

BION

TECHNOLOGIES







Dear Reader,

What drive us to constantly develop new ideas and concepts?

It is the desire to create an attractive, appealing and yet individual surrounding space. In this scenario, we are consciously expanding the term “space” – which usually describes the interior – to include the exterior space, i.e. the urban environment. Comfort factor, promotion of creativity, improvement of living quality and the feeling of safety are feelings or impulses that are strongly linked with the experience of the surrounding spaces outside. The BION TECHNOLOGIES systems are to help create these positive spaces both indoors and outdoors.

Our team works towards this goal every day and enjoys the fact that each successful projects contributes to another positive momentum.

We would like to thank our customers and partners who have placed their trust in use over the past few years and we look forward to the future collaboration.

Your BION TECHNOLOGIES team

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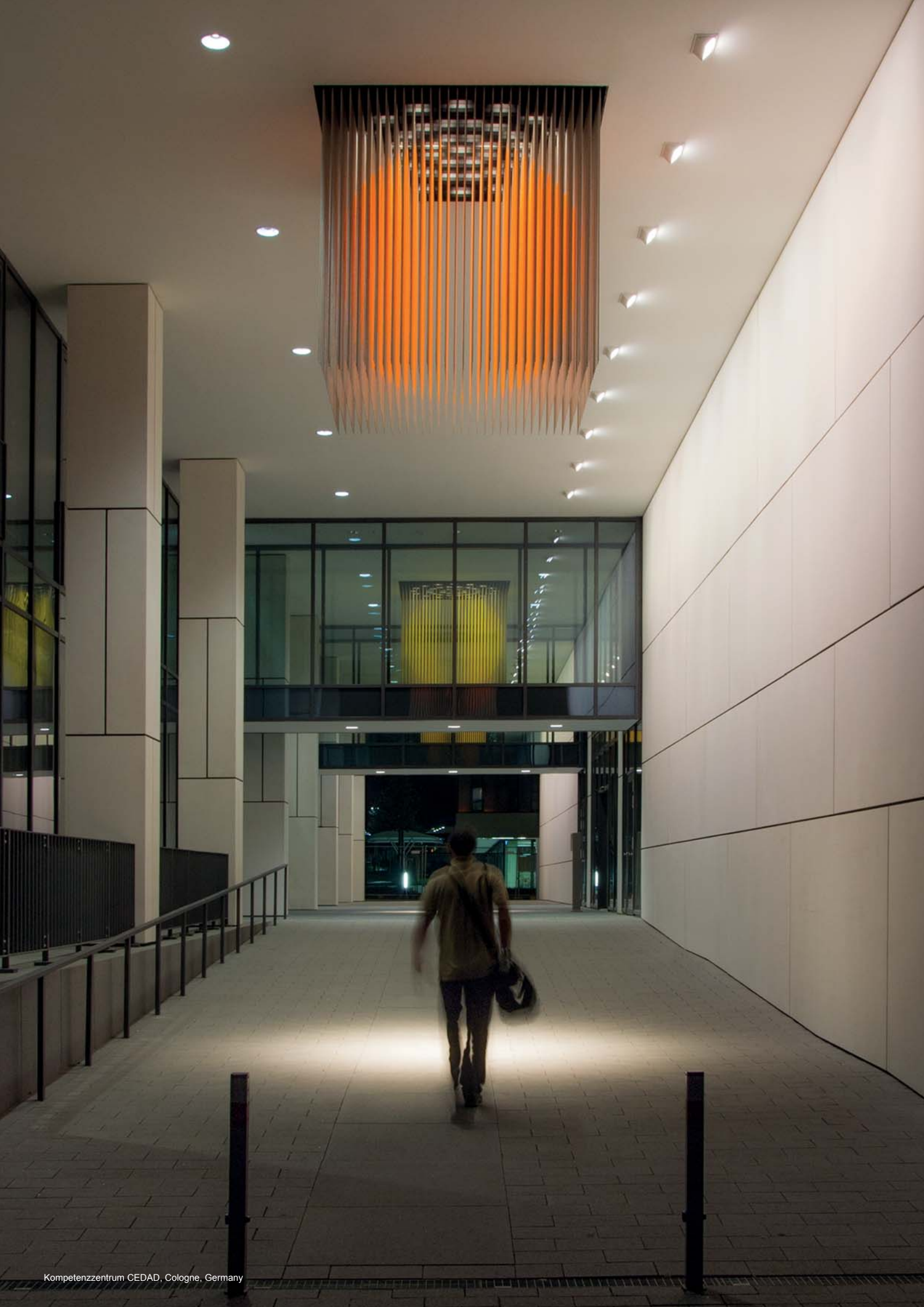
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Exterior



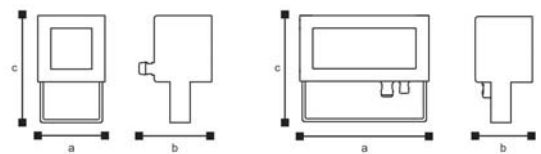
tellus spot



The powerful surface-mounted fixture for the urban area.

The surface-mounted fixture tellus spot xs and its next larger equivalents, the tellus spot s and tellus spot m stand out as a result of their minimalist, straightforward design and are consistent with the existing tellus surface linear fixture range. Due to its construction, the fixture can be used in the urban area in close proximity to people in order to highlight details such as pillars or works of art.

The different glare protection variants enable the free and flexible positioning of the fixture without actually having an impact on the observer close by. It can be used almost everywhere thanks to its numerous beam angles ranging from narrow spot to wide flood, which makes it the perfect, must-have tool for each architect, lighting designer or town planner. No external ballasts or power supply units are required because the power supply technology is integrated into the fixture, which simplifies the positioning and installation of the tellus spot xs and s. Its smooth aluminium housing with seamlessly installed glass is extremely robust and easy to clean.

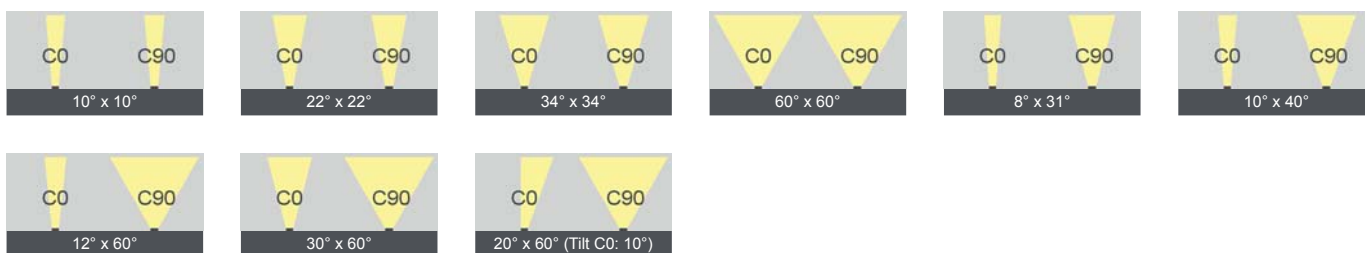


Metric:
117 mm, 227 mm, 275 mm (a)
100 mm (b)
185 mm (c)

Imperial:
4.61 in, 8.94 in, 10.83 in (a)
3.94 in (b)
7.29 in (c)



Beam angles



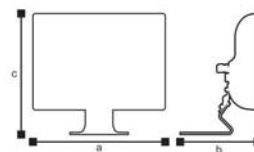


coma I hps

High-performance LED floodlights for architectonic stagings!

coma I hps is a compact LED flood lamp with a perfect, slim design. The excellent ratio of light output and housing cubage as well as the selected possibilities of light distribution ranging from extra-wide flood to asymmetric flood, through to narrow spot, ensure that the fixtures in the architectural lighting close to the facades are more than simply convincing. The asymmetric-narrow spot optic that is available is definitely worth mentioning as it creates aesthetic grazing lights on surfaces or appealing enclosures in arches.

