



The right accessories for your Z-LASER - products

Accessories for lasers from
the machine vision and
positioning laser product range

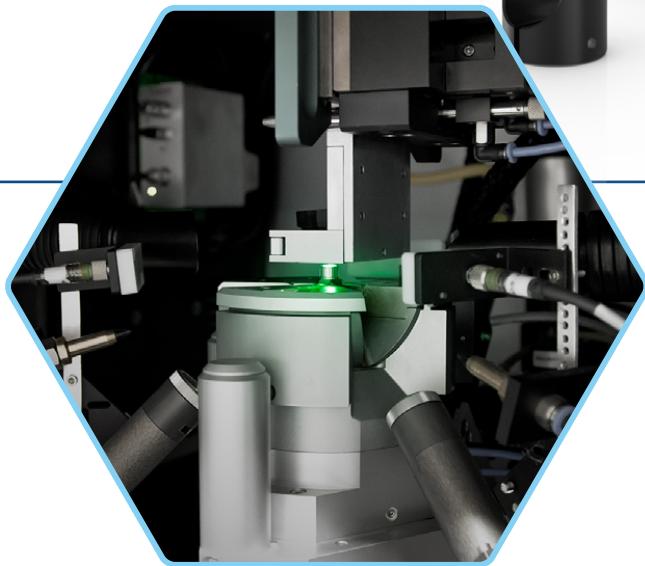
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Z-LASER accessories

Precisely.
Reliable.
Durable.

Z-LASER

bright ideas



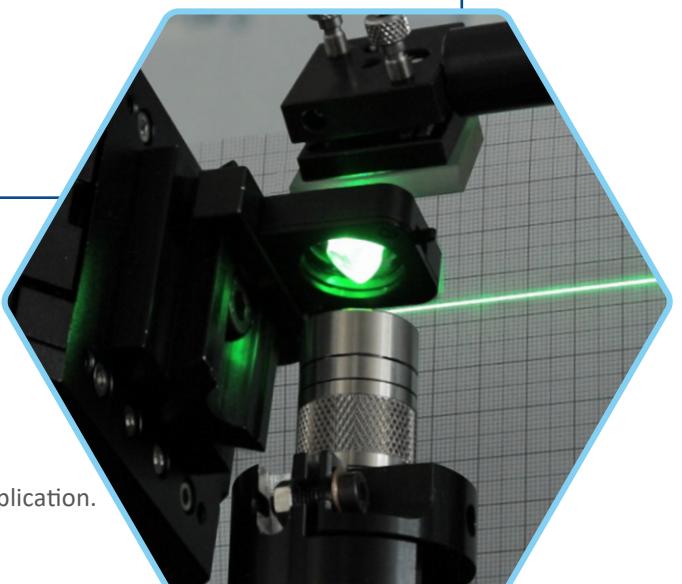
- **Highest precision since 1985**

For more than 35 years we have been manufacturing our laser modules with highest precision, for use in rough industrial environments as well as for sensitive applications in laboratories and medical sectors. The focus is always the precise projection of a sharp laser projection at a defined position.

- **Perfectly adjusted**

In addition to the laser module used, the corresponding accessories are decisive for precise and reliable use. The Z-LASER accessories are developed and manufactured according to the same high standards that we use to manufacture our laser modules.

The perfectly matched components offer impressive results and guarantee a long and carefree use of our laser modules in your application.



Mountings



• H8 – Precision mounting	5
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H8

Precision mounting

The aluminum block casing ensures optimal heat transfer. The stainless steel screw set allows for coaxial rotation, angular rotation, and parallel displacement of the laser module.

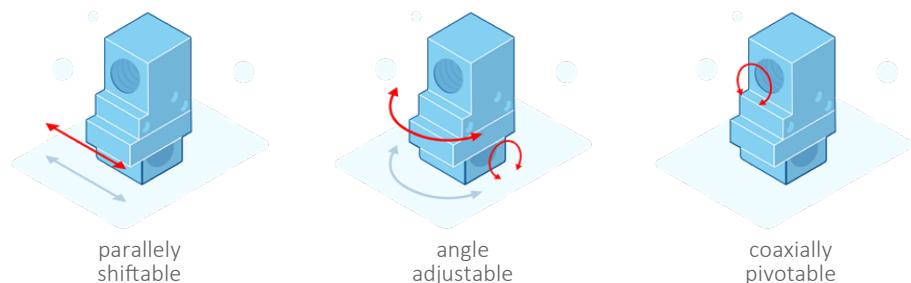


H8-M18 | Art.-Nr.: 100451600

Product name	Article code	Product description	Compatible with
H8-20	100180701	Can be mounted on a Ø 20 mm shaft	Laser with Ø 20 mm ZAT ZM18 ZX20



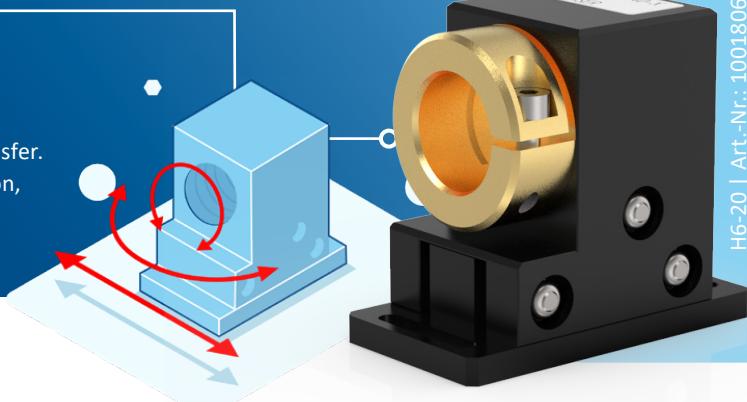
H8-M18	100451600	Can be mounted on a Ø 20 mm shaft	Laser with M18 external thread ZM18 ZX20
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H6

Precision mounting

The aluminum block casing ensures optimal heat transfer. The stainless steel screw set allows for coaxial rotation, angular rotation, and parallel displacement of the laser module.



H6-20 | Art.-Nr.: 100180601

Product name	Article code	Product description	Compatible with
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H6-20

100180601

With slot for mounting

Laser with \varnothing 20 mm
ZAT
ZM18
ZX20



H6-M18

100427500

With slot for mounting

Laser with
M18 external thread
ZM18
ZX20



H6-M12

100488900

With slot for mounting

Laser with
M12 external thread
ZM12



H6-40

100243602

With slot for mounting

Laser with \varnothing 40 mm
ZPT-F
ZR
ZRG-F

Precision mounting H6-M18 for laser modules with an M18 thread

This aluminum precision mount is suitable for all laser modules with an M18 thread. The aluminum block casing ensures optimal heat transfer.

The stainless steel screw set allows for coaxial rotation, angular rotation, and parallel displacement of the laser module.

Also available for lasers with a diameter of Ø 12 mm (M12), Ø 20 mm, or Ø 40 mm.

