance. This LED technology exhibits a long service life of 50,000 operating hours, so the lamp is virtually replacement free, eliminating the cost for new parts and repairs.

The lamps are fitted with a direct 24 V connector that does not require any additional components.



Light cone Ø (mm)	lux
100	1280
1000	880
2000	320

Example for light cone HE-EXLIGHT-E 24, height 1000 mm



Version	A	B	C	D	E
HE-EXLIGHT, 6 LED	210	78	25	186	54
HE-EXLIGHT, 12 LED	380	78	25	356	54
HE-EXLIGHT, 18 LED	550	78	25	526	54
HE-EXLIGHT, 24 LED	720	78	25	696	54

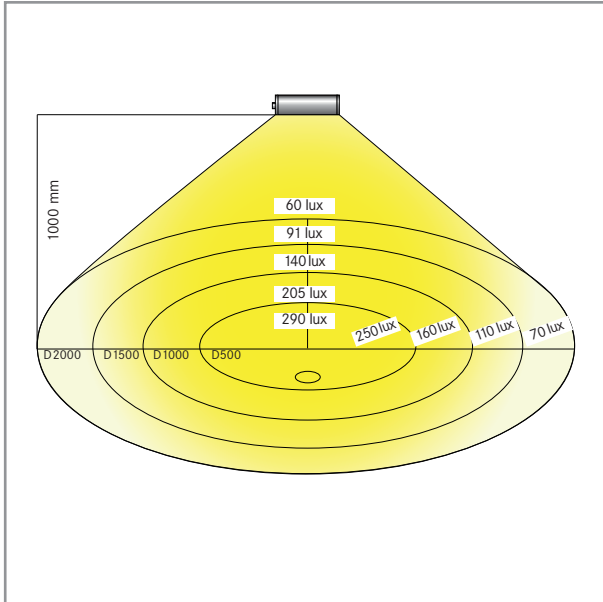
Dimensions for integrated and external versions

Version	Power supply	No of LEDs	Operating voltage	Light temperature	Lens	Mounting
HE-EXLIGHT-E 6	24 VDC	1	6 W	5000K	120°	external version
HE-EXLIGHT-E 12	24 VDC	2	12 W	5000K	120°	external version
HE-EXLIGHT-E 18	24 VDC	3	18 W	5000K	120°	external version
HE-EXLIGHT-E 24	24 VDC	4	24 W	5000K	120°	external version
HE-EXLIGHT-I 6	24 VDC	1	6 W	5000K	120°	integrated version
HE-EXLIGHT-I 12	24 VDC	2	12 W	5000K	120°	integrated version
HE-EXLIGHT-I 18	24 VDC	3	18 W	5000K	120°	integrated version
HE-EXLIGHT-I 24	24 VDC	4	24 W	5000K	120°	integrated version

Delivered with cable lengths from 1.5 to 6 m. 230 Vac and 12-24 Vdc cable ends of bare wires. Accessory equipment for connection to mains voltage sources.

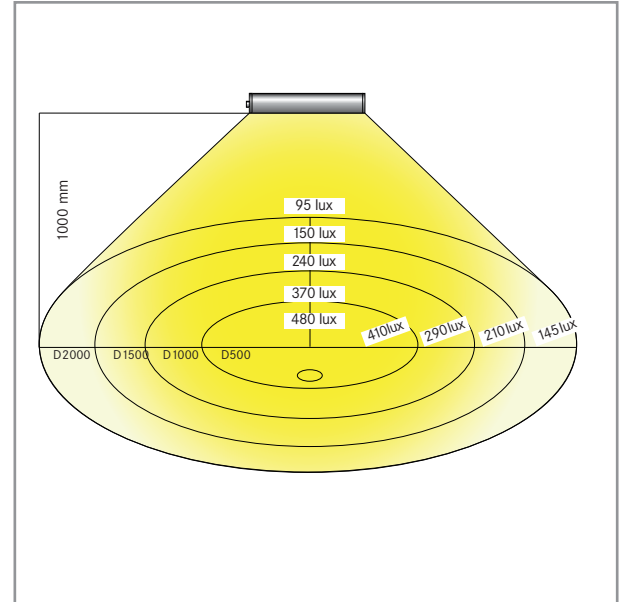
ILLUMINATION DISTRIBUTION CHARTS

HE-EXLIGHT-LED 24.6



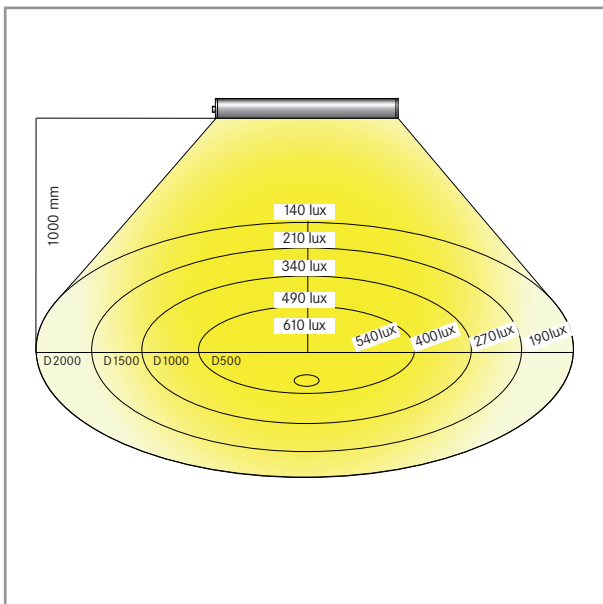
Technical details	Page 10
Lens	120°
Current	700 mA
Lighting systems	HE-EXLIGHT-LED24.6

HE-EXLIGHT-LED 24.12



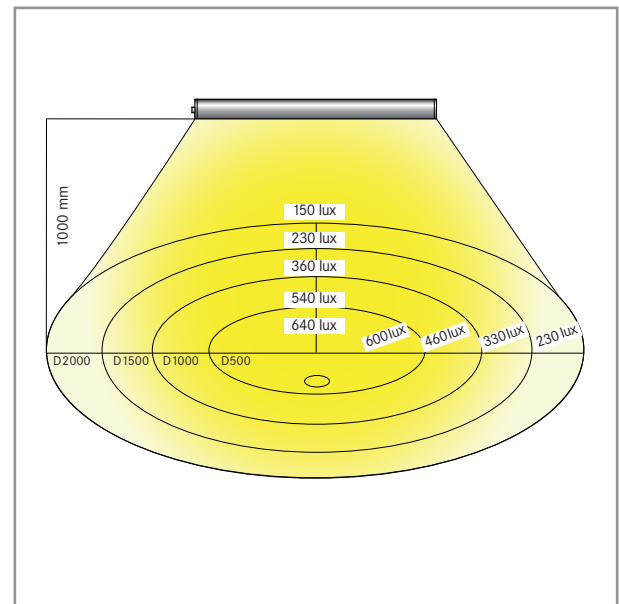
Technical details	Page 10
Lens	120°
Current	7000 mA
Lighting systems	HE-EXLIGHT-LED24.12