The robust, powder-coated aluminium die-cast housing achieves the best results in the thermal management of the LEDs and provides perfect protection against environmental influences. The flush-mounted glass pane and the seamless design will prevent the accumulation of dirt on the fixture and even reduce environmental contaminations of the fixture to a minimum.



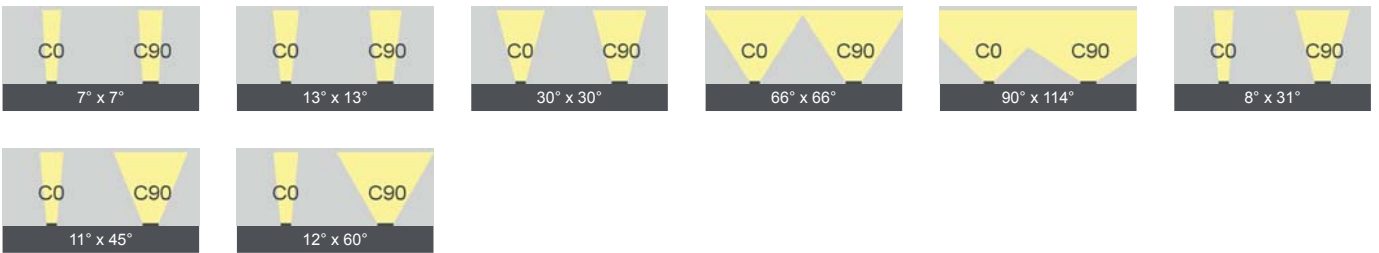
Metric:
(a x b x c)
250 x 157 x 228 mm

Imperial:
(a x b x c)
9.85 x 6.19 x 8.98 in



AKWA IBOM Stadium, Uyo, Nigeria | Copyright: Julius Berger Nigeria Plc

Beam angles





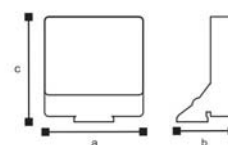
firmus

Cubic design for the urban area

The firmus fixture range is presented with a reserved, straightforward design. This fixture series is perfect for the urban area such as public spaces and the surrounding architecture, which are perfectly staged without being in competition with the illuminated architecture. Depending on the circumstances and necessity, the appropriate firmus performance level can be selected from three performance classes: m, l and xl. The aforementioned scalability where maximum luminous flux and the different application-oriented light distributions curves available transform the firmus fixture range into an indispensable tool for architects, lighting designers or town planners.

The highest quality materials and components that are suitable for the exterior space are used for firmus fixtures. Furthermore, the lighting system was developed and converted with the objective of integrated maintainability in a future-proof manner.

The cubistic design of the firmus range can be perfectly matched with the circularly shaped fixtures of the discus range.



Metric:

(a x b x c)

250 x 195 x 270 mm

300 x 195 x 320 mm

350 x 195 x 370 mm

Imperial:

(a x b x c)

9.85 x 7.68 x 10.63 in

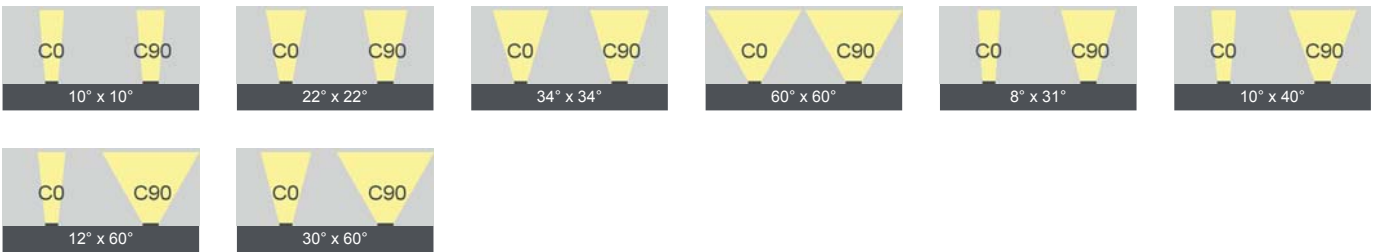
11.82 x 7.68 x 12.60 in

13.78 x 7.68 x 14.57 in



Rhine bridge, Emmerich, Germany | Copyright: Dirk Schuster, Emmerich am Rhein

Beam angles



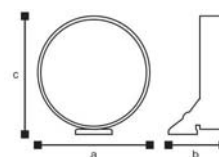


discus

Round architectural spotlights for the highest of demands!

The product name of no other fixture speaks more in favour of the design vocabulary than the discus fixture range. Flat, circulating light fixture meets a straightforward, discreet design. The illuminated object is always at the fore – the perfect staging of architecture is the greatest compliment for the discus fixture range. Just like its design-related equivalent, firmus, the discus fixture is available in three performance classes and also offers a selected portfolio of application-oriented light distributions. The IOT control option – a native integration of WiFi in the fixture – enables direct involvement of the digital light technology LED in digital IT networks and thus, a direct link to the digital world. Hence, it offers all the possibilities of the Internet Of Things.

The fixture with an aluminium housing is entirely maintainable and is therefore, perfectly suitable for long-term use in the urban landscape.

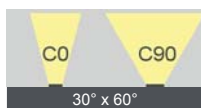
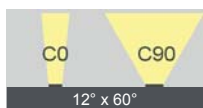
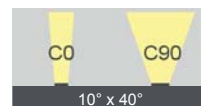
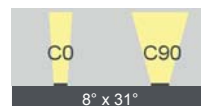
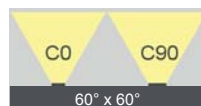
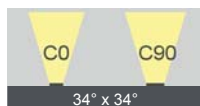
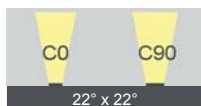
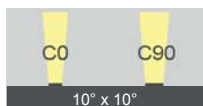


Metric:
(a x b x c)
280 x 210 x 300 mm
330 x 210 x 350 mm
430 x 210 x 450 mm

Imperial:
(a x b x c)
11.03 x 8.27 x 11.82 in
13.00 x 8.27 x 13.78 in
16.93 x 8.27 x 17.72 in



Beam angles





tantulus outdoor



Minimalist outdoor fixture for the facade.

tantulus outdoor is a minimalist fixture for linear architectural applications close to facades, for example the illumination of a tympanum or wall niche. The tantulus outdoor can be used to carve out the striking details of the building and to highlight the architecture at night.

With its width of 22 mm and low installation height of 36 mm, the fixture can be discreetly integrated into a building facade in an almost invisible manner, irrespective of whether it is historical or modern architecture. The electricity supply of the fixtures is also taken into account in the installation height of 36 mm: it is guided through the back underneath the fixture with input and output connectors that are suitable for outdoor area.

The selection process of 2 MacAdams ellipses guarantees the highest possible homogeneity within the fixture as well as from fixture to fixture, which proves itself in the perfect homogeneity of the reflective surfaces – even in the tightest of construction situations.