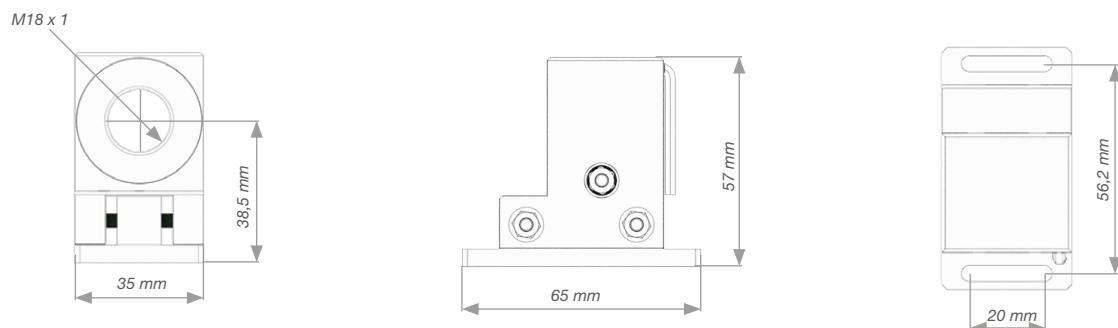


- Aluminum mounting for all ZM18 lasers
- coaxially pivotable
- angle adjustable
- parallelly shiftable
- maintenance-free
- self-locking

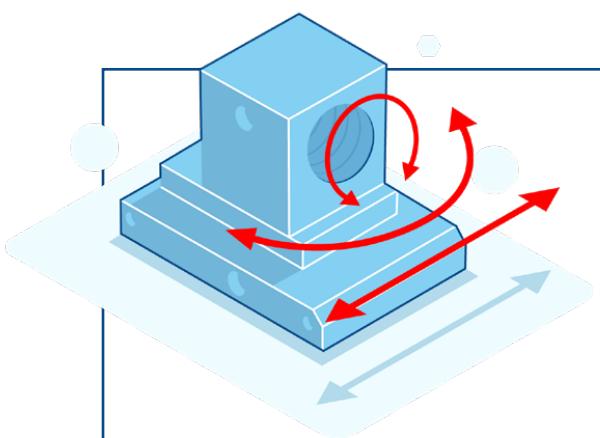
Specifications

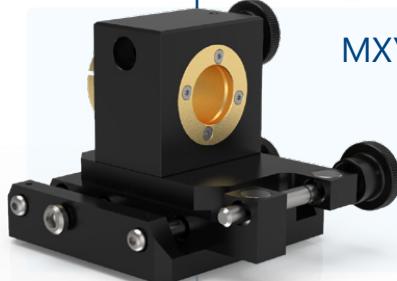
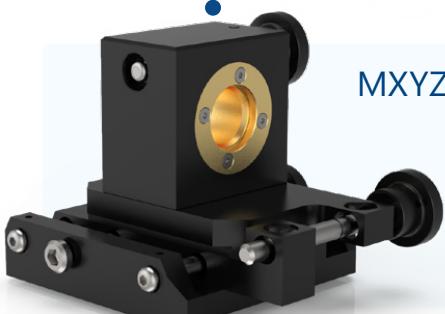
Body 65mm x 35mm x 57mm (L, W, H)

Material Anodised aluminum



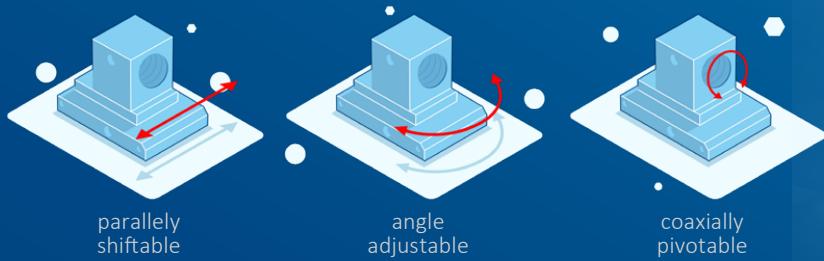
Special precision mountings



Product name	Article code	Product description	Compatible with
 HX-11	HX-11-K	Material: PVC Precision disc-spring mount	Laser with Ø 11 mm ZD ZF-peF
 MXYZ-20	MXYZ-20B	Mount can be turned by 20°, parallel shiftable by 20 mm, maintenance-free, backlash-free, self-locking	Laser with Ø 20 mm ZAT ZM18 ZX20
 MXYZ-M18	MXYZ-M18	Mount can be turned by 20°, parallel shiftable by 20 mm, maintenance-free, backlash-free, self-locking	Laser with M18 external thread ZM18 ZX20

Precision mounting MXYZ-M18 for laser modules with an M18 thread

The precision mounting can be adjusted in 3 axes. The base plate of the assembly has 4 threaded holes through which the mounting bracket can be installed.



- Aluminum mounting for all ZM18-Laser
- coaxially pivotable, 360°

- angle adjustable up to 20°
- parallelly shiftable up to 20 mm

- maintenance-free
- backlash-free and self-locking

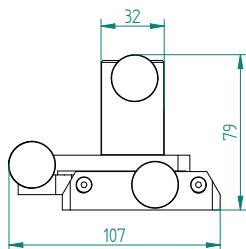
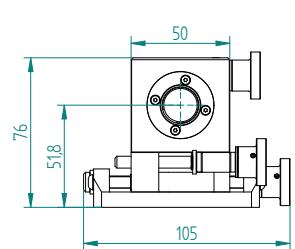
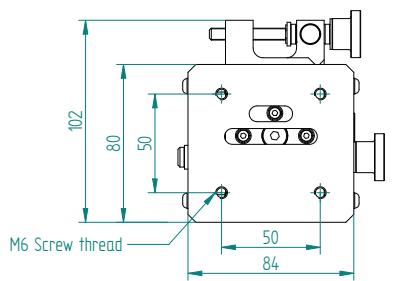


MXYZ-M18 | Art.-Nr.: MXYZ-20B

Specifications

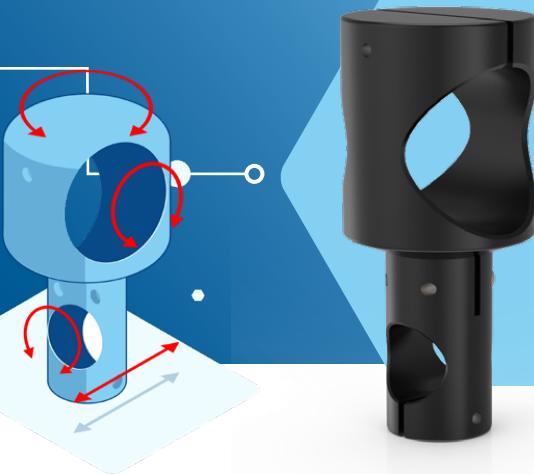
Body	105mm x 107mm x 79mm (L, W, H)				
Material	Anodised aluminum				

Technical specifications	Symbol	Unit	Min	Typ	Max
Length	l	mm	104,5	105	105,5
Wide	w	mm	106,5	107	107,5
High	h	mm	78,5	79	79,5
Axial angle	α	°		360	
Parallel adjustment	x	mm		+/- 9	
Tilt angle	ϕ	°		+/- 8	
Angle of the positioning accuracy		mrad		0,5	
Parallel positioning accuracy		mm		0,1	
Positioning accuracy		mrad		0,5	



H0 Aluminum mounting

The aluminum block casing ensures optimal heat transfer.
The H0-20 mounting can also be adapted to other
diameter lasers by way of adaptors.