HE-EXLIGHT-LED 24.18



Technical details	Page 10
Lens	120°
Current	2100 mA
Lighting systems	HE-EXLIGHT-LED24.18

HE-EXLIGHT-LED 24.24



Technical details	Page 10
Lens	120°
Current	1400 mA
Lighting systems	HE-EXLIGHT-LED24.24

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HE-TRACK-ALPHA LED MACHINE LIGHTING

3

LIGHTING SYSTEMS

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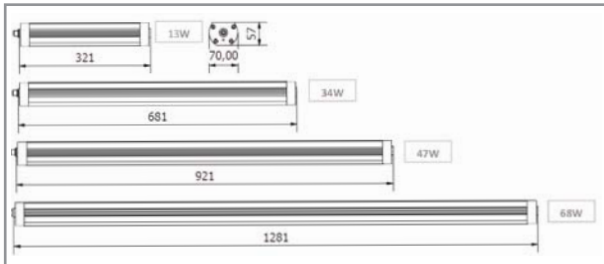
INTEGRATED LIGHTING



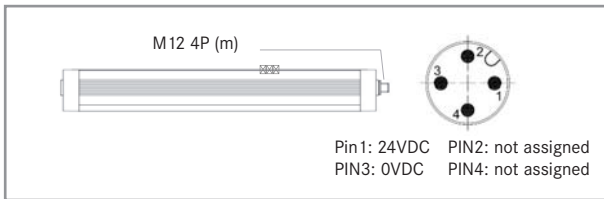
HE-TRACK-LED, diffuse lighting for glare-free working



HE-TRACK-ALPHA LED Machine light



HE-TRACK-ALPHA Dimensions



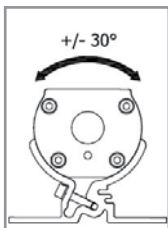
The HETRACK-ALPHA LED machine lamps are designed for small and mid sized machine tools.

The housing is of robust, silver anodised aluminium. The 5 mm thick, hardened safety pane presents a matt surface for diffuse, dazzle free lighting.

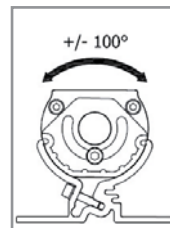
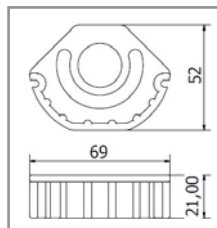
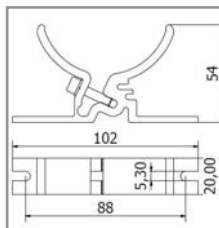
The lamps can be fitted with optional mounting plates for both horizontal and vertical installations. The lamps are impact resistant, impervious to vibrations, and can also operate in environments with coolants and lubricants.

In addition, the HETRACK-ALPHA LED machine lamps are extremely low maintenance. This LED technology exhibits a long service life of 50,000 operating hours, so the lamp is virtually replacement free, eliminating the cost for new parts and repairs.

- Flexible machine lamp
- Adjustable lighting angle
- Direct 24 V connector without additional components
- Resistant to many coolants and lubricants



Backside mounting ALPHA.CLIP



Sidewise mounting ALPHA.CLIP and ALPHA.ADP



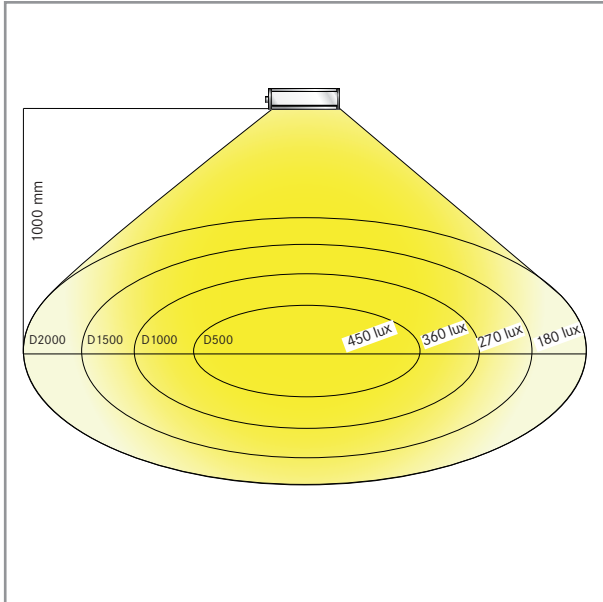
Version	Power supply	LED no	Operating voltage	Light temperature	Lens	Mounting
HE-TRACKLED 24	24 VDC	36	13 W / 0.60 A	5000K	120°	external
HE-TRACKLED 48	24 VDC	90	34 W / 1.50 A	5000K	120°	external
HE-TRACKLED 72	24 VDC	126	47 W / 2.10 A	5000K	120°	external
HE-TRACKLED 96	24 VDC	180	68 W / 3.00 A	5000K	120°	external

Delivered with cable lengths of 1.5m, cable ends of bare wires.

