



NP Focus-4 1CH



DATENBLATT
DATASHEET

NP Focus-4 1CH



12 m per feed-in (dimmed) | 4400 lm/m*
CRI > 90 | 2200 K-4000 K



Standardausführung

Aluminium eloxiert, inkl. IP65
Standardverguss transparent (PUTS)

Standard version

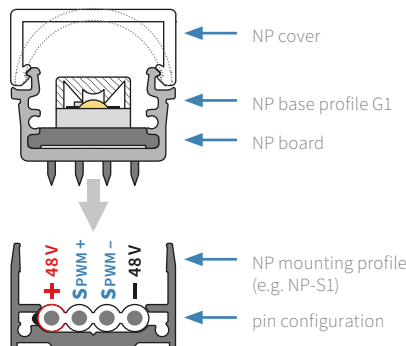
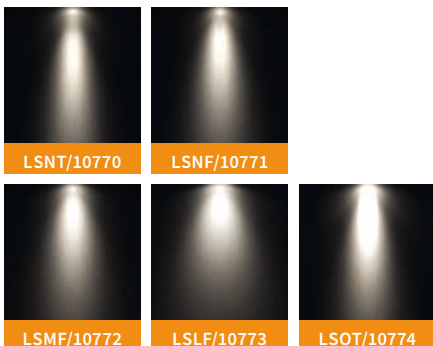
Anodised aluminium, incl. IP65 standard
encapsulation transparent (PUTS)

Sonderausführung schwarz eloxiert

inkl. optionalen schwarzen Verguss
(PUTB)

special version black anodized

incl. optional black encapsulation
(PUTB)



4400 Lumen,
präzise auf den Punkt
4400 lumen
precisely to the point

Mit bis zu 4400 lm/m Lichtstrom und Präzisionslinsen über jeder HighPowerLED wird das **NauticProfil® Focus-4 1CH** den hohen Anforderungen an Helligkeit und Lichtverteilung gerecht. Die optimale Wahl auch für Beleuchtungen mit UGR-Vorgaben. 48VDC Betriebsspannung sorgen für hohe Effizienz und Lebensdauer und machen den Leuchteneinsatz NP Focus-4 auch für Verkehrsprojekte und Installationsorte mit weiten Zuleitungen interessant.

Das Dimmen der LEDs erfolgt per SPWM Signal. Eine technische Besonderheit von FLASHAAR®. Der NP Focus-4 1CH Leuchteneinsatz ist alternativ auch mit schwarzem oder transparentem PU-Verguss in der Schutzart IP65 lieferbar.

With a luminous flux of up to 4400 lumen/m and precision lenses on each HighPowerLED, the **NauticProfil® Focus-4 1CH** light insert satisfies the high demands that are made on brightness and light distribution.

It is therefore the optimum choice for lighting that must meet UGR specifications. The operating voltage of 48 V DC ensures high efficiency and long service life and also makes the NP Focus-4 luminaire insert interesting for traffic projects and installation locations with long supply lines. The LEDs are dimmed on the circuit board using an SPWM signal. A special feature of FLASHAAR®. The NP Focus-4 1CH light insert is also available with black or transparent PU-encapsulation, IP65 protection.



characteristics



dimming



optional



mounting



* Alle Angaben zum Lumenstrom beziehen sich auf das Leuchtmedium. In Kombination mit Cover/Linsen kommt es zu materialbedingtem Lichtverlust.
All information about the luminous flux refers to the light source. In combination with covers/lenses it comes to material-related light loss.