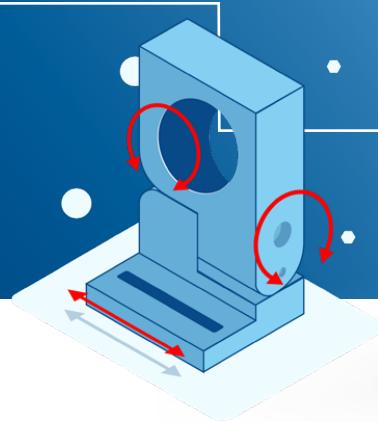


H0-40-20 | Art.-Nr.: 100182500

Product name	Article code	Product description	Compatible with
	H0-20-20	100182200 Can be mounted on a \varnothing 20 mm shaft	Laser with \varnothing 20 mm ZAT ZM18
	H0-11-20	100322100 Combi package: mount + adapter: Mount: H0-20-20, aluminum, horizontally rotatable, \varnothing 20 mm Adapter: AP-11-0 with \varnothing 11 mm	Laser with \varnothing 11 mm ZD ZF-pe-F
	H0-14-20	100322200 Combi package: mount + adapter: Mount: H0-20-20, aluminum, horizontally rotatable, \varnothing 20 mm Adapter: AP-14-0 with \varnothing 14 mm	Laser with \varnothing 14 mm ZT
	H0-40-20	100182500 Can be mounted on a \varnothing 20 mm shaft	Laser with \varnothing 40 mm ZPT-F ZR ZRG-F

H2 Aluminum mounting

The aluminum mounting can be tilted 60° and is suitable for different laser modules. The aluminum housing ensures optimum heat dissipation.



H2-20 | Art.-Nr.: H2-20

Product name	Article code	Product description	Compatible with
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H2-20

H2-20

With slot for mounting

Laser with Ø 20 mm
ZAT
ZM18
ZX20



H2-M12

H2-M12

With slot for mounting and
M12 thread

Laser with
M12 external thread
ZM12



H2-11M

H2-11M

With slot for mounting

Laser with Ø 11 mm
ZD
ZF-pe-F



H2-11

H2-11

Combi package:
mount + adapter:
Mount: H2-20, aluminum,
tiltable, Ø 20 mm
Adapter:
AP-11 with Ø 11 mm

Laser with Ø 11 mm
ZD
ZF-pe-F



H2-14

H2-14

Combi package:
mount + adapter:
Mount: H2-20, aluminum,
tiltable, Ø 20 mm
Adapter:
AP-14 with Ø 14 mm

Laser with Ø 14 mm
ZT



H2-40

H2-40

With slot for mounting

Laser with Ø 40 mm
ZPT-F
ZR
ZRG-F

H3

Plastic mounting

The plastic mount with ball head for various laser modules can be tilted and rotated by up to 180°.



H3-20 | Art.-Nr.: H3-20

Product name	Article code	Product description	Compatible with
	H3-20	Plastic, with ball head and slot for mounting	Laser with Ø 20 mm ZAT ZM18 ZX20
	H3-M18	Plastic, with ball joint, M18 thread mount	Laser with M18 external thread ZM18 ZX20
	H3-M12	Plastic, with ball joint, M12 thread mount	Laser with M12 external thread ZM12
	H3-11	Combi package: mount + adapter: Mount: H3-20, plastic, with ball head, Ø 20 mm, with slot for mounting Adapter: AP-11 with Ø 11 mm	Laser with Ø 11 mm ZD ZF-pe-F
	H3-14	Combi package: mount + adapter: Mount: H3-20, plastic, with ball head, Ø 20 mm, with slot for mounting Adapter: AP-14 with Ø 14 mm	Laser with Ø 14 mm ZT

Adapters



- Adapters for size adjustments 14
- Adapters for size adjustments 15

Adapters for size adjustments

Product name	Article code	Product description	Compatible with
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AP-11-0

100248700

Reduction ring for mounts

H0, H6 and H8 from Ø 20 mm to Ø 11 mm



AP-14-0

100248800

Reduction ring for mounts

H0, H6 and H8 from Ø 20 mm to Ø 14 mm



AP-11

AP11

Reduction ring for mounts,
with attachment flange

H2 and H3 from Ø 20 mm
to Ø 11 mm



AP-14

AP14

Reduction ring for mounts,
with attachment flange

H2 and H3 from Ø 20 mm
to Ø 14 mm



AP-40

AP40

Reduction ring for mounts,
with attachment flange

from Ø 55 mm to Ø 40 mm



Product name	Article code	Product description	Compatible with
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**AP-M18-20**