Order and request forms available at: www.hema-group.com

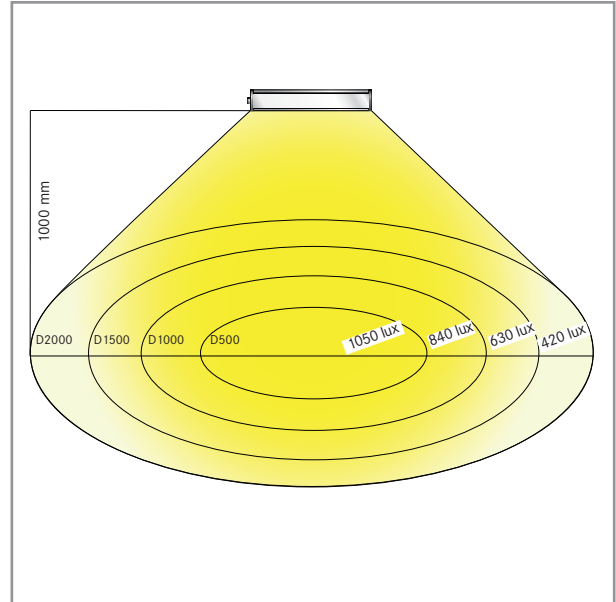
ILLUMINATION DISTRIBUTION CHARTS

HE-TRACK-ALPHA 2.50



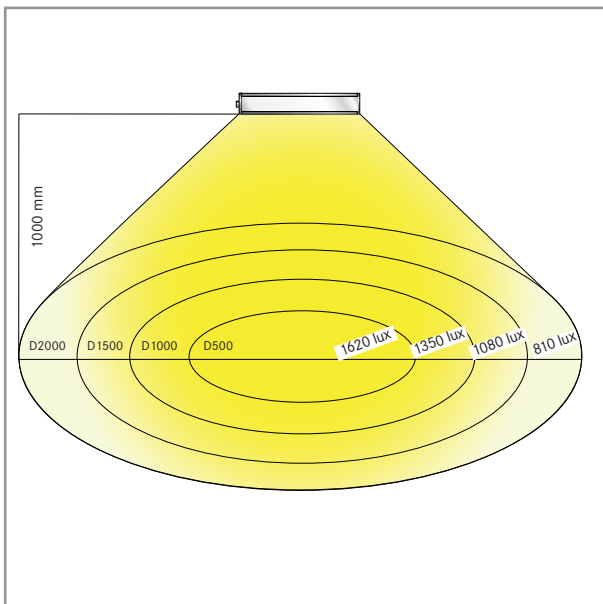
Technical details	Page 12
Lens	120°
Current	13 W / 0.6 A
Lighting systems	HE-TRACK ALPHA 2.50

HE-TRACK-ALPHA 5.50



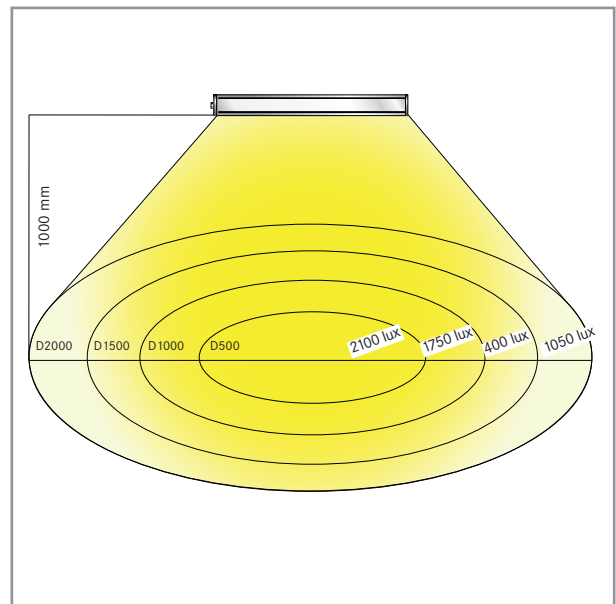
Technical details	Page 12
Lens	120°
Current	34 W / 1.5 A
Lighting systems	HE-TRACK ALPHA 5.50

HE-TRACK-ALPHA 7.50



Technical details	Page 12
Lens	120°
Current	47 W / 2.1 A
Lighting systems	HE-TRACK ALPHA 7.50

HE-TRACK-ALPHA 10.50



Technical details	Page 12
Lens	120°
Current	68 W / 3 A
Lighting systems	HE-TRACK ALPHA 10.50

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HE-TLED MACHINE LIGHTING

For constant illumination inside the machine, the HE-TLED lighting system was developed on a modular basis. As a result, the light provided by this system in the interior can be adapted specifically to actual needs. Units with three, six, nine, or twelve LEDs are available.



Modular machine interior lighting HE-TLED

The housing of the HE-TLED is of aluminium and polycarbonate and is ideal for dusty or wet environmental conditions e.g. inside machines. Also a scratchproof glass variant is available as an option for use in machining production areas. All HE-TLED versions fulfil the protective requirements for IP 68. The encapsulated design is an effective barrier against foreign particles and moisture for a constant high quality lighting at all times.

An LED has a max life of 50,000 hours, reducing maintenance work to a considerable degree. This long life and high lighting quality also help to reduce maintenance and energy consumption.



Machine interior lighting HE-TLED with three LED

Advantages of using HETLED lamps

- Compact measurements with maximum illumination
- Robust design for demanding applications
- Adjustable lighting angle, high flexibility
- Innovative fastening modes for max. installation convenience
- Resistant to most coolants and lubricants
- High IP rating, energy efficient
- LED technology for up to 50,000 hours of operation



Fastening with clips



Screw union with mount, see page 16

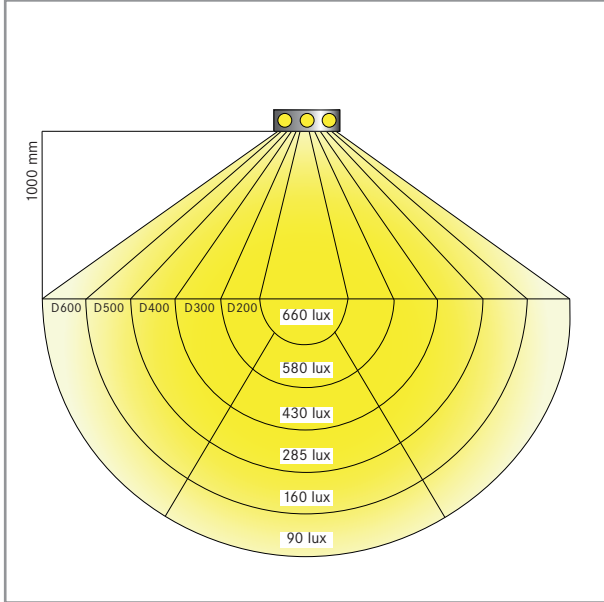


	HE-TLED 3	HE-TLED 6	HE-TLED 9	HE-TLED 12
Operating voltage 500 mA	6 W	12 W	18 W	24 W
Current	12-24 VDC/230 VAC	12-24 VDC/230 VAC	230 VAC	230 VAC
IEC marking	III	III	III	III
cable length	1.5 m	1.5 m	1.5 m	1.5 m
LED life	50 000 h	50 000 h	50 000 h	50 000 h
LED no	3	6	9	12
Light temperature	5000 K	5000 K	5000 K	5000 K
Lens	8° - 25° - 40°	8° - 25° - 40°	8° - 25° - 40°	8° - 25° - 40°
Dimensions (mm)	Ø 36x167	Ø 36x302	Ø 36x437	Ø 36x572
Fasteners	2 metal clips	2 metal clips	2 metal clips	2 metal clips
Colour	alloy	alloy	alloy	alloy
IP rating	IP68	IP68	IP68	IP68

HEMA also supplies an adapter matching the ordered illuminant type. Solely the operating voltage must be specified on the order (see table above). Delivered with cable lengths from 1.5 to 6 m. 230 Vac cables fitted with two-pin plug, 12-24 Vdc cable ends of bare wires.