Bestellnummer
item number

NP/F1C/G1/26D

F1C/G1/ 0258

G1/ ALA

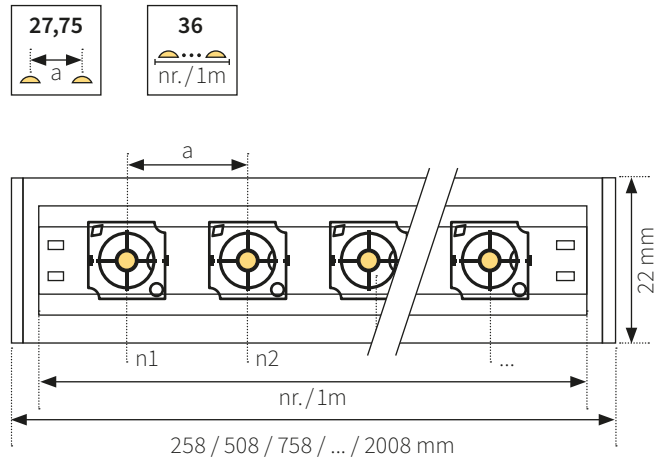
9 27

LSNT/10770

CST

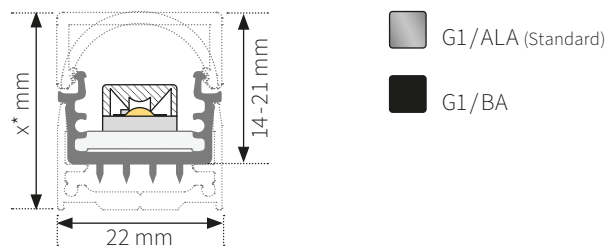
Technische Daten technical data

nominal voltage: 48VDC (Range: 36 to 48VDC)
 nominal wattage, white: 26W/m (220 mA)
 photometric code: 822/339, 927/339, 930/339, 840/339
 LED service life: L80/B10 > 54000h
 L90/B10 > 54000h (350 mA)
 dimmable: signal pulse width modulation (SPWM)
 length dividing matrix: 250 mm
 LED pitch: 27,75 mm, 36 LEDs/m
 solder jumper: 220, 350, 500, 630 mA (standard 220 mA)
 L(max) DIMMED = 12m (depending on light colour, max. 516W)
 with separately infeeded PWM signal, according to cabling
 scheme D/SPWM/1
 PIN configuration: +48VDC | SPWM+ | SPWM- | -48VDC
 L(max) NOT DIMMED = 39m (depending on light colour,
 max. 1920W). According to cabling scheme S/SPWM/1a.
 PIN configuration: + - - + (48VDC)



Basisprofil base profile

Das **Basisprofil G1** ist mit allen NP Montageprofilen von FLASHAAR® per Plug&Play kombinierbar. Es ist in den Farben Aluminium (ALA) und Schwarz (BA) eloxiert erhältlich.
 The **base profile G1** can be combined with all NP mounting profiles from FLASHAAR® by Plug & Play. It is available in the colours aluminium (ALA) and black (BA) anodised.



* Leuchtenhöhe abhängig vom Montageprofil (21-168 mm), Maße ab S. 8
 luminaire height depending on mounting profile (21-168 mm),
 dimensions from p.8

Farbtemperatur und Lumenstrom colour temperature and luminous flux

	WW 2200 K	WW 2700 K	WW 3000 K	NW 4000 K	Red	Green	Blue
Farbtemperatur colour temperature	WW 2200 K	WW 2700 K	WW 3000 K	NW 4000 K	Red	Green	Blue
CRI typ.	85	93	93	84			
Lumenstrom* 220 mA (Standard) luminous flux* 220 mA (standard)	1688 lm/m	1856 lm/m	2730 lm/m	2864 lm/m	1300 lm/m	2300 lm/m	500 lm/m
Lumenstrom* 350 mA luminous flux* 220 mA	2492 lm/m	2740 lm/m	3616 lm/m	4228 lm/m	2012 lm/m	3632 lm/m	751 lm/m
	822	927	930	840	XXR	XXG	XXB

⚠ **Achten Sie bitte** beim Betrieb der Focus-4 1CH im NP-S1, NP-S2 **auf ausreichend Kühlung!** Im Standard 220 mA auch im NP-S1 und NP-S2 verwendbar.
 While operating the Focus-4 1CH in the NP-S1, NP-S2, ensure there is sufficient cooling! In standard 220 mA also usable in NP-S1 and NP-S2.

* Alle Angaben zum Lumenstrom beziehen sich auf das Leuchtmittel. In Kombination mit Cover/Linsen kommt es zu materialbedingtem Lichtverlust.
 All information about the luminous flux refers to the light source. In combination with covers/lenses it comes to material-related light loss.