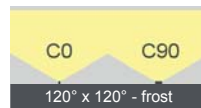
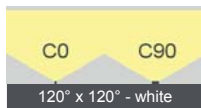
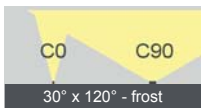
Metric:
105 mm, 207 mm, 310 mm, 615 mm,
920 mm, 1225 mm, 1530 mm, 1835 mm (a)
22 mm (b)
36 mm (c)

Imperial:
4.14 in, 8.15 in, 12.21 in, 24.22 in,
36.23 in, 48.23 in, 60.24 in, 72.25 in (a)
0.87 in (b)
1.42 in (c)



Kirche St. Moritz, Augsburg

Beam angles





linea m outdoor



A tool for demanding outdoor lighting tasks

Discreet and elegant, easily integrated into facades, reduced cabling, flexible in the LEDs and beam angles, robust, ... – all these are extracts from the requirement specification of our linea m development team and these characteristics are all reflected in the final product. With an effective light output of more than 4200 lm/m in hp, the highest expansion stage, linea m is perfect for the illumination of tall buildings or large-scale constructions in the urban area.

External ballasts or power supply units become unnecessary because the power supply technology is integrated in the fixture. In addition to installation, this simplifies the planning process because no additional space needs to be provided for external equipment. The sophisticated plug and socket system enables the end-to-end connection of the fixtures – without requiring any additional connection cables.

The anodised extruded aluminium sheath is used as the housing for the linea m and the light-emitting surfaces are made of high-quality and highly efficient PMMA.



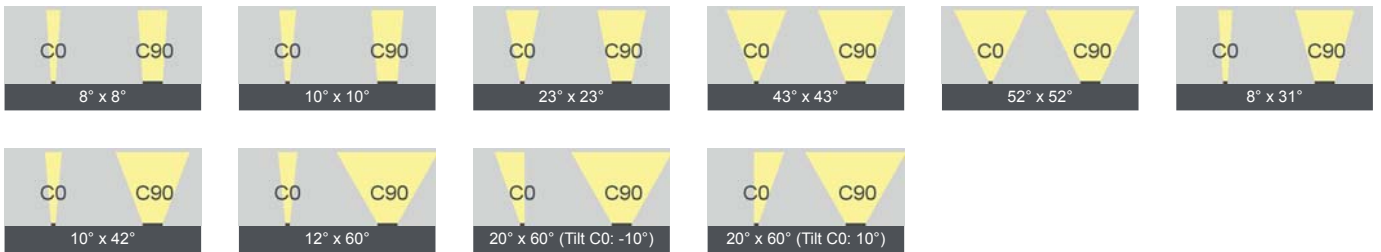
Metric:
311 mm, 617 mm, 922 mm, 1228 mm (a)
66 mm (b)
74 mm (c)

Imperial:
12.25 in, 24.30 in, 36.30 in, 48.35 in (a)
2.60 in (b)
2.92 in (c)



Das Gerber, Stuttgart

Beam angles





tellus surface m hpq

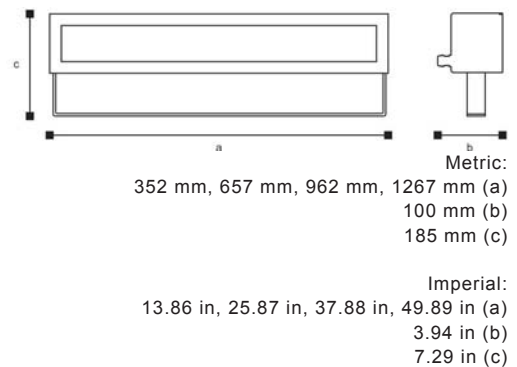


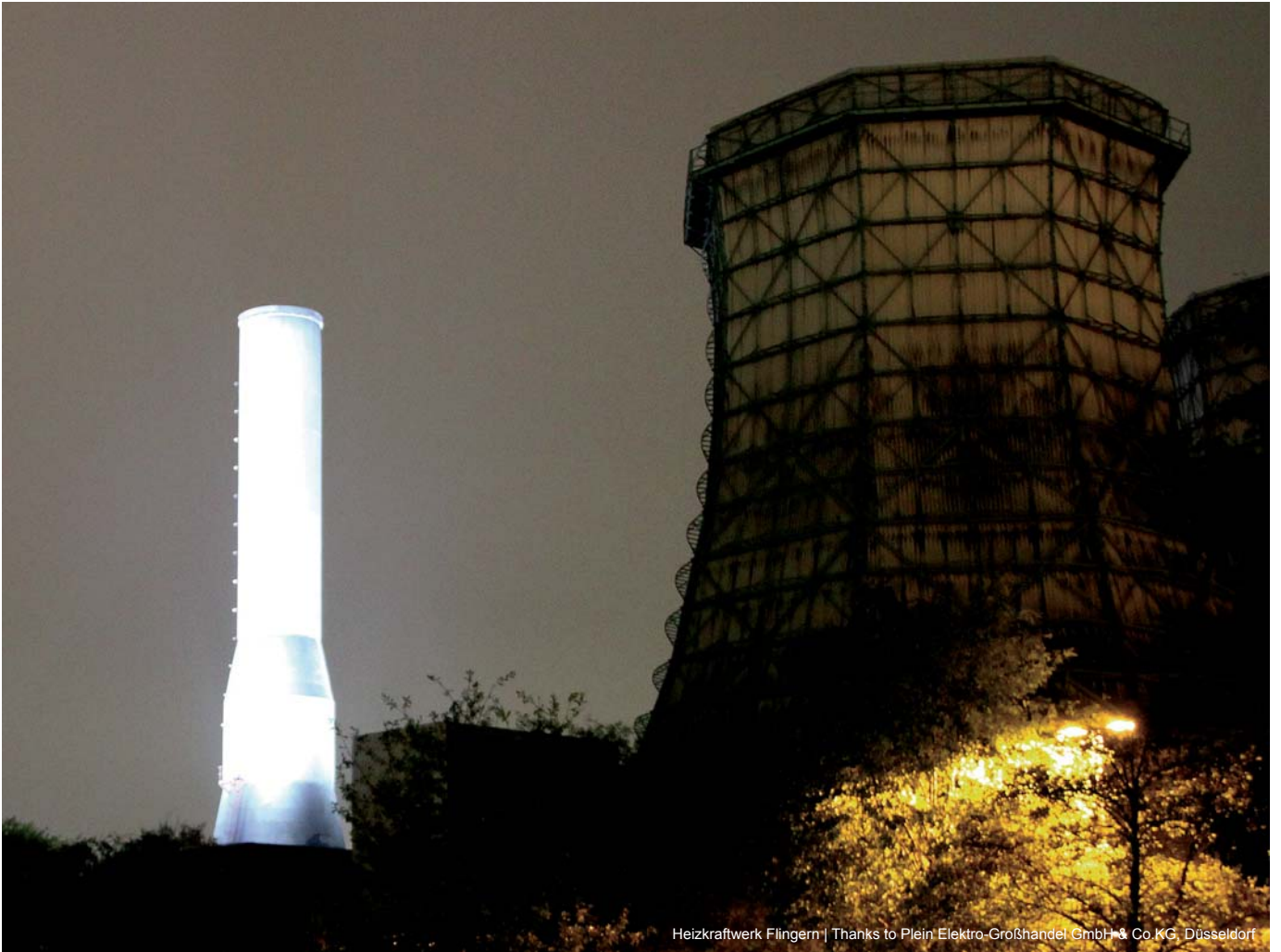
The powerful combination of flood lamps and linear fixtures.