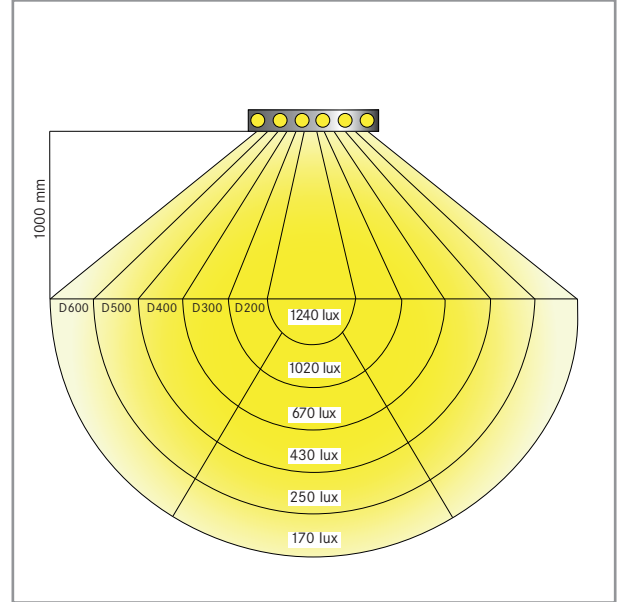
ILLUMINATION DISTRIBUTION CHARTS

HE-TLED3



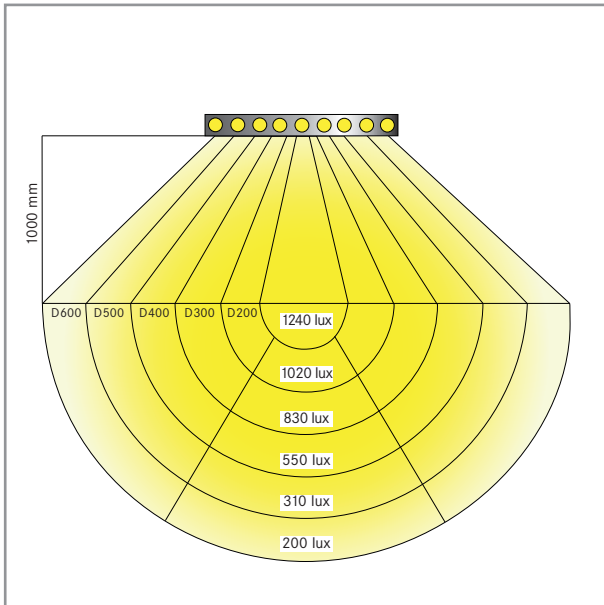
Technical details	Page 14
Lens	40°
Current	500 mA
Lighting systems	HE-TLED3

HE-TLED6



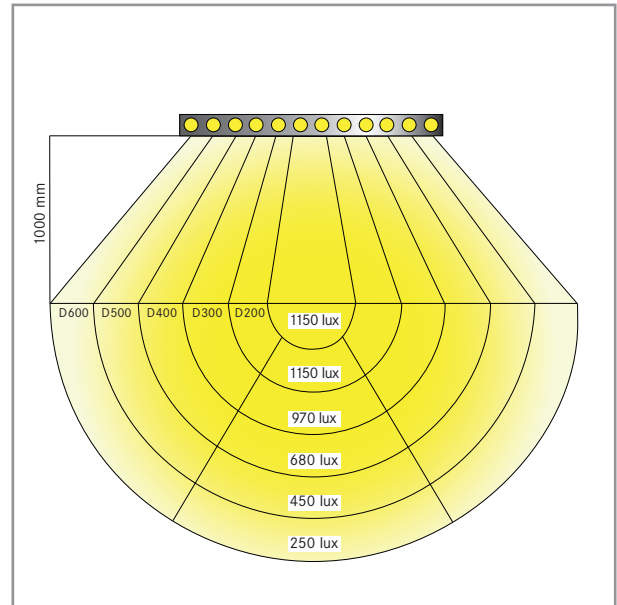
Technical details	Page 14
Lens	40°
Current	500 mA
Lighting systems	HE-TLED6

HE-TLED9



Technical details	Page 14
Lens	40°
Current	500 mA
Lighting systems	HE-TLED9

HE-TLED12



Technical details	Page 14
Lens	40°
Current	500 mA
Lighting systems	HE-TLED12

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HE-TCITY MACHINE LIGHTING

Like the HETLED Series, also HE-TCITY is perfect for the permanent illumination of machine interiors. HE-TCITY is available in four sizes: 6 W, 12 W, 18 W, and 24 W. The HE-TCITY housing is made of aluminium encased in borosilicate glass. All HE-TCITY versions fulfil the protective requirements for IP 68.



Machine inner lighting HE-TCITY with mounting

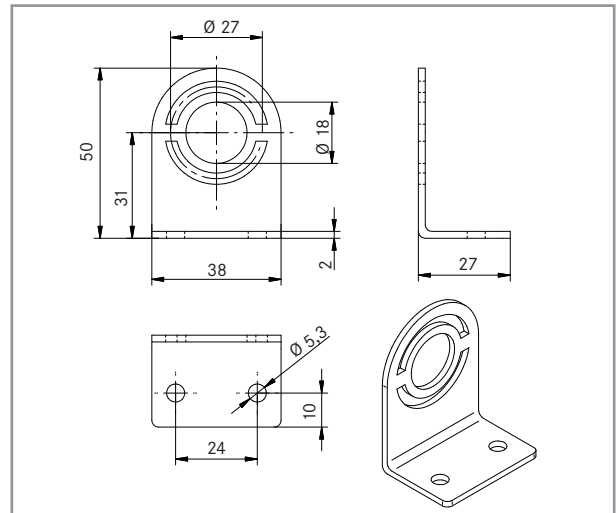
The encapsulated design is an effective barrier against foreign particles and moisture for a maintained high quality of lighting. The LEDs are designed for a long service life and high light quality, reducing maintenance work and energy costs to a considerable degree.