Übersicht Standardlängen & Wattagen

overview standard lengths & wattages

IP40, IP65, IP65 Premium			
product-nr.	L (mm)*	Watt (220 mA)	Watt (350 mA)
NP/F1C/G1/26D/F1C/G1/0258/###/...	0258	6,20	10,60
NP/F1C/G1/26D/F1C/G1/0508/###/...	0508	12,40	21,20
NP/F1C/G1/26D/F1C/G1/0758/###/...	0758	18,60	31,80
NP/F1C/G1/26D/F1C/G1/1008/###/...	1008	24,80	42,40
NP/F1C/G1/26D/F1C/G1/1258/###/...	▲ 1258	31,00	53,00
NP/F1C/G1/26D/F1C/G1/1508/###/...	▲ 1508	37,20	63,60
NP/F1C/G1/26D/F1C/G1/1758/###/...	▲ 1758	43,40	74,20
NP/F1C/G1/26D/F1C/G1/2008/###/...	▲ 2008	49,60	84,80

* Länge der Leuchteneinsätze im Innenbereich von 258 mm (10,6W) bis max. 2008 mm (84,8W). Im Außenbereich (IP65) Länge von 258 mm (10,6W) bis max. 1008 mm (42,4W). LED-Teilungsraster ist 250 mm. Bei einer Länge von 1258 mm bis 2008 mm sind Piercings in beiden Stirnseiten erforderlich.
 Light inserts for indoor use from 258 mm (10,6W) up to a maximum length of 2008 mm (84,8W). Outdoor (IP65) length from 256 mm (10,6W) to max. 1008 mm (42,4W). The grid uses 250mm increments. With a length of 1258 to 2008 mm piercings are needed on both ends.

▲ Piercing beidseitig / double-side piercing

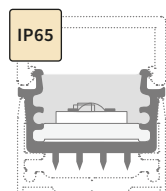
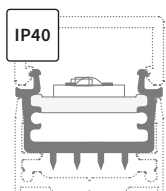
= PU transparent, soft

IP Schutzklassen

IP protection classes

Je nach Anwendung, gibt es verschiedene Schutzklassen für unsere LED Leuchteneinsätze. Als Standard bieten wir die Leuchten in **IP40** an. Für die Schutzklasse **IP65** vergießen wir unsere Leuchten mit einem hochwertigen transparenten Polyurethan-Verguss (PU-Verguss) frei von störenden Mikroblasen.

Depending on the application, there are different protection classes for our LED light inserts. As standard, we offer the luminaires in **IP40**. For protection class **IP65**, we cast our luminaires with a high-quality transparent polyurethane encapsulation (PU encapsulation) free of disruptive micro-bubbles.



Vergussarten

potting types

Unser hochwertiger LED-Verguss mit Polyurethan ist in unterschiedlichen Vergussfarben und Härtegrade, von soft, medium bis hin zu glashart lieferbar.

Our high-quality LED encapsulation with polyurethane is available in different encapsulation colours and degrees of hardness, from soft and medium to glass-hard.



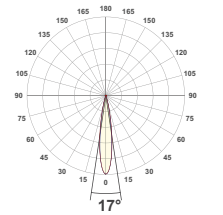


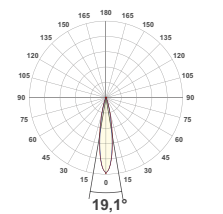


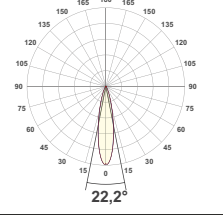


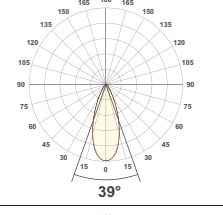


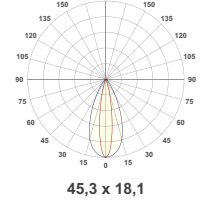
Standard PU-Verguss: PUTS = transparent (T), soft (S)

Vergussarten/potting types: soft (S), medium (M), glass-hard (H),
 Vergussfarben/ potting colours: transparent (T), white (W), black (B)

PUTS = PU transparent, soft,
 PUTM = PU transparent, medium,
 PUTH = PU transparent, glass-hard
 PUWS = PU white, soft
 PUWM = PU white, medium
 PUWH = PU white, glass-hard
 PUBT = PU black, soft
 PUBM = PU black, medium
 PUBH = PU black, glass-hard