The combination of flood lamps and linear fixtures form the tellus surface, a fixture that will impress you with its straightforward design. In addition to the design, the fixture in its pureWhite version scores well with an effective luminous flux of 6250 lm/m at 3000 K, which predestines the fixture for the lighting of high-rise buildings or towers. This capability – paired with the diverse range of light distributions – makes it possible for the fixture to be used for various different applications in the urban environment.

The hidden hinge joint mounts on the front of the fixture are a wonderful technical solution that give the fixture a very distinct character. The tellus surface also impresses with its high level of visual comfort created by a low-lying LED level and the option of integrating a glare protection louver into the fixture via the appropriate order number.

The housing of the fixture is made of extruded aluminium sheath with a 15 mm “ultra-white” - single-pane safety glass as the light-emitting surface.





Beam angles





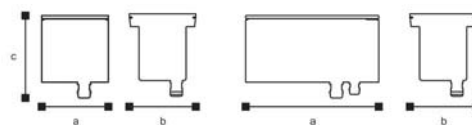
tellus point



Selective recessed floor fixture with high visual comfort

Visual comfort is one of the most important criteria when determining the correct recessed floor fixture, which is to be installed in close proximity to people. The strength of the tellus point recessed floor fixture lies in the fact that it provides for outstanding visual comfort for the observer or passer-by with the linear or honeycomb glare protection louver that can be optionally integrated. In combination with the new asymmetric-wall-wash light distribution curves and the linear glare protection that is now available, architects, lighting designers and town planners are now provided with unexpected possibilities for the staging of architecture.

The use of the 50 mm wide lens allows the observer to accept the distracting effect of the individual LED arrangements with their numerous individual light points and thus, remind the user of an orderly, classic lamp.

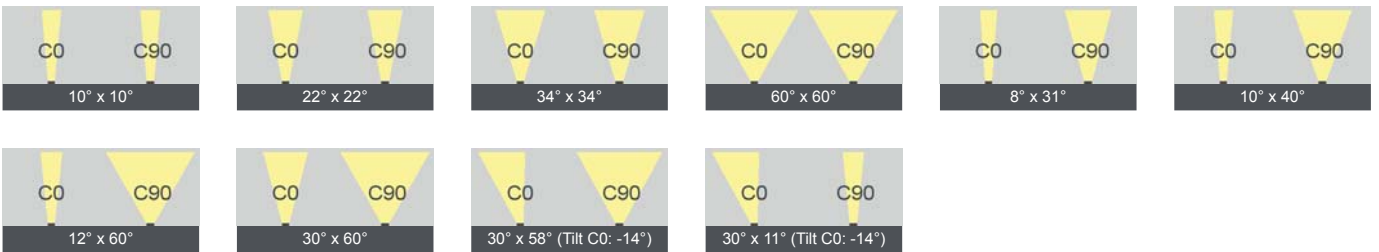


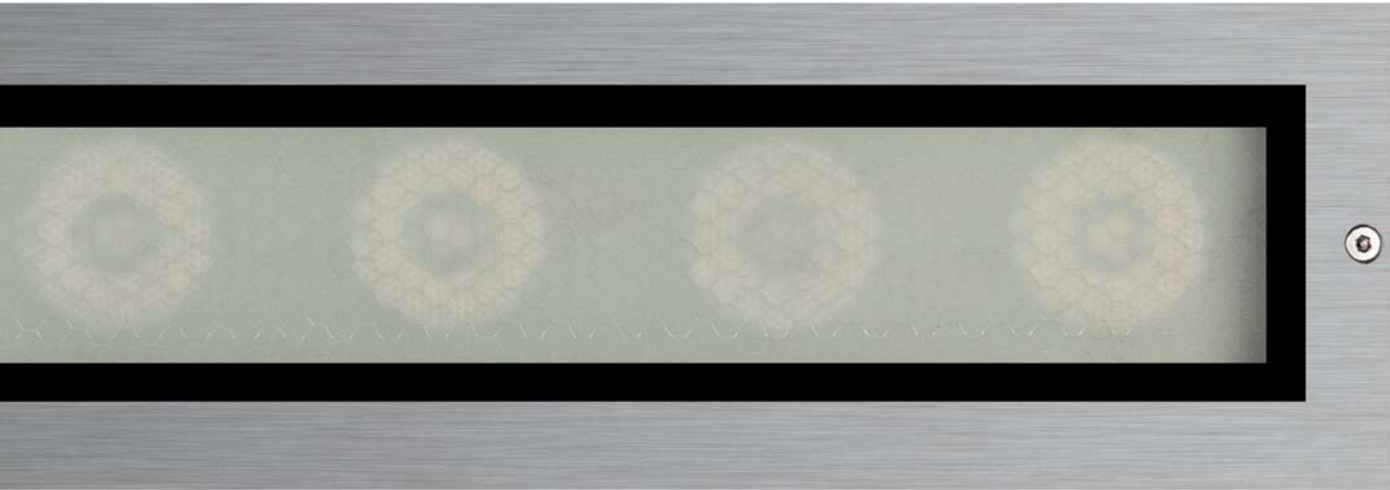
Metric:
 110 mm, 220 mm, 268 mm (a)
 107 mm (b)
 110 mm (c)

Imperial:
 4.34 in, 8.67 in, 10.56 in (a)
 4.22 in (b)
 4.34 in (c)



Beam angles





tellus m



Versatile recessed floor fixture for aesthetic, architectonic light.

How can a product that is already excellent be improved?

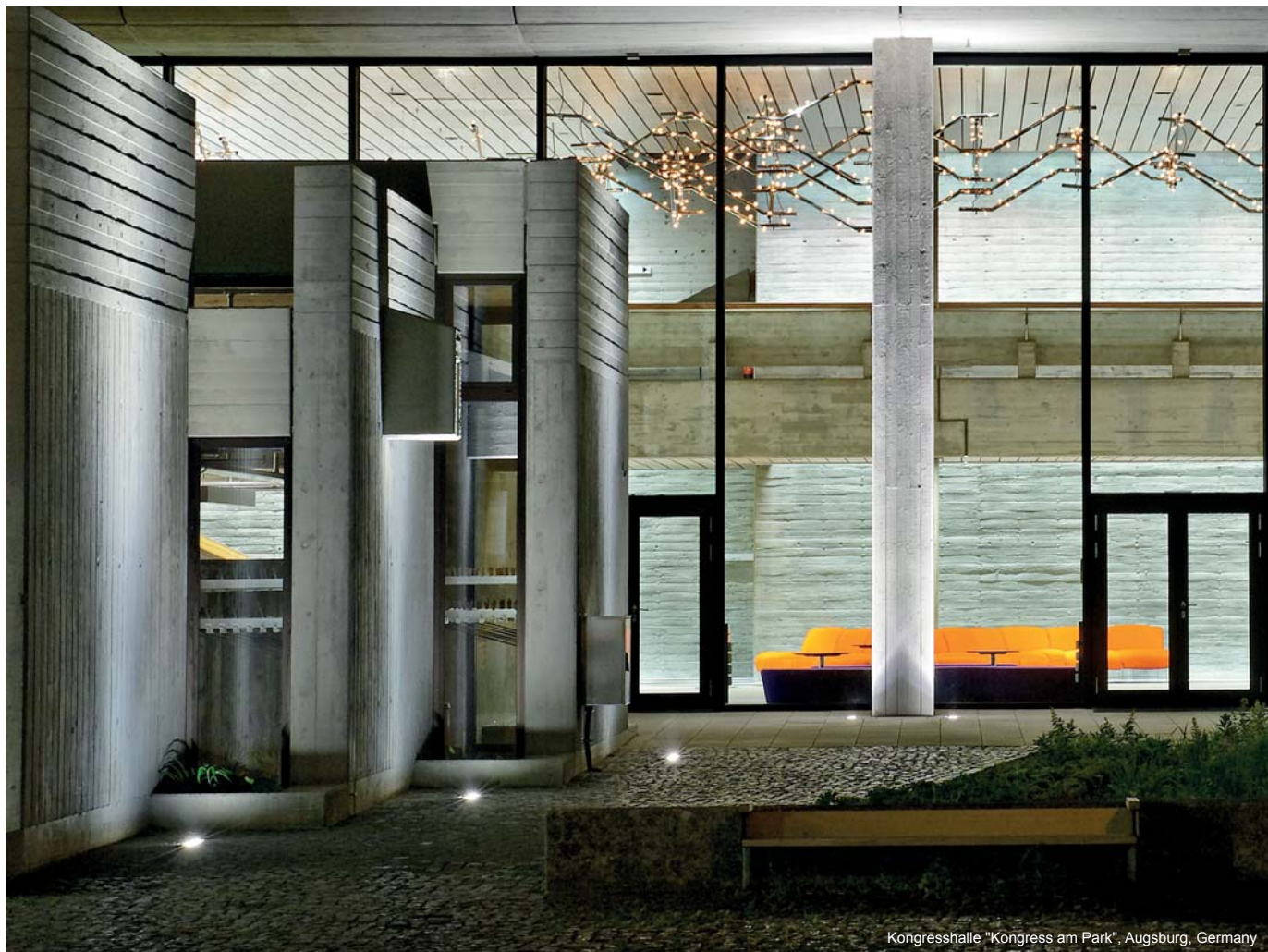
By listening to what architects, planners and user have to say and to be willing to question everything that exists. The result of this process is the latest generation of the tellus m with a design almost completely free of screws in the field of vision and a more delicate appearance overall when installed – without having to sacrifice durability, reliability and light output. Similar to the tellus point spotlight, visual comfort was significantly improved with the newly available linear glare protection.