Advantages of using HE-TCITY lamps

- Compact measurements with maximum illumination
- Robust design for demanding applications
- 120° lighting angle
- Direct 24 V connector, integrated adapter
- Innovative fastening modes for maximised installation convenience
- Resistant to most coolants and lubricants
- High IP 68 rating
- LED technology for up to 50,000 hours of operation



Machine inner lighting HE-TCITY



Holder to screw for HE-TCITY and HE-TLED

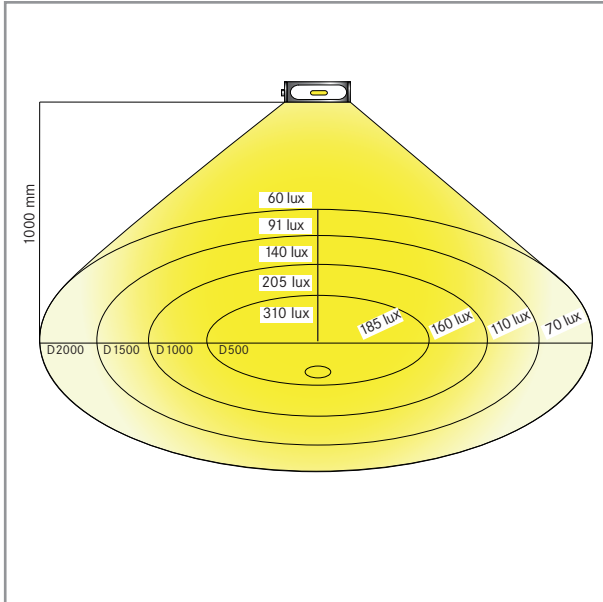


	HE-TCITY6	HE-TCITY12	HE-TCITY18	HE-TCITY24
Current 700 mA	6 W	12 W	-	-
Current 1,400 mA	-	-	18 W	24 W
Operating voltage	24 VDC	24 VDC	24 VDC	24 VDC
IEC marking	III	III	III	III
Cable length standard	1.5 m	1.5 m	1.5 m	1.5 m
LED life cycle	ca. 50,000 h	ca. 50,000 h	ca. 50,000 h	ca. 50,000 h
Number of LEDs	1	2	3	4
Light temperature	5000 K Ra65	5000 K Ra65	5000 K Ra65	5000 K Ra65
Lens	120°	120°	120°	120°
Dimensions (mm)	Ø 38x202	Ø 38x372	Ø 38x542	Ø 38x712
Fasteners	Holder / Clips	Holder / Clips	Holder / Clips	Holder / Clips
Colour	Aluminium/Glass	Aluminium/Glass	Aluminium/Glass	Aluminium/Glass
IP Class	IP68	IP68	IP68	IP68

Delivery with cable lengths 1.5m, 24 Vdc cable ends of bare wires.

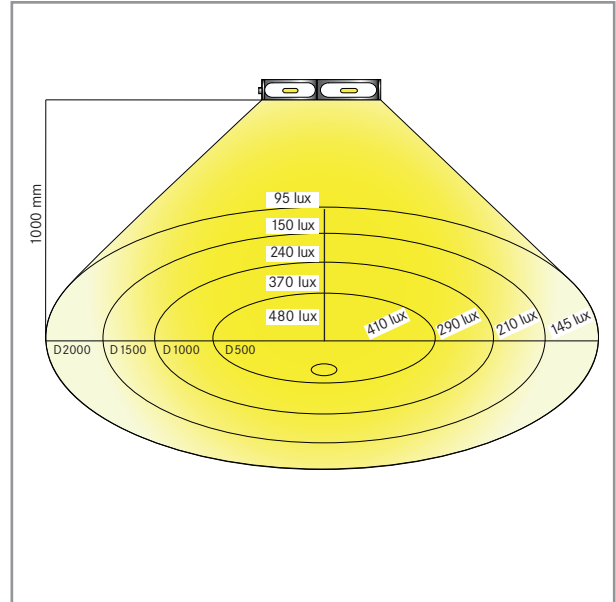
ILLUMINATION DISTRIBUTION CHARTS

HE-TCITY6



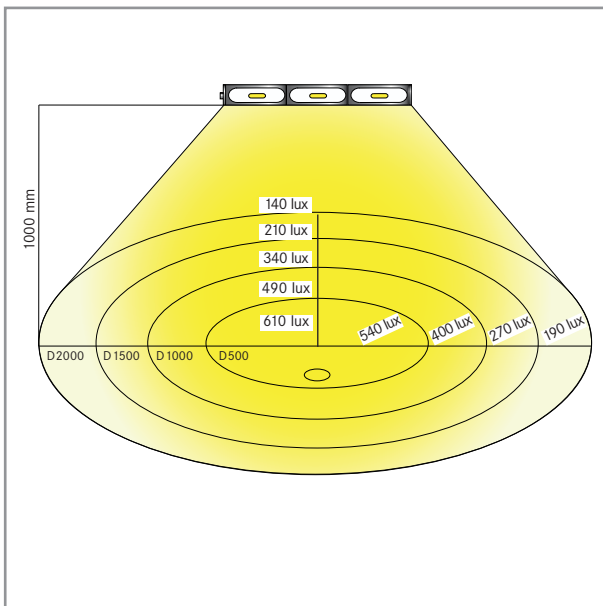
Technical details	Page 16
Lens	120°
Current	24V/700 mA
Lighting systems	HE-TCITY.6

HE-TCITY12



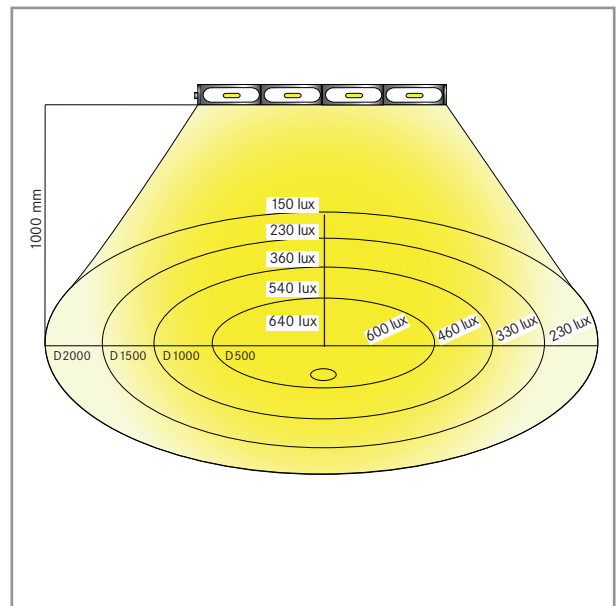
Technical details	Page 16
Lens	120°
Current	24V/700 mA
Lighting systems	HE-TCITY.12

HE-TCITY18



Technical details	Page 16
Lens	120°
Current	24V/1400 mA
Lighting systems	HE-TCITY.18

HE-TCITY24



Technical details	Page 16
Lens	120°
Current	24V/1400 mA
Lighting systems	HE-TCITY.24