100568102

Thread adapter from
M18 thread to Ø 20 mm

Laser with
M18 external thread
ZM18
ZX20

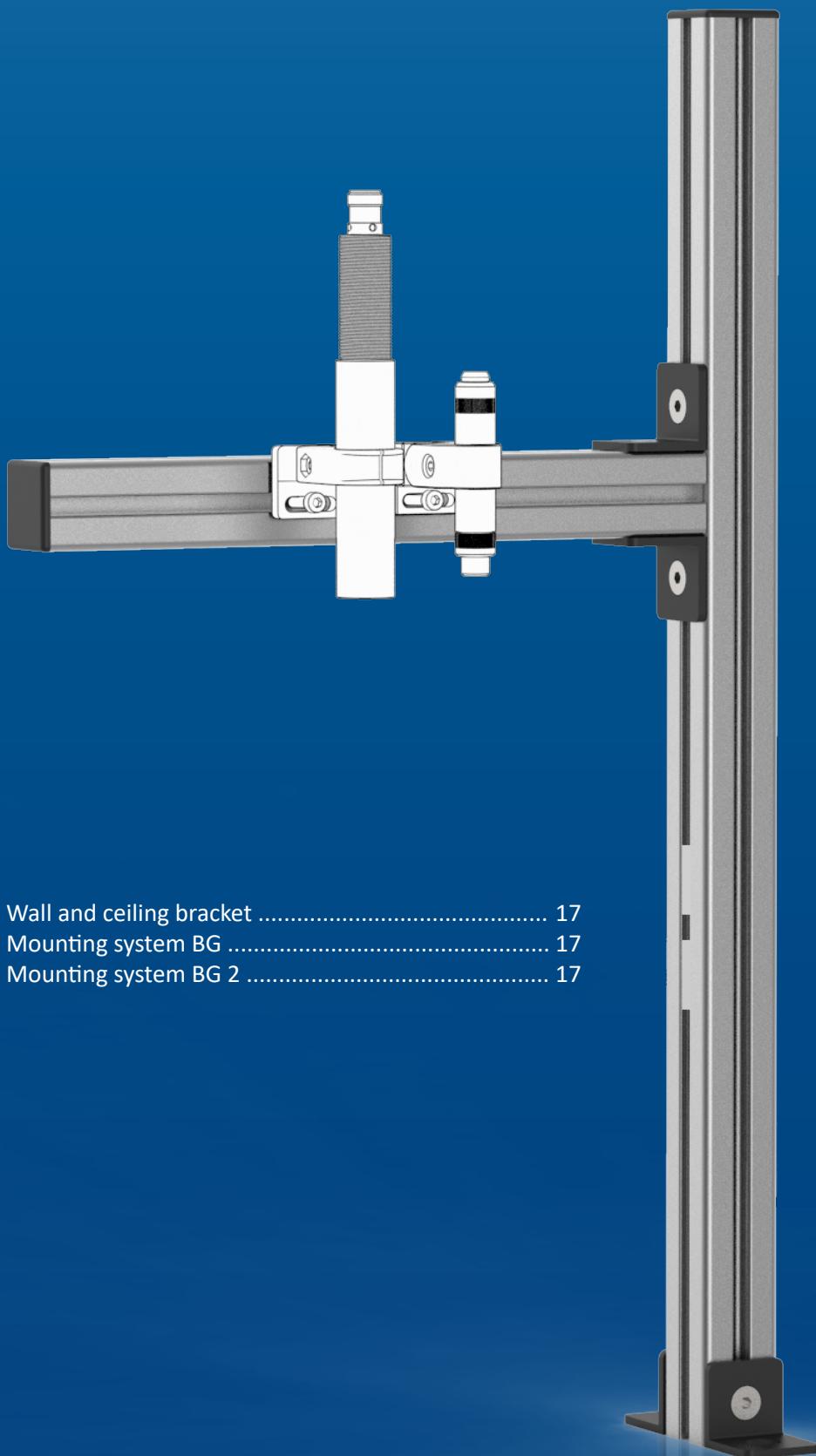
**AP-M18-19**

100568150

Thread adapter from
M18 thread to Ø 19 mm,
for mounts with Ø 19 mm

Laser with
M18 external thread
ZM18
ZX20

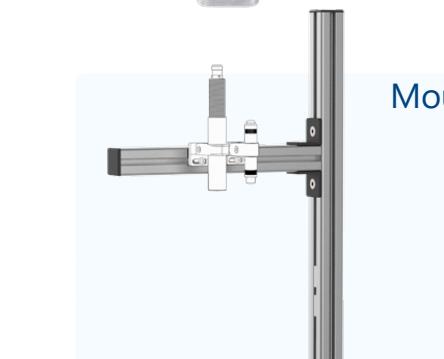
Mounting brackets



- Wall and ceiling bracket 17
- Mounting system BG 17
- Mounting system BG 2 17

Special mountings

Product name	Article code	Product description	Compatible with
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 A wall and ceiling mount consisting of a vertical aluminum tube with a horizontal cross bar, a ceiling flange, and a connector.	Wall and ceiling mount BD	Wall and ceiling mount. Consists of ceiling flange, aluminum tubes (\varnothing 40 mm x 1,000 mm), stainless steel cross bar (\varnothing 20 mm x 500 mm), and connector	H0-40-20 H0-20-20
 A mounting system consisting of two parallel aluminum profiles and fastening material.	Mounting system BG	Consists of 2 aluminum profiles (500 mm x 30 mm x 30 mm / 250 mm x 30 mm x 30 mm) and fastening material	H2, H3
 A mounting system consisting of two parallel aluminum profiles and fastening material, with an additional table clamp.	Mounting system 2 BG2	Consists of 2 aluminum profiles (500 mm x 30 mm x 30 mm / 250 mm x 30 mm x 30 mm) and fastening material, with additional table clamp	H2, H3

Power supplies



Power supplies with circular connector	19
Power supplies with Texas socket	19
Power supplies with Texas plug	19
Battery pack 18V	20
Power supplies for DIN rail	20
Distribution boxes	20

Power supplies

Product name	Article code	Product description	Compatible with
 Power supply with M12 circular connector	WPS-5-M12	Power supply with M12 circular connector, 5 VDC output voltage, for Europe and US/Japan plugs	ZM12 ZM18
 Power supply with M12 circular connector	WPS-9-M12	Power supply with M12 circular connector, 9 VDC output voltage, with Europe and US/Japan plugs	ZM12 ZM18 ZX20
 Power supply with Texas socket	WPSB-3.5	Power supply with Texas socket, 3.5 VDC output voltage, with Europe and US/Japan plugs	ZD-rot ZF-pe-F ZT
 Power supply with Texas socket	WPSB-5.0	Power supply with Texas socket, 5 VDC output voltage, with Europe and US/Japan plugs	ZD-grün
 Power supply with Texas plug	WPS-3.5	Power supply with Texas plug, 3.5 VDC output voltage, with Europe and US/Japan plugs	VB4 for ZD-red ZF-pe-F ZT
 Power supply with Texas plug	WPS-5.0	Power supply with Texas plug, 5 VDC output voltage, with Europe and US/Japan plugs	VB4 for ZD-green ZF-pe-F ZT



Adapters & Circular Connectors can be found on page 23.

Cables & Accessories | 23

Power supplies & distribution boxes

Product name

Article code

Product description

Compatible with



Battery pack 18 V

100453110

Battery pack with 18 V output voltage, operated by 2pcs Eblock 9 V batteries, with M12 plug

ZM12
ZM18
ZX20



NG-C-W-24M

100368500

Power supply for DIN rail in control cabinet with 24 VDC output voltage

ZD-24
ZM12
ZM18



NG-C-W-5M

100368400

Power supply for DIN rail in control cabinet with 5 VDC output voltage

ZD
ZM12
ZM18



Distribution box

VB4

Distribution box for connecting up to 4pcs ZD, ZF or ZT lasers to a WPS-3.5 or WPS-5.0 power supply

ZB
ZD
ZF-pe-F
ZT



Distribution box M12

VB4-M12

Distribution box for connecting up to 4pcs separately switchable ZM18 or ZM12 lasers to a WPS-5-M12 power supply

ZM12
ZM18
ZT

Cables



● Cables, 4-wire	22
Cables, 5-wire	22
Cables, 8-wire	22
Extension cable	23
USB cable	23
Plug adapters	23
Circular adapters	23

Cables & Accessories

Product name	Article code	Product description	Compatible with
 KB4-2m KB4-5m	100499400 100499300	2 m / 5 m connection cable with screw cap, straight, 4-wire	ZM12 ZM18 ZM12 ZM18
 KB4w-2m KB4w-5m	100499420 100499320	2 m / 5 m connection cable with screw cap, angled, 4-wire	ZM12 ZM18 ZM12 ZM18
 KB4g-2m KB4g-5m KB4g-10m KB4g-25m	100499461 100499302 100499452 100499307	2 m / 5 m / 10 m / 25 m Shielded connection cable (shield not attached), with screw cap, straight, 4-wire	ZM12 ZM18
 KB8g-2m KB8g-5m KB8g-10m	100499496 100499335 100499454	2 m / 5 m / 10 m Shielded connection cable (shield not attached) with screw cap, straight, 8-wire	ZQ1
 KB5g-2m KB5g-5m KB5g-10m KB5g-25m	100499491 100499325 100499453 100499308	2 m / 5 m / 10 m / 25 m Shielded connection cable (shield not attached), with screw cap, straight, 5-wire	ZX20 ZQ1
 KB5w-2m KB5w-5m	100499492 100499326	2 m / 5 m connection cable with screw cap, angled, 5-wire	ZX20 ZQ1



Product name	Article code	Product description	Compatible with	
 	Extension cable, 2 m	VKABEL2M	Extension cable with Texas plug and socket, 2 m	ZD ZF-pe-F ZT
	Plug adapter UK	100247510	For WPS power supplies, specially for Great Britain	WPS WPSB
	Plug adapter AU	100247530	For WPS power supplies, specially for Australia	WPS WPSB
	ZX20-USB cable	101243600	2 m cable for connecting a ZX20 to a PC	ZX20
	Circular connector	Z24GERADE	4-pole circular connector (female) M12, with screw cap, straight	ZM12 ZM18 ZX20
	Circular connector	Z24WINDEL	4-pole circular connector (female) M12, with screw cap, angled	ZM12 ZM18 ZX20

Accessories for the ZQ2

The ZQ2 laser series was designed for surveying that requires strong, bright lines with IR wavelengths. Here you will find the right accessories.