Furthermore, with the new IOTconnect option to remote control the fixture via the Bion Technologies app BIONcontrol and to highlight the brightness and colour temperature or colour values in the fixture, it is now possible to create lighting moods that are perfectly coordinated to the architecture without requiring data cables for the individual light points.



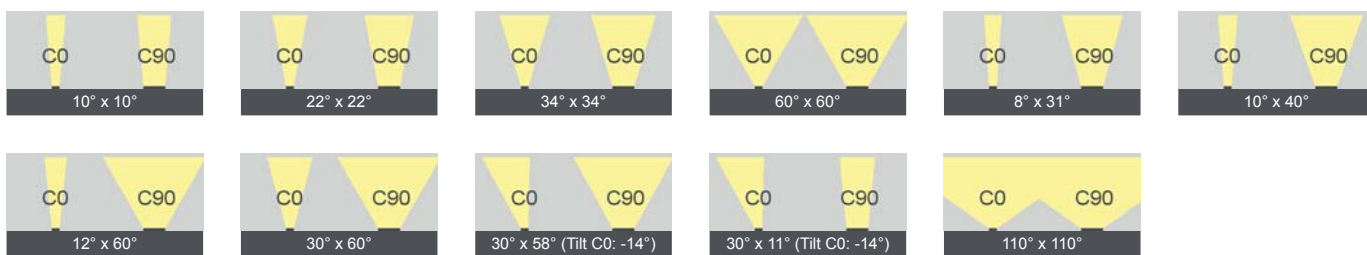
Metric:
 345 mm, 650 mm, 955 mm, 1260 mm (a)
 110 mm (b)
 110 mm (c)

Imperial:
 13.59 in, 25.60 in, 37.60 in, 49.61 in (a)
 4.34 in (b)
 4.34 in (c)



Kongresshalle "Kongress am Park", Augsburg, Germany

Beam angles





Interior



tantulus indoor



tantulus, the cove solution with the highest light quality.

Indirect light across coves creates a balanced, atmospheric light, where architecture merges with the light and is transformed into an impressive, aesthetic unit.

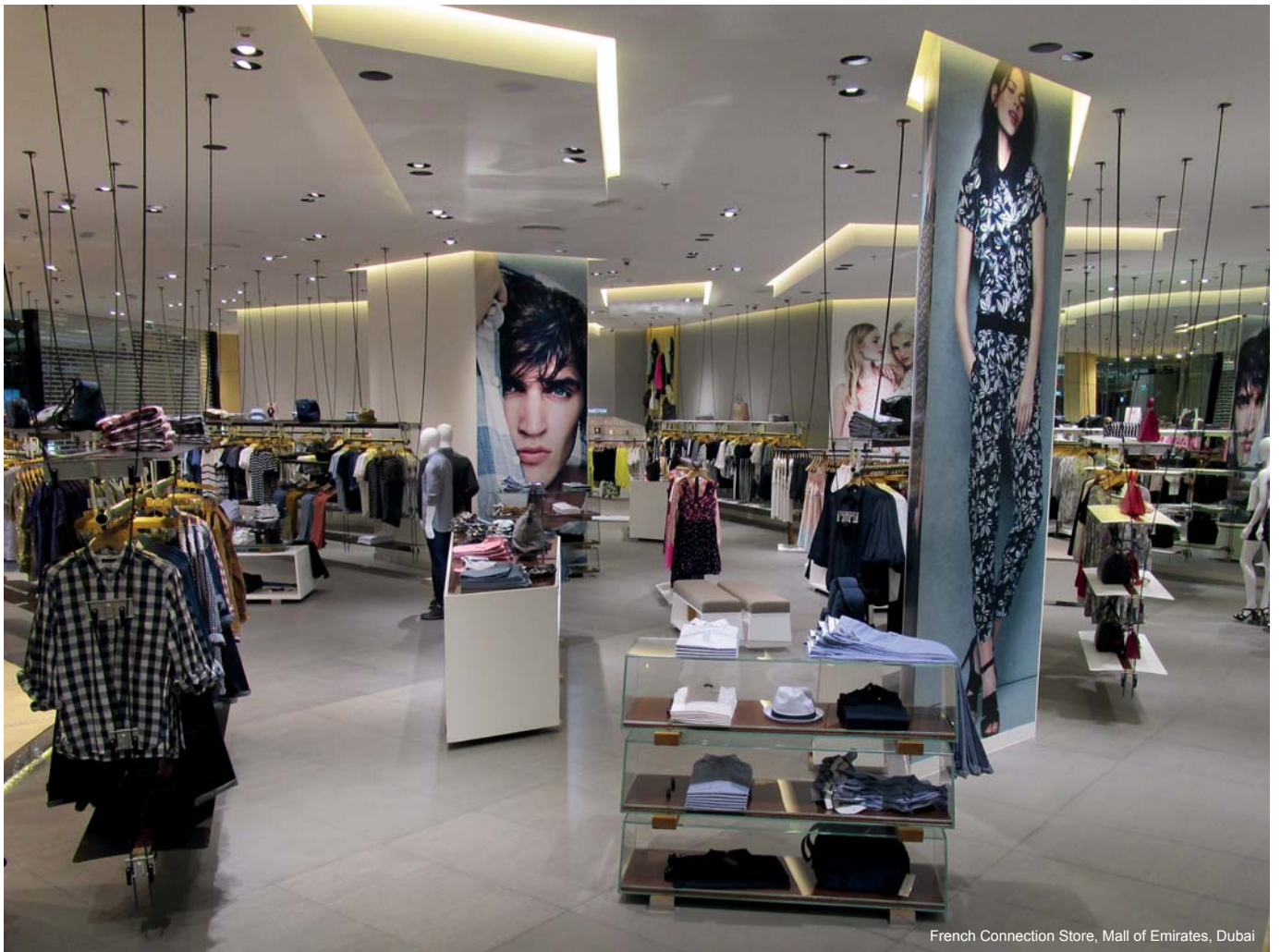
The minimalist, pluggable tantulus light system simplifies the conversion of light coves with three available performance levels and eight fixture lengths starting with 105 mm through to 1835 mm and an integrated end-to-end cabling system. The new, super-slim cabling system makes it possible to connect the fixtures without an unnecessary distance between the fixtures and a cable length of up to 12.2 metres and just one supply unit. Similarly, the tantulus is also flexibly presented in the light distribution curves available, ranging from extra wide flood for cove applications through to asymmetric flood for grazing light applications.