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»SECRET MTL/MTLG« LED LIGHTING RAIL

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SPOT FITTING LIGHTING



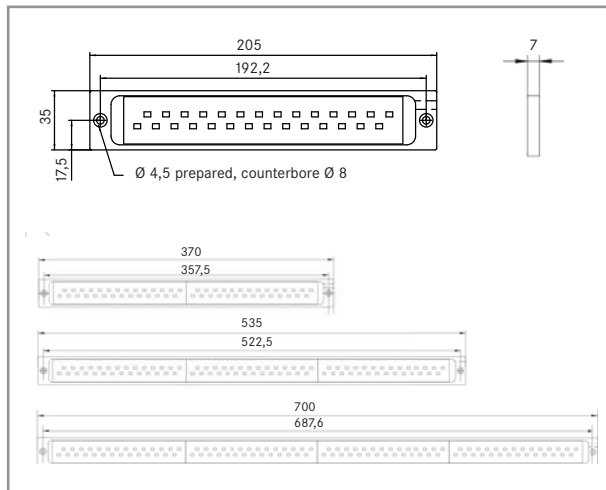
HEMA »SECRET MTL« and »SECRET MTLG« LED lighting rail

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MACHINE LIGHTING

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INTEGRATED LIGHTING



The HEMA LED model range »SECRET MTL« is an innovative 24 VDC LED lighting for demanding and imperceptibly applications.

The LED lighting rails are compact and extremely flat and will put your machine or industrial site into proper light. Due to the compact dimensions of the »SECRET MTL« the lighting rail can be integrated almost invisible into the machine. The »SECRET MTL« is also perfect suitable for retrofit of machines.

Thanks to the excellent light efficiency at a wide angle the »SECRET MTL« provides both, a complete integrable machine and industrial light.

The also available »SECRET MTLG« type is additionally equipped with a cover plate of tempered glass.

Advantage »SECRET MTL« LED Lighting rail

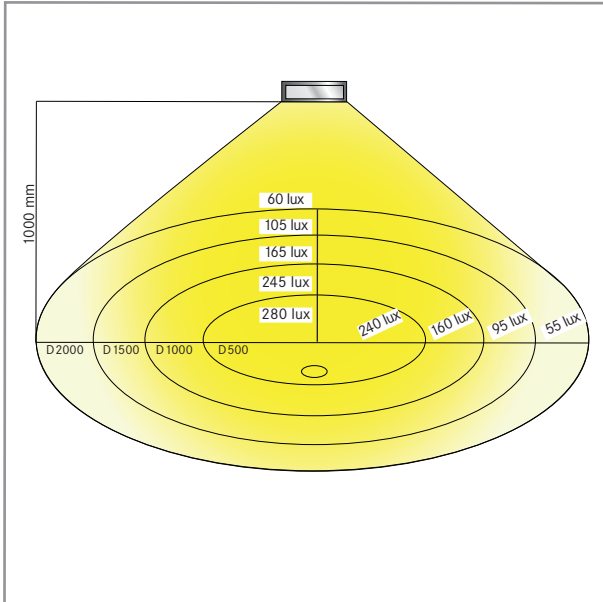
- Power supply 24V
- Connection via M12 plug
- Extremely slimline housing
- shock and vibration proof sealed in PUR backfill
- Anodized aluminium housing
- IP Rating IP69K

Type	SECRET MTL.6	SECRET MTL.12	SECRET MTL.18	SECRET MTL.24	SECRET MTL.36	SECRET MTL.48
Dimensions extern LxBxH	205x35x7mm	370x35x7mm	535x35x7mm	700x35x7mm	1030x35x7mm	1360x35x7mm
Power Supply	24V	24V	24V	24V	24V	24V
Operating voltage	5W	10W	15W	20W	30W	40W
Current	210mA	420mA	630mA	840mA	1260mA	1680mA
Number LED rails	1	2	3	4	6	8
Material	Alu anod./ PUR backfill	Alu anod./ PUR backfill	Alu anod./ PUR backfill	Alu anod./ PUR backfill	Alu anod./ PUR backfill	Alu anod./ PUR backfill
Lens	ca. 120°	ca. 120°	ca. 120°	ca. 120°	ca. 120°	ca. 120°
Light temperature	5700K	5700K	5700K	5700K	5700K	5700K
IP Rating	IP69K	IP69K	IP69K	IP69K	IP69K	IP69K
Connection	M12	M12	M12	M12	M12	M12
Connection cable length	PUR 3000mm	PUR 3000mm	PUR 3000mm	PUR 3000mm	PUR 3000mm	PUR 3000mm

Please see also our information on **HEMA Window** machine protection windows with integrated »SECRET MTL« LED Lighting rail - two systems that match.

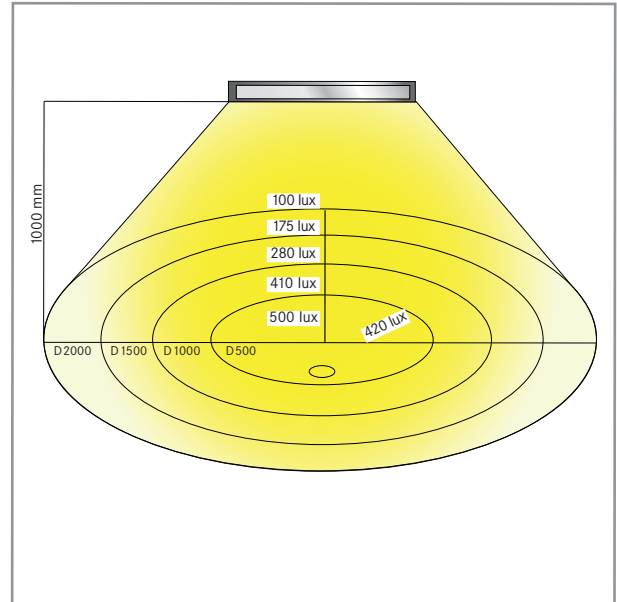
ILLUMINATION DISTRIBUTION CHARTS

HE-SECRET MTL.6



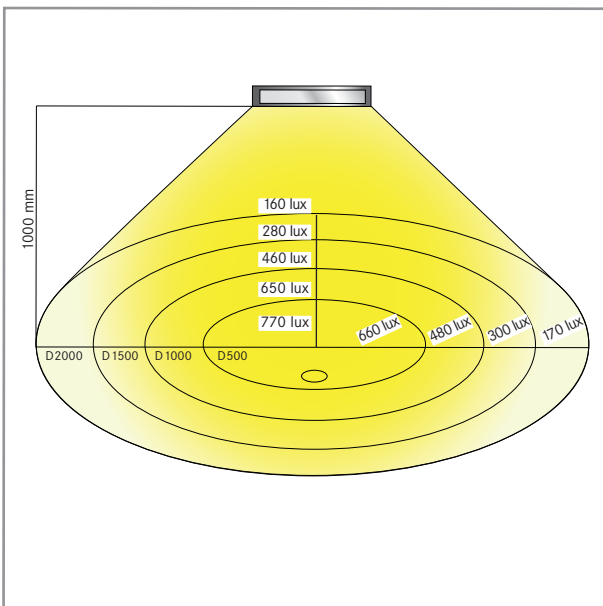
Technical details	Page 18
Lens	ca.120°
Current	24V/210mA
Lighting systems	HE-SECRET MTL.6