Product name	Article code	Product description	Compatible with
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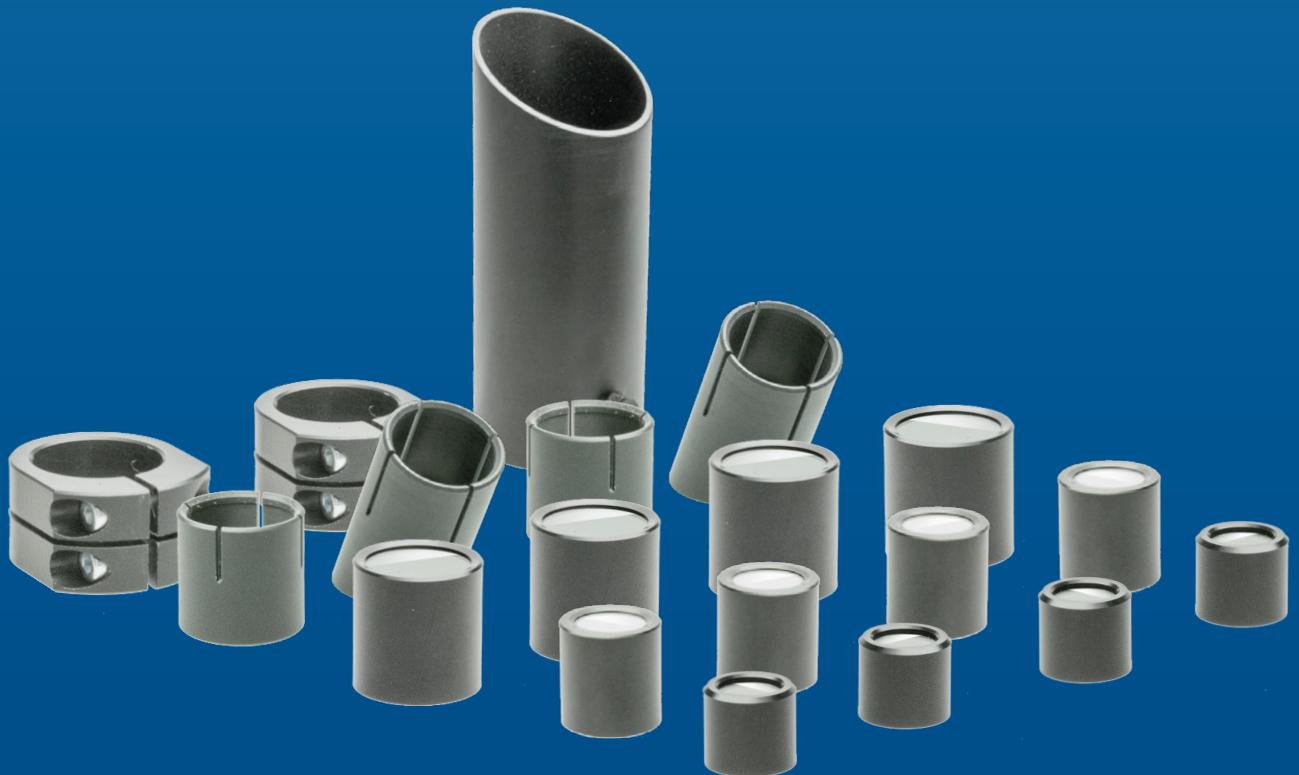
**Interface adapter
cable for ZQ2** 100940220 Interface adapter cable for ZQ2



**Focus locking ring
ZQ2** 100988100 Locks the focus ring



Optical accessories



Dimming caps	26
Protective caps	26
Line limiters	26
Optic heads	27
Focus locking ring	27
Target boards	27

Optical accessories

Product name	Article code	Product description	Compatible with	
	Dimming cap	AK20	Dimming cap, for reducing the laser line	Laser with Ø 20 mm
	Dimming cap bevelled	100620600	Dimming cap bevelled, for reducing the laser line	Laser with Ø 20 mm
	Protective cap IP67 with glass insert	100666600	Protective cap IP67 with glass insert, waterproof and dustproof	Laser with Ø 20 mm
	Dimming cap bevelled	AK40	Dimming cap bevelled, for reducing the laser line	Laser with Ø 40 mm
	Line limiter attachment LB11	LB11	For reducing the line length	Laser with Ø 11 mm
	Line limiter attachment LB20	100525702	For reducing the line length (approximately 11° to 84° fan angle)	Laser with Ø 20 mm



Product name	Article code	Product description	Compatible with
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ZM18 cap

100507500

Cap for M18 laser
with 400-700 nm Wavelength
with anti-glare glass pane
(spare part!)

ZM18



ZX20 cap

101078001

Cap for ZX20 laser
with 400-700 nm wavelength
with anti-glare glass pane
(spare part!)

ZX20



ZM12 cap

100848300

Cap for M12 laser
with 400-700 nm wavelength
with anti-glare glass pane
(spare part!)

ZM12



Optic head OK

ZTP, ZTL, ZTLP,
ZTX5, ZTX30,
ZTX60

Replaceable optic head for
ZT:
Dot, line, line with dot,
small cross, large cross

ZT laser



**Focus locking ring
ZM18**

100637700

Locks the focus ring

ZM18
ZX20



**Target board
RED**

Z290500

Magnetic target board (red)
made from transparent
plastic with target,
cm and inch scale

Red dot, cross
or line laser

**Target board
GREEN**

Z290501

Magnetic target board
(green) made from
transparent plastic with
target, cm and inch scale

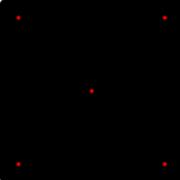
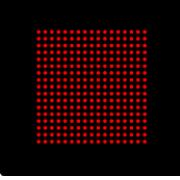
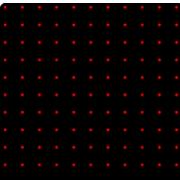
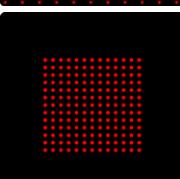
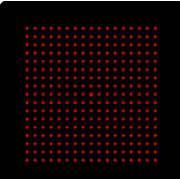
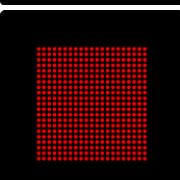
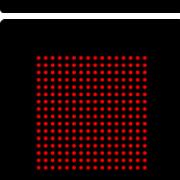
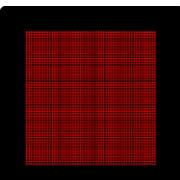
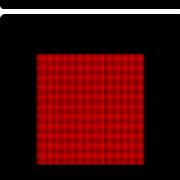
Green dot, cross
or line laser

Optics



Dot matrixes	29
Parallel lines	30
Crosses	32
Squares	33
Dots arranged in a line	34
Circles	35
Dots in random pattern	36
Laser targeting goggles	37