Lichtverteilungskurven NP/F1C/G1/26D
light distribution curves NP/F1C/G1/26D

(Standard) **220 mA**

Lichtfarbe/-strom luminous colour/flux	Linsen lenses	Lichtverteilungskurve light distribution curve	
WW 3000 K 2108 lm/m CRI 93,3	<div style="display: flex; align-items: center;"> <div style="background-color: #008080; color: white; padding: 2px 5px; margin-right: 5px;">930</div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSNT ±8°</div> </div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSNT/10770</div> </div> </div> <p style="font-size: 8px; margin-top: 5px;">precision lens symmetric narrow transparent 16°</p>	 <p style="text-align: center; font-size: 8px;">17°</p>	<p>Der Leuchteneinsatz NP Focus-4 1CH ist alternativ auch mit schwarzem oder transparentem PU-Verguss in der Schutzart IP65 lieferbar. The light insert NP Focus-4 1CH is also available with black or transparent PU-encapsulation, IP65 protection.</p>
WW 3000 K 2352 lm/m CRI 92,9	<div style="display: flex; align-items: center;"> <div style="background-color: #008080; color: white; padding: 2px 5px; margin-right: 5px;">930</div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSNF ±9°</div> </div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSNF/10771</div> </div> </div> <p style="font-size: 8px; margin-top: 5px;">precision lens symmetric narrow frosted 18°</p>	 <p style="text-align: center; font-size: 8px;">19,1°</p>	
WW 3000 K 2092 lm/m CRI 93,3	<div style="display: flex; align-items: center;"> <div style="background-color: #008080; color: white; padding: 2px 5px; margin-right: 5px;">930</div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSMF ±11°</div> </div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSMF/10772</div> </div> </div> <p style="font-size: 8px; margin-top: 5px;">precision lens symmetric medium frosted 22°</p>	 <p style="text-align: center; font-size: 8px;">22,2°</p>	<p>Alle Werte in der Tabelle gemessen bei 3000 K mit Cover square transparent. Messwerte unterliegen den typischen Toleranzen. Andere Konfigurationen erhalten Sie auf Anfrage. All values in the table measured at 3000 K with cover square transparent. Measured values are subject to the typical tolerances. Other configurations are available on request.</p> <p>Alle lichttechnischen Daten – vermessen im FLAS-HAAR® Lichtlabor – finden Sie unter flashaar.de im Download-Bereich. Alle optischen und elektrischen Daten haben eine Toleranz von +/- 10%. All photometric data – measured in FLASHAAR's light laboratory – available at flashaar.de/en in the download area. All optical and electrical data have a tolerance of +/- 10%.</p> <p>Messdaten für IP65 auf Anfrage. Measurement data for IP65 on request.</p>
WW 3000 K 1912 lm/m CRI 93,5	<div style="display: flex; align-items: center;"> <div style="background-color: #008080; color: white; padding: 2px 5px; margin-right: 5px;">930</div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSLF ±18°</div> </div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSLF/10773</div> </div> </div> <p style="font-size: 8px; margin-top: 5px;">precision lens symmetric large frosted 40°</p>	 <p style="text-align: center; font-size: 8px;">39°</p>	
WW 3000 K 2140 lm/m CRI 93,3	<div style="display: flex; align-items: center;"> <div style="background-color: #008080; color: white; padding: 2px 5px; margin-right: 5px;">930</div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSOT ±18° x ±9°</div> </div> <div style="display: flex; flex-direction: column; align-items: center;">  <div style="font-size: 8px; margin-top: 5px;">LSOT/10774</div> </div> </div> <p style="font-size: 8px; margin-top: 5px;">precision lens symmetric oval transparent 42° x 18°</p>	 <p style="text-align: center; font-size: 8px;">45,3 x 18,1</p>	

— 0/180°
— 90/270°

EPREL-Daten:





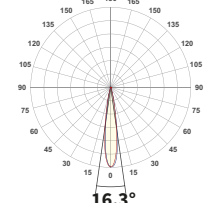


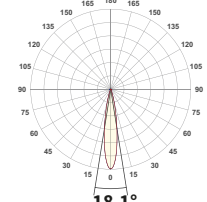


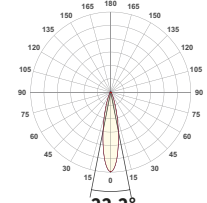


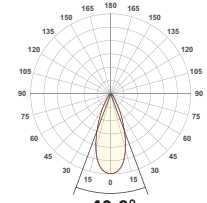


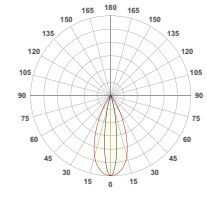
2700 K



3000 K



4000 K

Lichtfarbe/-strom luminous colour/flux	Linsen lenses	Lichtverteilungskurve light distribution curve	
WW 2700 K 3024 lm/m CRI 92,9	  precision lens symmetric narrow transparent 16°	 16,3°	Der Leuchteneinsatz NP Focus-4 1CH ist alternativ auch mit schwarzem oder transparentem PU-Verguss in der Schutzart IP65 lieferbar. The light insert NP Focus-4 1CH is also available with black or transparent PU-encapsulation, IP65 protection.
WW 2700 K 2960 lm/m CRI 92,7	  precision lens symmetric narrow frosted 18°	 18,1°	
WW 2700 K 2864 lm/m CRI 93,1	  precision lens symmetric medium frosted 22°	 22,2°	
WW 2700 K 2652 lm/m CRI 93,4	  precision lens symmetric large frosted 40°	 40,8°	
WW 2700 K 2844 lm/m CRI 93,2	  precision lens symmetric oval transparent 42° x 18°	 45,6° x 19,6°	

— 0/180°
— 90/270°

EPREL-Daten:



2700 K



3000 K



4000 K

Messdaten für IP65 auf Anfrage.
Measurement data for IP65 on request.

Linsen lenses



precision lens
symmetric
narrow transparent
16°



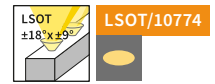
precision lens
symmetric
narrow frosted
18°



precision lens
symmetric
medium frosted
22°

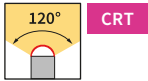


precision lens
symmetric
large frosted
40°

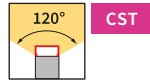


precision lens
symmetric
oval transparent
42° x 18°

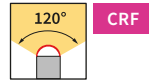
Cover/Farbe cover/colour



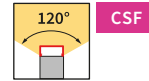
cover round
transparent



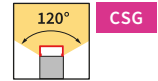
cover square
transparent



cover round
frosted



cover square
frosted



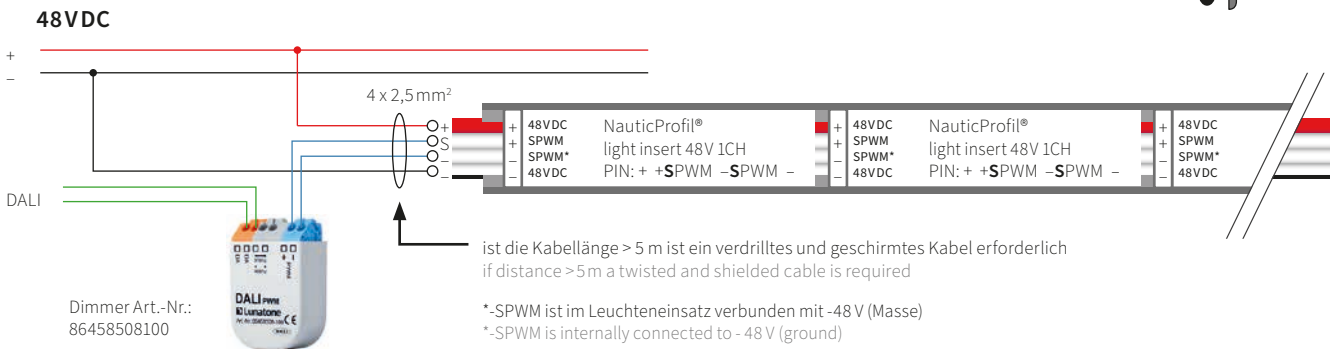
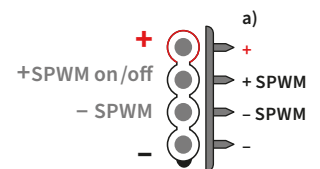
cover square
grey

Verdrahtungsschemata wiring diagrams

Beispiel für max. Länge mit einer elektrischen Einspeisung*
example for max. length with one electrical feed*