HE-SECRET MTL.12



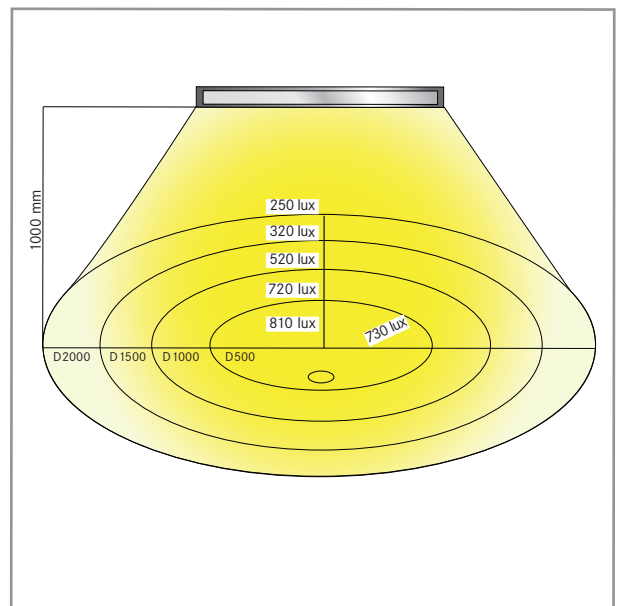
Technical details	Page 18
Lens	ca. 120°
Current	24V/420mA
Lighting systems	HE-SECRET MTL.12

HE-SECRET MTL.18



Technical details	Page 18
Lens	ca.120°
Current	24V/630mA
Lighting systems	HE-SECRET MTL.18

HE-SECRET MTL.24



Technical details	Page 18
Lens	ca.120°
Current	24V/840mA
Lighting systems	HE-SECRET MTL.24

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»SECRET FLOOD« LED LIGHTING

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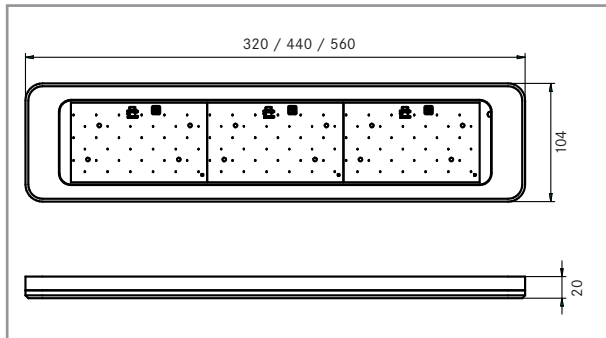
MACHINE LIGHTING

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INTEGRATED LIGHTING



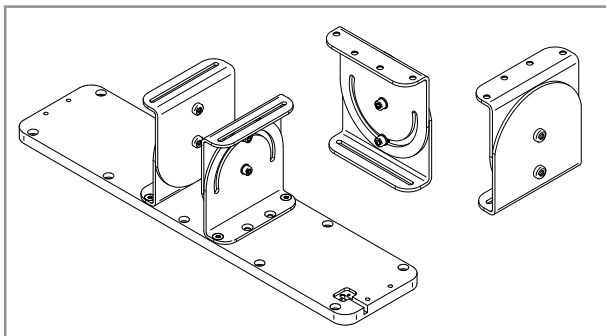
HEMA »SECRET FLOOD« LED lights



HEMA »SECRET FLOOD« dimensions



HEMA »SECRET FLOOD« mount



HEMA »SECRET FLOOD« mounting

The HEMA LED light »SECRET FLOOD« is an enhancement of the successful »SECRET MTL« model range. The 24 VDC LED lighting stands for a new generation with excellent light efficiency at a wide angle. The »SECRET FLOOD« LED lights with their compact measurements and robust design is not only the perfect illumination for all sizes of machine tools and industrial applications. Thanks to its small dimensions the »SECRET FLOOD« can easily be integrated within the machines

The »SECRET FLOOD« is mounted into an anodized aluminium housing, shock and vibration proof sealed in PUR backfill and resistant to most coolants and lubricants.

Thanks to the tempered safety glass the »SECRET FLOOD« withstands the impact of swarf; in any case the glass is exchangeable. The »SECRET FLOOD« is based on a modular concept, available as a built-in or external version, with optical micro prism or different safety glasses.

An LED has a max life of 50,000 hours, reducing maintenance work to a considerable degree. This long life and high lighting quality also help to reduce maintenance and energy consumption. With its excellent light efficiency at a wide angle the »SECRET FLOOD« fits seamless to the SECRET range of lights.

Advantages of »SECRET FLOOD«

- Power supply 24V
- Connection via M12 plug
- Mounting sidewise or backwise
- Extremely slim housing - only 20 mm
- shock and vibration proof sealed in PUR backfill
- Anodized aluminium housing
- IP Rating 69K
- different models

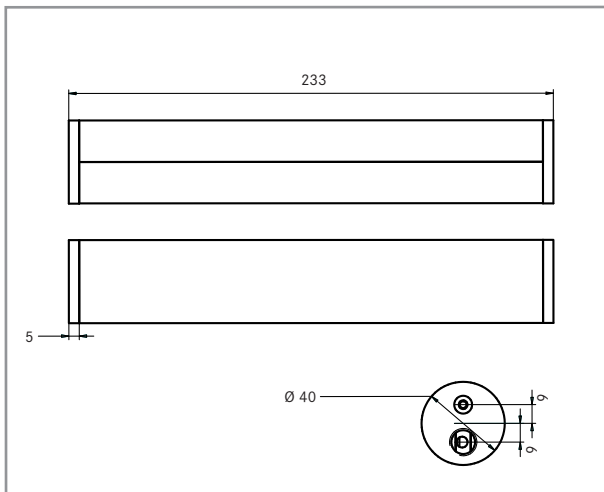


	SECRET FLOOD.27	FLOOD.42	FLOOD.68
Power supply	24 Vdc	24 Vdc	24 Vdc
Current	1,2 A	1,8 A	2,4 A
Operating voltage	30 W	45 W	60 W
Light temperature	6500 K	6500 K	6500 K
Lens	120°	120°	120°
Number LED	72	108	180

»SECRET TUBE« LED LIGHTING



HEMA »SECRET tube« LED lighting



The HEMA LED model range »SECRET tube« is a new member of the successful »SECRET« model range.