Dot matrixes

Product name	Article code	Product description	Compatible with
 * 2x2+1 dot matrix	2x2+1p	2x2+1 dot matrix Angle: 16.1°x16.1° @ 635 nm Projection size in 100 mm: 28 x 28 mm	ZM12 ZM18 ZX20
 * 17x17 dot matrix	17x17p14	17x17 dot matrix Angle: 14.6°x14.6° @ 635 nm Projection size in 100 mm: 26 x 26 mm	ZM12 ZM18 ZX20
 * 11x11 dot matrix	11x11p28	11x11 dot matrix Angle: 28°x28° @ 635 nm Projection size in 100 mm: 50 x 50 mm	ZM12 ZM18 ZX20
 * 13x13 dot matrix	13x13p4	13x13 dot matrix Angle: 4°x4° @ 635 nm Projection size in 100 mm: 7 x 7 mm	ZM12 ZM18 ZX20
 * 17x17 dot matrix	17x17p5	17x17 dot matrix Angle: 5°x5° @ 635 nm Projection size in 100 mm: 9 x 9 mm	ZM12 ZM18 ZX20
 * 21x21 dot matrix	21x21p5	21x21 dot matrix Angle: 5°x5° @ 635 nm Projection size in 100 mm: 9 x 9 mm	ZM12 ZM18 ZX20
 * 16x16 dot matrix	16x16p5	16x16 dot matrix Angle: 5°x5° @ 635 nm Projection size in 100 mm: 9 x 9 mm	ZM12 ZM18 ZX20
 * 51x51 dot matrix	51x51p22	51x51 dot matrix Angle: 22°x22° @ 635 nm Projection size in 100 mm: 39 x 39 mm	ZM12 ZM18 ZX20
 * 101x101 dot matrix	101x101p5	101x101 dot matrix Angle: 5.2°x5.2° @ 660 nm Projection size in 100 mm: 9.1 x 9.1 mm	ZM12 ZM18 ZX20

*These illustrations serve as symbolic representation, the illustrations may differ from the original.

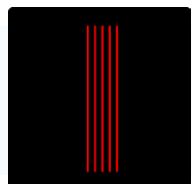
Parallel lines

Product name

Article code

Product description

Compatible with

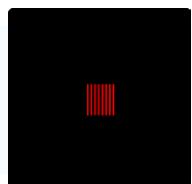


5 parallel lines

5L6

5 parallel lines
Angle: 6°x28.8° @ 635 nm
Projection size in 100 mm:
10.4 x 51.2 mm

ZM12
ZM18
ZX20

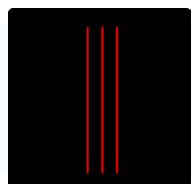


7 parallel lines

7L5

7 parallel lines
Angle: 5°x7° @ 635 nm
Projection size in 100 mm:
8.7 x 12.2 mm

ZM12
ZM18
ZX20

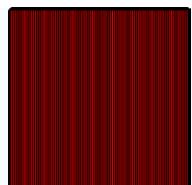


3 parallel lines

3L6

3 parallel lines
Angle: 6.2°x30.0° @ 660 nm
Projection size in 100 mm:
10.8 x 56.6 mm

ZM12
ZM18
ZX20

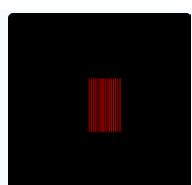


81 parallel lines

81L64

81 parallel lines
Angle: 63.9°x50.2° @ 650 nm
Projection size in 100 mm:
128.8 x 93.6 mm

ZM12
ZM18
ZX20



15 parallel lines

15L24g

15 parallel lines
Angle: 23.8°x28.2° @ 520 nm
Projection size in 100 mm:
8.7 x 12.2 mm

ZM12
ZM18
ZX20



5 parallel lines

5L17

5 parallel lines
Angle: 17°x17° @ 635 nm
Projection size in 100 mm:
29.9 x 29.9 mm

ZM12
ZM18
ZX20

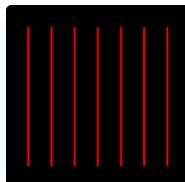
Parallel lines

Product name

Article code

Product description

Compatible with

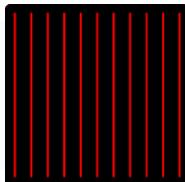


* 7 parallel lines

7L21

7 parallel lines
Angle: 21.4°x21.4° @ 635 nm
Projection size in 100 mm:
38 x 38 mm

ZM12
ZM18
ZX20

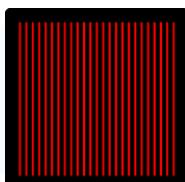


* 11 parallel lines

11L30

11 parallel lines
Angle: 30°x30° @ 635 nm
Projection size in 100 mm:
54 x 54 mm

ZM12
ZM18
ZX20

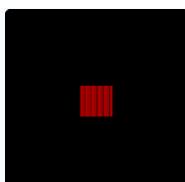


* 25 parallel lines

25L27

25 parallel lines
Angle: 27°x27° @ 635 nm
Projection size in 100 mm:
48 x 48 mm

ZM12
ZM18
ZX20

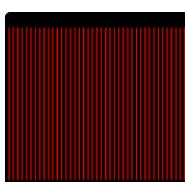


* 21 parallel lines

21L7

21 parallel lines
Angle: 7°x7° @ 635 nm
Projection size in 100 mm:
12 x 12 mm

ZM12
ZM18
ZX20

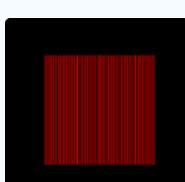


* 41 parallel lines

41L53

41 parallel lines
Angle: 54.9°x42.6° @ 660 nm
Projection size in 100 mm:
104.0 x 78.0 mm

ZM12
ZM18
ZX20



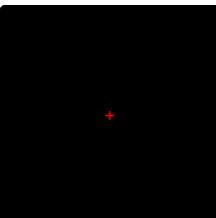
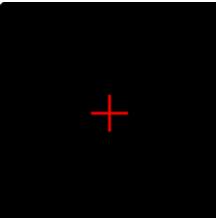
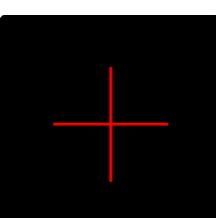
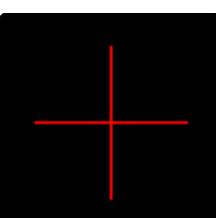
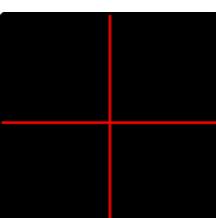
* 65 parallel lines

65L18

65 parallel lines
Angle: 18.4°x18.4° @ 635 nm
(more intense middle line)
Projection size in 100 mm:
32 x 32 mm

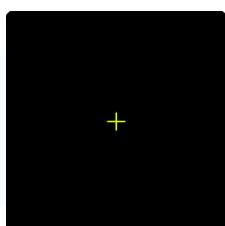
ZM12
ZM18
ZX20

Crosses

Product name	Article code	Product description	Compatible with	
 *	Cross	x2	Cross Angle: 2°x2° @ 645 nm Projection size in 100 mm: 3.4 mm	ZM12 ZM18 ZX20
 *	Cross	x5	Cross Angle: 5°x5° @ 635 nm Projection size in 100 mm: 9 mm	ZM12 ZM18 ZX20
 *	Cross	x10	Cross Angle: 10°x10° @ 635 nm Projection size in 100 mm: 18 mm	ZM12 ZM18 ZX20
 *	Cross	x15	Cross Angle: 15°x15° @ 635 nm Projection size in 100 mm: 26 mm	ZM12 ZM18 ZX20
 *	Cross	x30	Cross Angle: 36°x36° @ 635 nm Projection size in 100 mm: 66 mm	ZM12 ZM18 ZX20
 *	Cross	x45	Cross Angle: 45°x45° @ 635 nm Projection size in 100 mm: 83 mm	ZM12 ZM18 ZX20
 *	Cross	x60	Cross Angle: 60°x60° @ 635 nm Projection size in 100 mm: 116 mm	ZM12 ZM18 ZX20

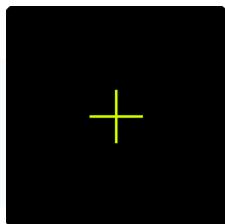
*These illustrations serve as symbolic representation, the illustrations may differ from the original.