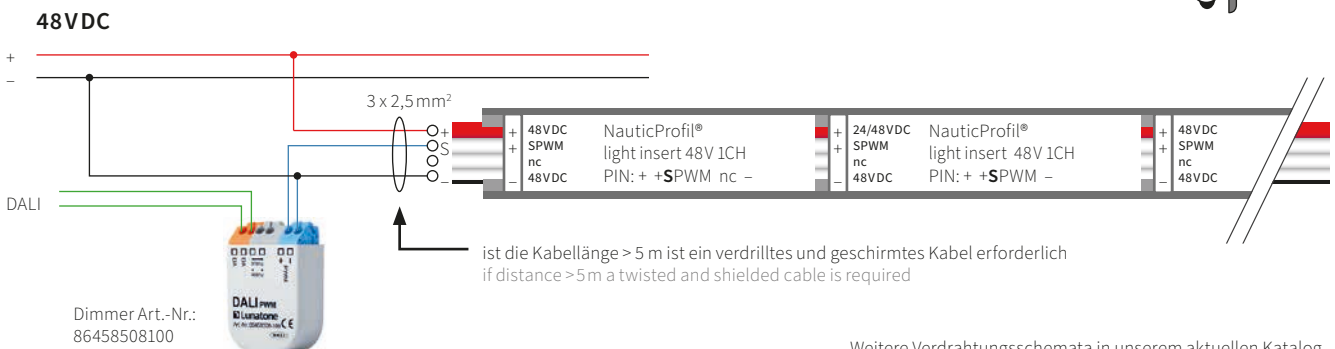
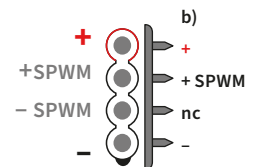
D/SPWM/1a (1x1CH)

Dimmbar über SPWM, System mit 1 Kanal, 48VDC /
1CH Leuchteneinsatz / Dimmart: Steuerungs-PWM (SPWM)
dimmmable via SPWM, 48VDC single channel system /
1CH light insert (monochrome) / dimming: Signal-PWM
+SPWM short to: -SPWM / -48 V / GND=ON; +SPWM open or short to +48V=OFF



D/SPWM/1b (1x1CH)

Dimmbar über SPWM, System mit 1 Kanal, 48VDC /
1CH Leuchteneinsatz / Dimmart: Steuerungs-PWM (SPWM)
dimmmable via SPWM, 48VDC single channel system /
1CH light insert (monochrome) / dimming: Signal-PWM
+SPWM short to: -SPWM / -48 V / GND=ON; +SPWM open or short to +48V=OFF



Weitere Verdrahtungsschemata in unserem aktuellen Katalog
further cabling scheme in our current catalogue

Übersicht Abmessungen und Einbaumaße mit dem Basisprofil G1

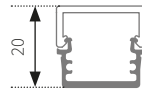
overview dimensions and installation dimensions with base profile G1

covers and lenses ▶

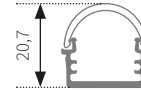


NP mounting profiles ▼

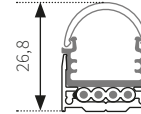
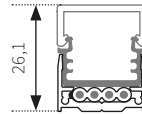
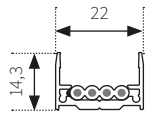
cover CS



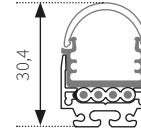
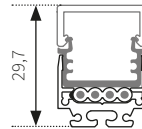
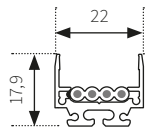
cover CR



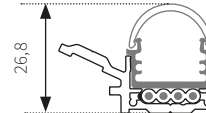
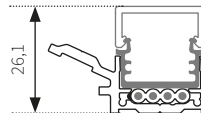
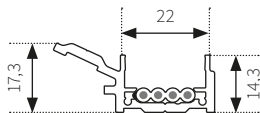
NP-S1