The wide range of selectable colour temperatures, starting from 2000 K to 6500 K for pureWhite is supplemented by the tunableWhite and RGBW versions. The LED selection can be accurately selected in up to 2-Step MacAdams in the Single BIN procedure.



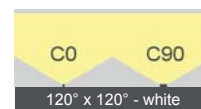
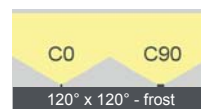
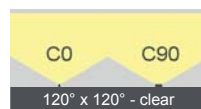
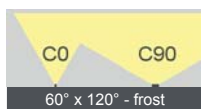
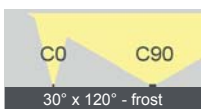
Metric:
 105 mm, 207 mm, 310 mm, 615 mm,
 920 mm, 1225 mm, 1530 mm, 1835 mm (a)
 23 mm (b)
 25 mm (c)

Imperial:
 4.14 in, 8.15 in, 12.21 in, 24.22 in,
 36.23 in, 48.23 in, 60.24 in, 72.25 in (a)
 0.91 in (b)
 0.99 in (c)



French Connection Store, Mall of Emirates, Dubai

Beam angles





linea s

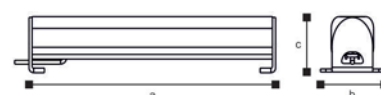


The perfect tool for the staging of walls in confined spaces

The linear LED linea s fixture is the perfect tool for grazing light or impinging light situations as a result of its high light output, different luminous colours, numerous white-dynamic and colour-dynamic control possibilities as well as optics that are perfectly coordinated with surface illumination.

The linea s can be used in the most confined of spaces such as niches or light channels because it has an external mains adapter and compact design. The four different fixture lengths enable a flexible response to various different assembly situations and guarantee homogeneous illumination even in the case of difficult, structural conditions. The linea s enables the ease of assembly through its freely adjustable mounting bracket with an integrated degree scale. Furthermore, the system power supply offers standard clamping points from building installation technology, which helps the installer carry out an easy and safe installation.

The housing of the fixture is made of refined, extruded aluminium sheath with an acrylic cover in the area of the light-emitting surface.



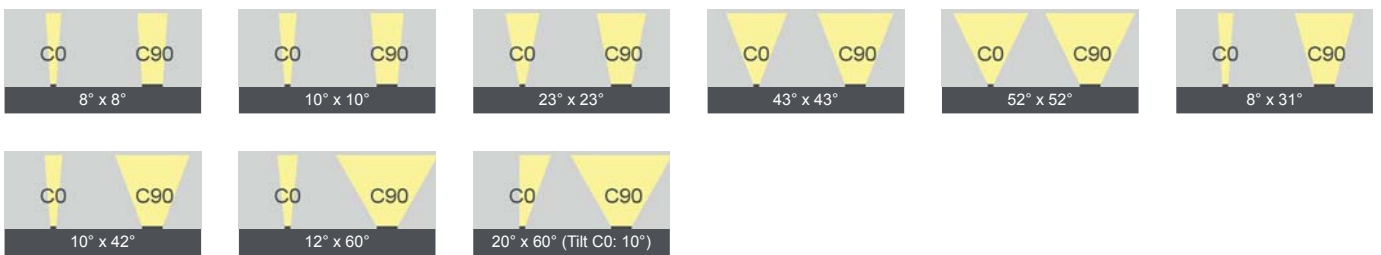
Metric:
319 mm, 624 mm, 929 mm, 1234 mm (a)
83 mm (b)
72 mm (c)

Imperial:
12.56 in, 24.57 in, 36.58 in, 48.59 in (a)
3.27 in (b)
2.84 in (c)



Temple Adath Israel, Merion Station, PA

Beam angles





linea m indoor

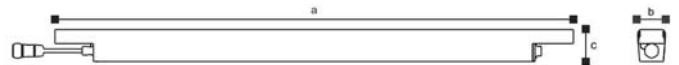


A fixture for demanding indoor lighting tasks

The accuracy of fit for the respective application was the main focus during the development process of the linea m fixture range.

Key characteristics of the linea m fixture range include colour temperature stability, homogeneity and an unsurpassed variety of beam angles combined with an intelligent power management concept. External ballasts or power supply units become unnecessary because the power supply technology is integrated into the fixture. In addition to installation, this simplifies the planning process because no additional space needs to be provided for external equipment. The sophisticated plug and socket system makes it possible to arrange the end-to-end connection of the fixtures without requiring any additional connection cables.

The high-performance version, the linea m hp, offers the best possible lighting characteristics with up to 4200 lm/m and ensures that the fixture is the perfect tool for lighting concepts with large surfaces or great ceiling heights such as entrance halls, museums or stadiums.

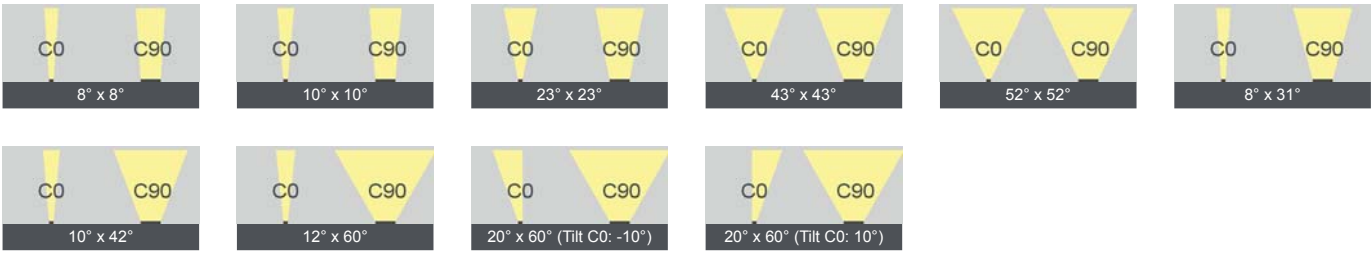


	Metric:
311 mm, 617 mm, 922 mm, 1228 mm (a)	
66 mm (b)	
74 mm (c)	
	Imperial:
12.25 in, 24.30 in, 36.30 in, 48.35 in (a)	
2.60 in (b)	
2.92 in (c)	



Kongresshalle "Kongress am Park", Augsburg

Beam angles





funis round m

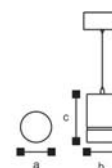


Stringent design meets powerful cylindrical LED pendant fixture.

The funis m round fixture concept stands out as it is visually very attractive and powerful. The striking, linear design was consequently converted using all available lengths and it transforms the funis fixture series into a real design object.