Crosses

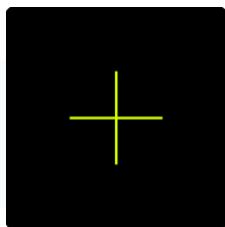


Product name	Article code	Product description	Compatible with
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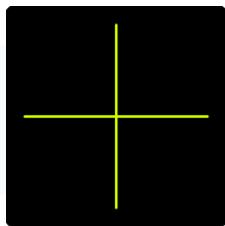
* Cross	x5g	Cross Angle: 5°x5° @ 520 nm Projection size in 100 mm: 9 mm	ZM18-green ZX20-green ZD-green
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* Cross	x15g	Cross Angle: 15°x15° @ 520 nm Projection size in 100 mm: 26 mm	ZM18-green ZX20-green ZD-green
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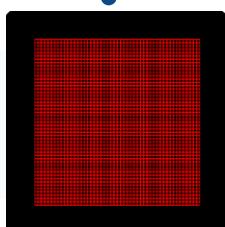


* Cross	x25g	Cross Angle: 25°x25° @ 532 nm Projection size in 100 mm: 45 mm	ZM18-green ZX20-green ZD-green
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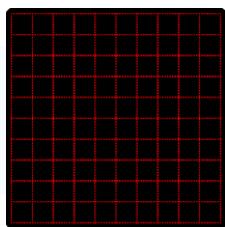


* Cross	x52g	Cross Angle: 52°x52° @ 515 nm Projection size in 100 mm: 98 mm	ZM18-green ZX20-green ZD-green
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Squares



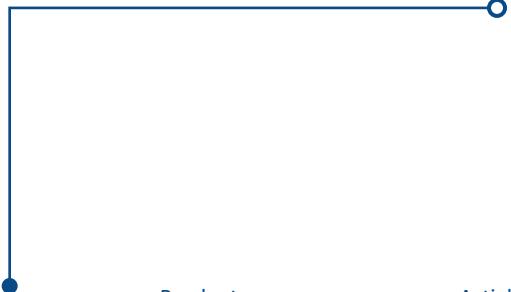
51x51 squares	51x51q23	51x51 squares Angle: 22.6°x22.6° @ 635 nm Projection size in 100 mm: 40 x 40 mm	ZM12 ZM18 ZX20
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10x10 squares (dotted lines)	10x10q40	10x10 squares Angle: 40.0°x40.0° @ 658 nm Projection size in 100 mm: 72.8 x 72.8 mm	ZM12 ZM18 ZX20
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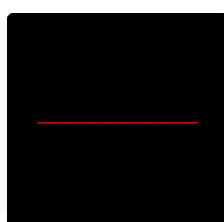
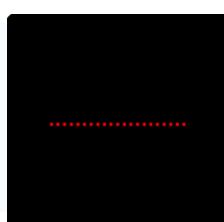
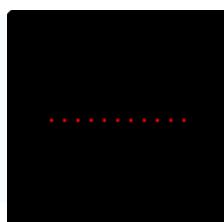
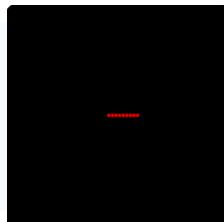
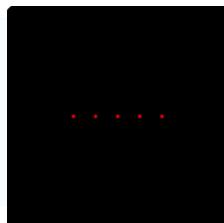


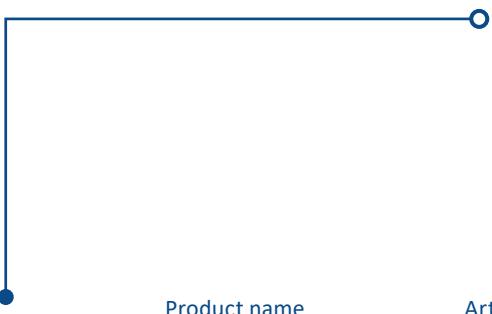
Dots arranged in a line



Product name	Article code	Product description	Compatible with
5 dots arranged in a line	5pl6	5 dots arranged in a line Angle: 6° @ 635 nm Projection size in 100 mm: 10.5 mm	ZM12 ZM18 ZX20
9 dots arranged in a line	9pl0,85	9 dots arranged in a line Angle: 0.85° @ 635 nm Projection size in 100 mm: 1.5 mm	ZM12 ZM18 ZX20
11 dots arranged in a line	11pl16	11 dots arranged in a line Angle: 16.1° @ 635 nm Projection size in 100 mm: 28.1 mm	ZM12 ZM18 ZX20
19 dots arranged in a line	19pl13	19 dots arranged in a line Angle: 13.5° @ 635 nm Projection size in 100 mm: 23.5 mm	ZM12 ZM18 ZX20
99 dots arranged in a line	99pl18	99 dots arranged in a line Angle: 18.4° @ 635 nm Projection size in 100 mm: 32 mm	ZM12 ZM18 ZX20

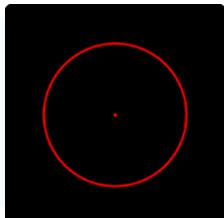
* These illustrations serve as symbolic representation, the illustrations may differ from the original.





Geometric forms

Product name	Article code	Product description	Compatible with
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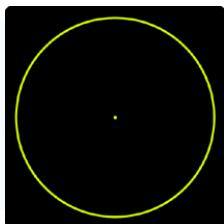
Circle

c34

Circle
Angle: 34° @ 635 nm
Projection size in 100 mm:
60 mm

ZM12
ZM18
ZX20

*



Circle

c45g

Circle
Angle: 45° @ 520 nm
Projection size in 100 mm:
83 mm

ZM18-green
ZX20-green

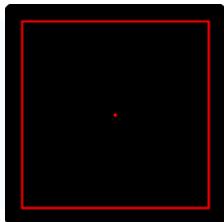
*

5 concentric
circles

5c28

Concentric circles
Angle: 28.2° @ 635 nm
Projection size in 100 mm:
50.2 mm

ZM12
ZM18
ZX20



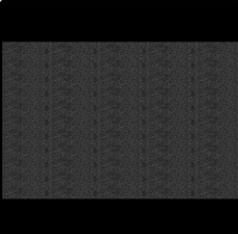
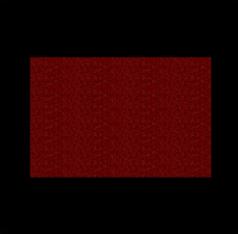
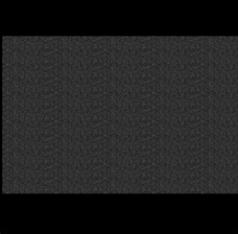
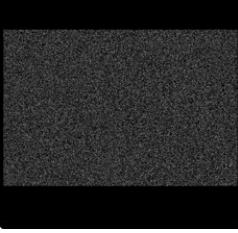
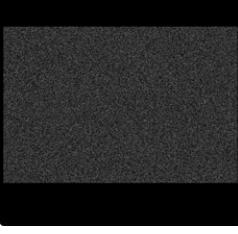
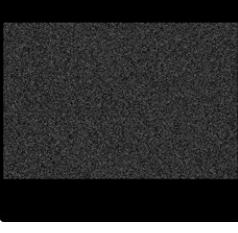
Square