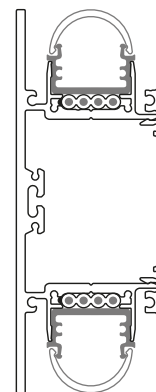
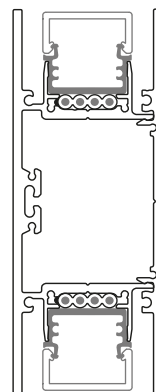
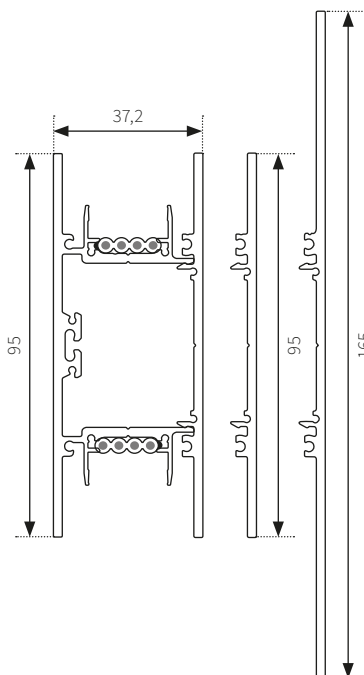
NP-S2



NP-S3



NP-H1/H2



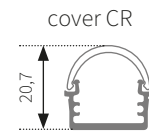
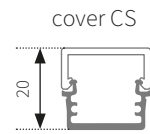
Übersicht Abmessungen und Einbaumaße mit dem Basisprofil G1

overview dimensions and installation dimensions with base profile G1

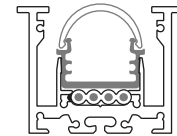
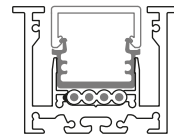
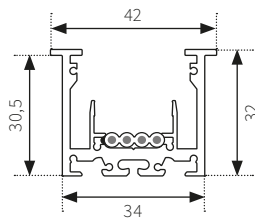
covers and lenses ▶



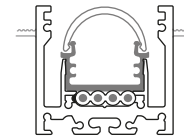
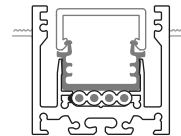
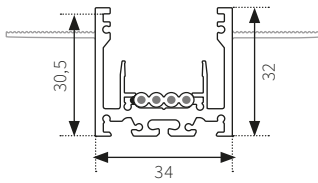
NP mounting profiles ▼



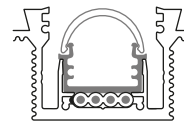
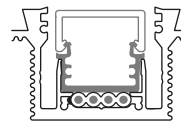
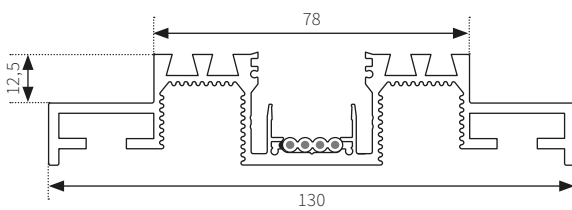
NP-R1



NP-R2/R4



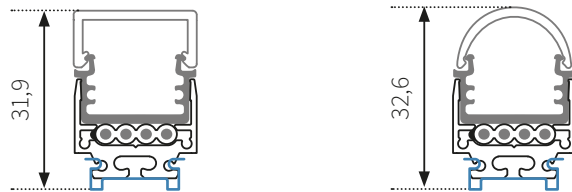
NP-R3



Übersicht Abmessungen und Einbaumaße NP-S2 mit Montageclips mit dem Basisprofil G1
 overview dimensions and installation dimensions NP-S2 with mounting clips with base profile G1

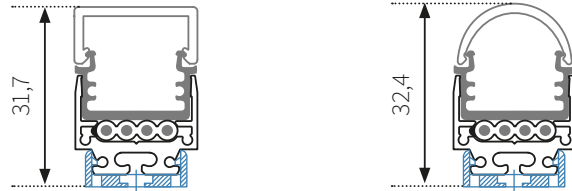
FL/SCLIP-0/0

Federclip 0°
 spring clip 0°



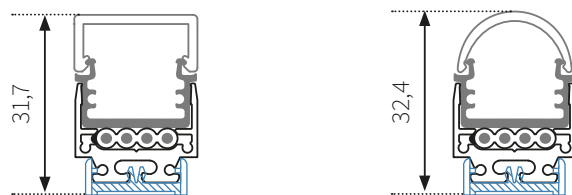
FL/CLIP-0/0

Montageclip 0°, ohne Zapfen gegen Gleiten
 mounting clip 0°, without stud to prevent sliding