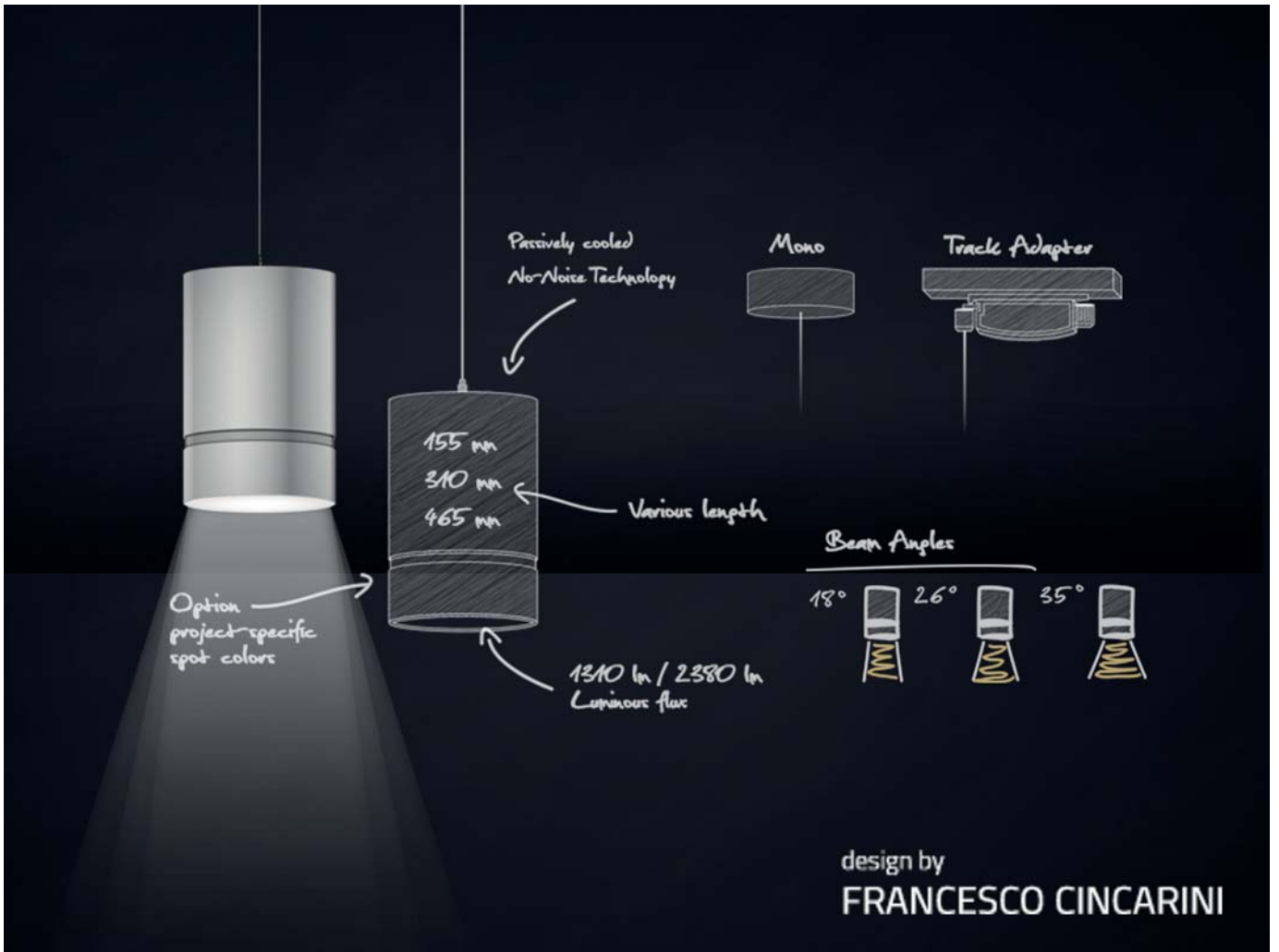
In addition to aesthetic momentum, the fixture is impressive as a result of its flexible design. The body of the fixture and the baldachins can be designed in any colour requested by the customer. The individualisation in terms of colouring gives the designers, e.g. the degree of freedom to adopt the fixtures into lighting concepts compliant with corporate identity and allows them become a part of the CI-representation.

With a colour rendering index greater than 95 and a simple dimming function ensures that this fixture series is perfect for the hospitality sector such as in restaurants, lobbies or reception areas.

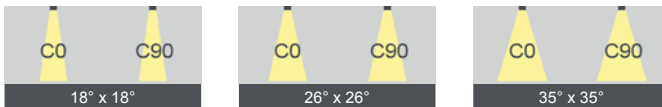


Metric:
100 mm (a)
100 mm (b)
155 mm, 310 mm, 465 mm (c)

Imperial:
3.94 in (a)
3.94 in (b)
6.11 in, 12.21 in, 18.31 in (c)



Beam angles





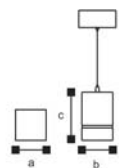
funis square m

Puristic design meets cubic LED pendant fixture.

The funis square m was expanded by an entire range of fixtures based on an individual fixture. Starting with a fixture height of 155 mm, the available lengths were expanded by two variants in 310 mm and 465 mm. In addition to the cubic design vocabulary, the funis fixture range includes the distinct cylindrical fixture known as funis round. Where stringency is concerned, this is no less exciting than the cubic equivalent and it is also perfect as a contrasting element in playful interaction with the shapes.