q34

Square
Angle: 34.3° @ 635 nm
Projection size in 100 mm:
60 x 60 mm

ZM12
ZM18
ZX20

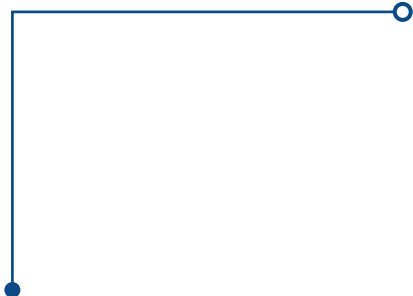
Dots in random pattern

Product name	Article code	Product description	Compatible with
 * 33000-Dot Pseudo-Random (Design Wavelength 830 nm)	33kirp60	33000-Dot Pseudo-Random Number of dots: 33,000 Angle: 59.6 x 41.7° @ 830 nm Projection size in 100 mm: 114.6 x 76.3 mm	ZM12 ZM18
 * 33000-Dot Pseudo-Random (Design Wavelength 645 nm)	33krp45	33000-Dot Pseudo-Random Number of dots: 33,000 Angle: 45.9 x 31.5° @ 645 nm Projection size in 100 mm: 84.8 x 56.4 mm	ZM12 ZM18
 * 40100-Dot Pseudo-Random (Design Wavelength 850 nm)	40kirp60	40100-Dot Pseudo-Random Number of dots: 40,100 Angle: 59.7 x 39.6° @ 850 nm Projection size in 100 mm: 114.9 x 72.0 mm	ZM12 ZM18
 * 31806-Dot Truly-Random (Design Wavelength 830 nm)	31kirp61	31806-Dot Pseudo-Random Number of dots: 31,806 Angle: 61.3 x 47.0° @ 830 nm Projection size in 100 mm: 118.5 x 86.9 mm	ZM12 ZM18
 * 47708-Dot Truly-Random (Design Wavelength 830 nm)	47kirp61	47708-Dot Truly-Random Number of dots: 47,708 Angle: 61.3 x 47.0° @ 830 nm Projection size in 100 mm: 118.5 x 86.9 mm	ZM12 ZM18
 * 29594-Dot Truly-Random (Design Wavelength 830 nm)	29kirp61	29594-Dot Pseudo-Random Number of dots: 29,594 Angle: 61.3 x 46.8° @ 830 nm Projection size in 100 mm: 118.5 x 86.5 mm	ZM12 ZM18

*These illustrations serve as symbolic representation, the illustrations may differ from the original.



Dots in random pattern



Product name	Article code	Product description	Compatible with
* 51978-Dot Truly-Random (Design Wavelength 640 nm)	51kzp52	51978-Dot Truly-Random Number of dots: 51,978 Angle: 52.0 x 66.2° @ 640 nm Projection size in 100 mm: 97.5 x 130.4 mm	ZM12 ZM18
* 101050-Dot Truly-Random (Design Wavelength 640 nm)	101kzp53	101050-Dot Truly-Random Number of dots: 101,050 Angle: 53.3 x 67.6° @ 640 nm Projection size in 100 mm: 100.4 x 133.9 mm	ZM12 ZM18

Laser targeting goggles

Laser target glasses for better visibility of laser projections on light and dark surfaces.



NOT suitable as laser safety goggles!



LZB red

LZB

Laser targeting goggles for red lasers

ZM12
ZM18



LZB green

LZB green

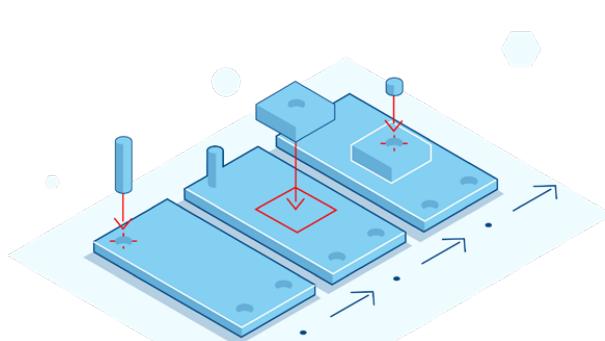
Laser targeting goggles for green lasers

ZM12
ZM18

About Z-LASER

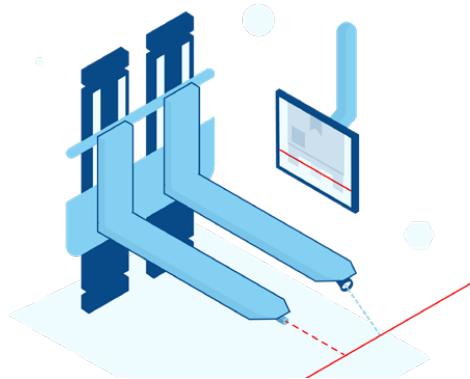
Z-LASER is a German manufacturer of laser sources for innovative customer applications. Over the past 30 years we have successfully established ourselves in the following areas:

- Laser as positioning aid (industry and trade)
- Lasers for image processing
- Laser projectors as positioning aids (industry and trade)
- Customer-specific lasers (OEM laser solutions)



Intelligent technologies

Our intelligent systems – consisting of mechanics, electronics, and optics – allow a high coverage of all customer requirements and contribute to a clear differentiation from competitors. Numerous patents and utility models have been successfully registered in recent years.



Innovations for the future

Today, the company is also successful in many new, innovative industries that demand advanced laser technologies and designs.

„Quality is when
customers return to us
- not lasers.“

- Kurt-Michael Zimmermann,
Founder Z-LASER GmbH

Quality policy & mission statement

Quality starts with the conversation with the customer. His wishes, needs and expectations determine our entrepreneurial actions. We constantly rethink our activities. Misunderstandings should be avoided and the products and services should meet the customer's quality requirements. Every employee from all areas and in all activities is responsible for quality. This quality cannot be checked, therefore it is consistently produced by us.

Supplier policies

Z-LASER is a socially responsible company that is committed to the well-being of people and the environment. Compliance with ethical principles and legally binding regulations is a matter of course for us.



We see it as our duty to carry out our business activities accordingly and expect our suppliers to do the same. For this reason, we demand REACH and RoHS conformity from supplied products as well as articles and the avoidance of conflict materials as far as possible.



Z-LASER generates a considerable part of its energy requirements via its own solar system and thus makes an active contribution to climate protection.

Don't hesitate to contact us!

Z-LASER

Stefan Frei
Sales Manager
Positioning Lasers

✉ frei@z-laser.de
☎ +49 (0)761 296 44-309

V-Card

Michael Utz
Sales
Positioning Lasers

✉ utz@z-laser.de
☎ +49 (0)761 296 44-303

V-Card

„Quality is when customers return to us
- not lasers.“

- Kurt-Michael Zimmermann,
Founder Z-LASER GmbH

Our mission is to develop laser sources and laser projectors of the highest quality for our customers. Since founding Z-LASER in 1985 in Freiburg, we supply the industry with top functional and easy-to-use laser systems.

Z-LASER is a socially responsible company that cares about the well-being of people and its environment. A significant part of the energy requirement is gained through the in-house solar system. Furthermore, we only supply civil applications.

Lasertechnology
from Freiburg
made in Germany

Contact us.
We would be happy
to advise you!



Z-LASER GmbH
Merzhauser Str. 134
D-79100 Freiburg

+49 761 296 44-44
info@z-laser.de
www.z-laser.de