The innovative modular is also adapted for the »SECRET tube« LED lights. The 24 VDC LED with borosilicate glass is perfectly suitable for demanding and imperceptibly applications.

Due to its compact measurements and robust design the »SECRET tube« is easily suitable for Retrofit installation. Different mounting systems ease the installation of the »SECRET tube«. Thanks to the excellent light efficiency at a wide angle the »SECRET tube« provides both, a complete integrable machine and industrial light. An LED has a max life of 50,000 hours, reducing maintenance work to a considerable degree. This long life and high lighting quality also help to reduce maintenance and energy consumption.

Advantage »SECRET tube« LED Lighting

- Power supply 24V
- Connection via M12 plug
- shock and vibration proof sealed in PUR backfill
- different mounting systems
- IP rating IP 69K



Typ	SECRET tube5	SECRET tube10	SECRET tube15
Dimensions	Ø 40 x 233 mm	Ø 40 x 405 mm	Ø 40 x 563 mm
Power Supply	24 V	24 V	24 V
Operating Voltage	5 W	10 W	15 W
Current	210 mA	420 mA	630 mA
Number LED rails	1	2	3
Material	Alu anodized/Glass	Alu anodized/Glass	Alu anodized/Glass
Lens	ca. 120°	ca. 120°	ca. 120°
Light temperature	5700 K	5700 K	5700 K
IP Rating	IP69K	IP69 K	IP69 K
Connection	M12	M12	M12
Connection cable length	PUR 3000 mm	PUR 3000 mm	PUR 3000 mm

MACHINE SAFETY WINDOW WITH INTEGRATED LIGHTING

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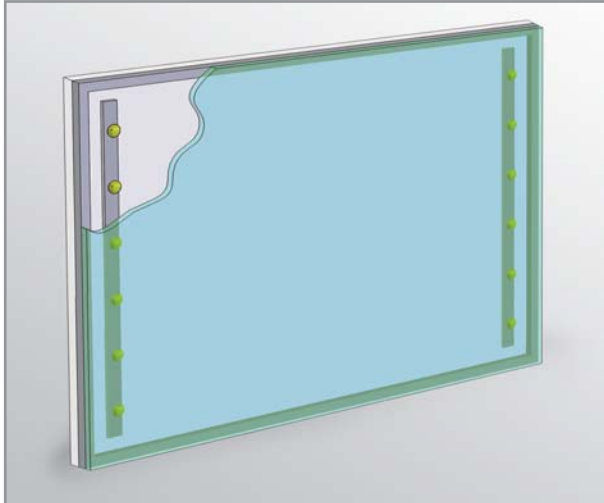
MACHINE LIGHTING

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INTEGRATED LIGHTING

Machine safety windows permit safe viewing of machining operations inside the machine tool. Most often there is a need for additional lighting.

Depending on available space and position, conventional lights can become dulled by accumulation of swarf and contamination by coolant.



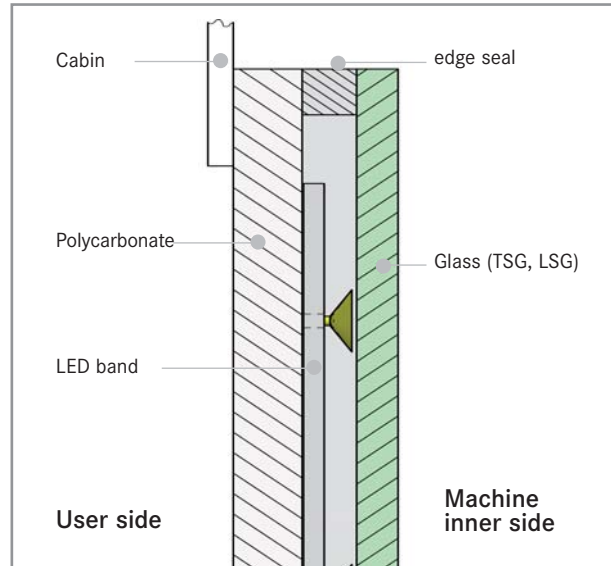
Machine safety window with LED lighting

The optimum solution combines a clear view into the machine with suitable lighting. This solution is available in the form of illuminated HEMA Windows - the integration of LED technology in a machine safety window. These illuminated safety windows combine the advantages of two established systems in one compact solution.

The variable position of the LED lighting rails - vertical or horizontal - enables a flexible fitting to requirements of



Machine safety window with LED lighting



Layout of the safety window with integrated lighting

the machine interior. Problems of swarf and coolant contamination of internally mounted lamps will be eliminated.

The well proven perimeter seal design ensures the LED's and internal surfaces are protected from ingress of contamination and moisture.

The advantages of HEMA windows with integrated lighting:

- Compact system solution
- Flexible illumination of the machine interior
- Tried and tested LED technology
- Elimination of lamp contamination
- Power supply from the mains or the machine
- Retrofit option on machines

Types

Power supply	24 VDC
Current	210mA, 420mA, 630mA, 840mA, 1260mA, 1680mA
Operating voltage	5W, 10W, 15W, 20W, 30W, 40W
Lens	ca. 120°
Light temperature	5700 K
Connection	M12

Due to the complex plug-in system the LED modules can be reused when the machine window is damaged. Our service will be happy to advise you.

Further information on HEMA machine safety and Visiport rotating windows can be found in our catalogue »Protective Systems«.





Our range of products and services



Protection systems



Clamping and braking systems



LED Lighting systems

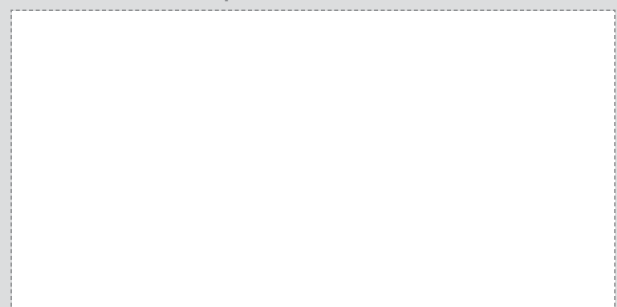


Service, logistics and maintenance

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Authorised sales partner:



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