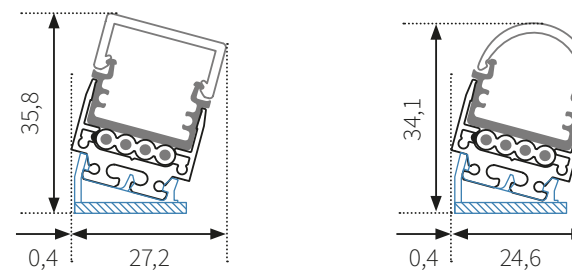
FL/CLIP-1/0

Montageclip 0°, mit Zapfen gegen Gleiten
 mounting clip 0°, with stud to prevent sliding



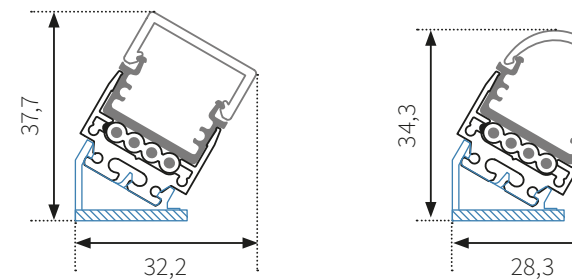
FL/CLIP-1/15

Montageclip 15°, mit Zapfen gegen Gleiten
 mounting clip 15°, with stud to prevent sliding



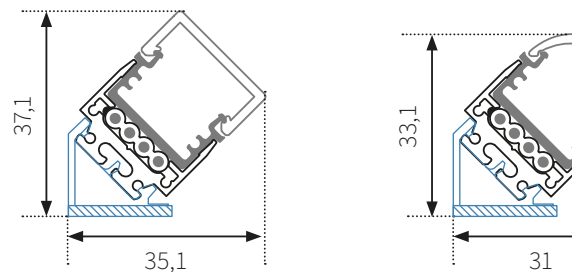
FL/CLIP-1/30

Montageclip 30°, mit Zapfen gegen Gleiten
 mounting clip 30°, with stud to prevent sliding



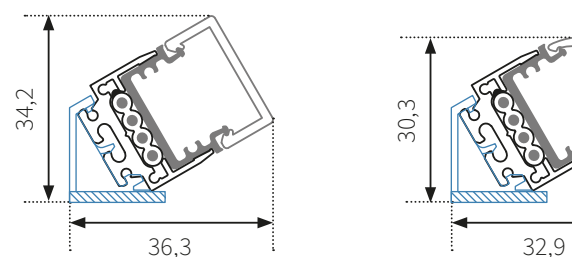
FL/CLIP-1/45

Montageclip 45°, mit Zapfen gegen Gleiten
 mounting clip 45°, with stud to prevent sliding



FL/CLIP-1/60

Montageclip 60°, mit Zapfen gegen Gleiten
 mounting clip 60°, with stud to prevent sliding





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- Vollständige Artikelnummer (inklusive den zu ergänzenden Angaben z. B. Lichtfarbe, Cover- oder Linsentyp usw.)
- gewünschte Lieferzeit
- Lieferadresse

Bestelladresse

FLASHAAR LEDLight GmbH & Co. KG
Gaustraße 13 –15
55411 Bingen am Rhein
Deutschland
FON +49 6721 9195-0
FAX +49 6721 9195-91
bestellung@ledlight.flashaar.com
<https://flashaar.de>

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Wir berechnen Ihnen ausschließlich die tatsächlich angefallenen Versandkosten. Je nach Auftragswert und Quantität fallen zusätzliche Verpackungskosten an.

delivery information

information required on your order

- product name
- complete item number (including specification codes e.g. light colour, cover or lens type etc.)
- required delivery period
- delivery address

ordering address

FLASHAAR LEDLight GmbH & Co. KG
Gaustraße 13 –15
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Germany
FON +49 6721 9195-0
FAX +49 6721 9195-91
order@ledlight.flashaar.com
<https://flashaar.de>

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Ausgabe

Stand: KW 12, 2024

Druckfehler, Irrtum und technische Änderungen sind vorbehalten.

edition

last status: week 12, 2024

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