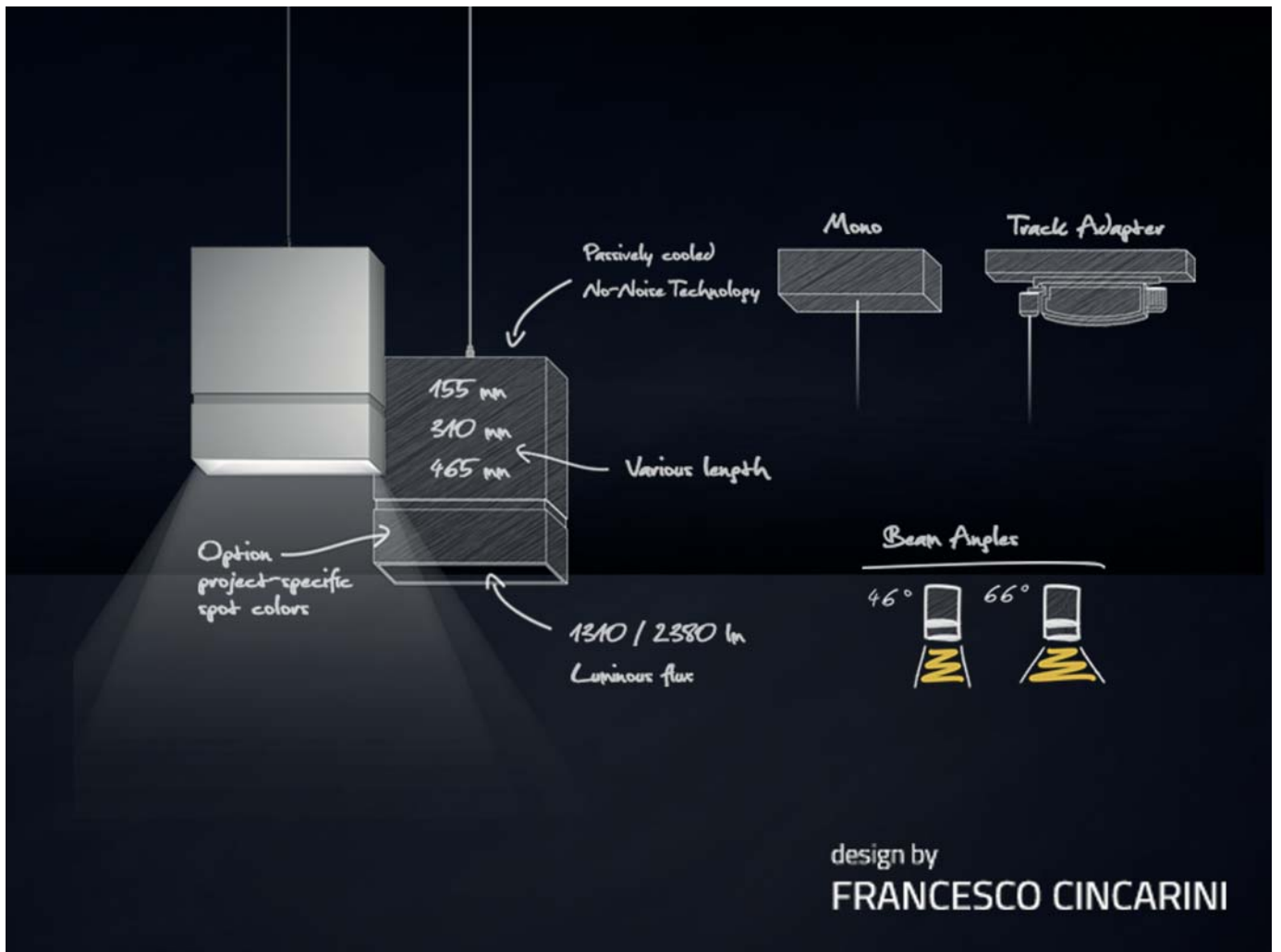
Where light output is concerned, you can choose from two performance classes, the 2500 lm high-performance version for rooms with high ceilings such as churches and entrance halls there as well as the 800 lm version, which is ideally suited for zoned lighting concepts in restaurants, bars or lounges.

Puristic design does not automatically indicate a lack of flexibility. The surface can be delivered with a high-gloss to matt finish in any conceivable colour that you may desire.

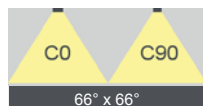
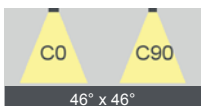


Metric:
130 mm (a)
155 mm, 310 mm, 465 mm (b)
130 mm (c)

Imperial:
5.12 in (a)
6.11 in, 12.21 in, 18.31 in (b)
5.12 in (c)



Beam angles





funis surface m

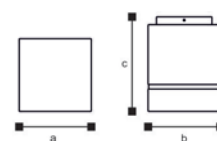


Stringent design combined with the compactness of a recessed ceiling fixture

Change the style because the ceiling height is too low? The funis m fixture range was expanded by the element of a recessed ceiling fixture. Thus, nothing stands in the way of processing a project with the funis m fixture range as a whole.

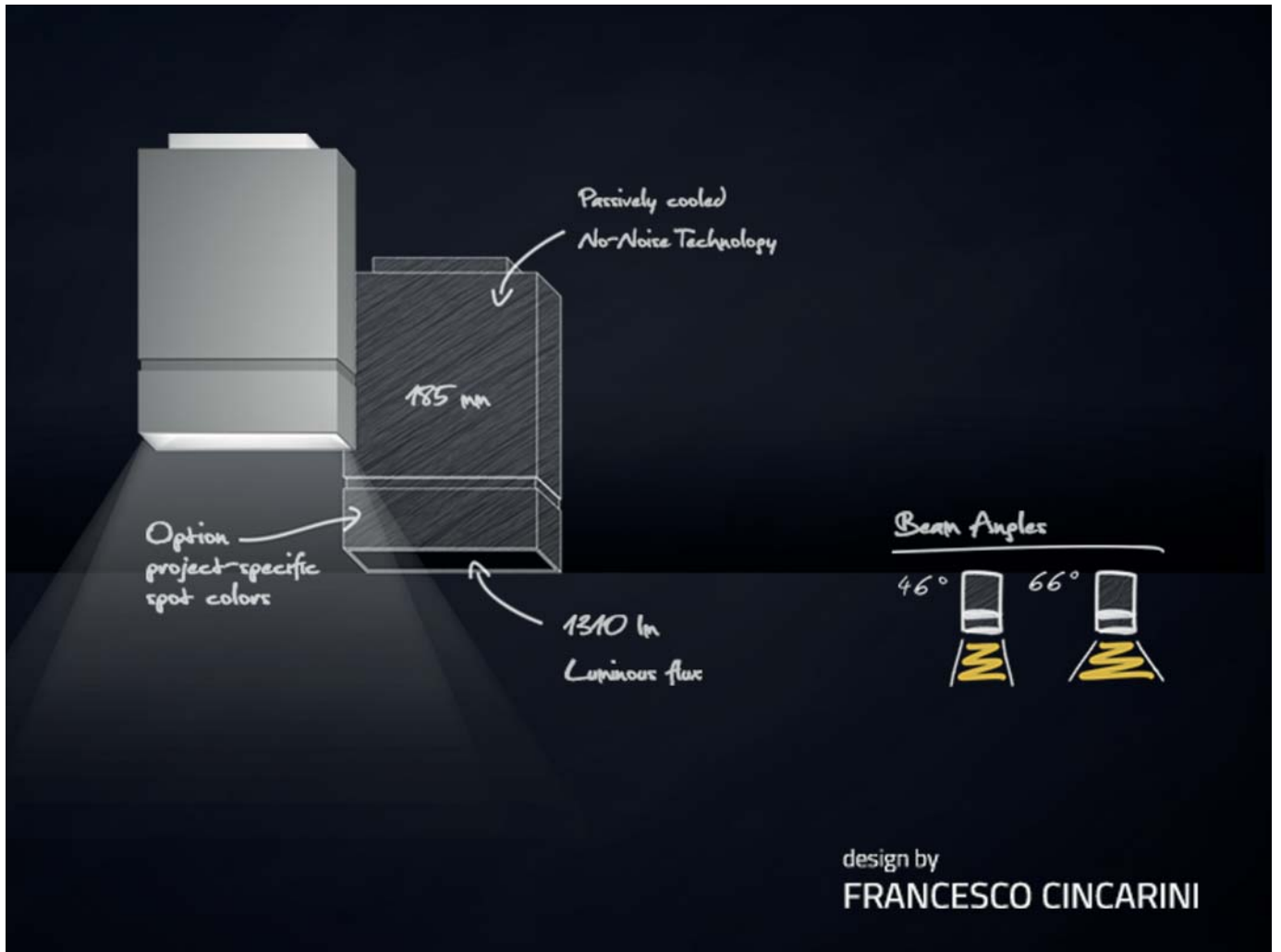
funis surface m offers the known flexibility of the funis range. The surfaces can be individually produced with a high-gloss to matt finish in any desired colour. From a technical point of view, the fixture adapts to the requirements of the project or its environment. You can choose between configurations with high luminous efficacy or alternatively a high CRI version with a CRI > 95.

Another highlight of this fixture is that the power supply is integrated into the body of the fixture, which facilitates assembly in areas where there is no space for an external power supply.

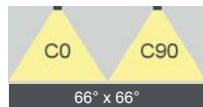
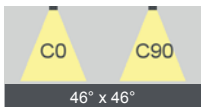


Metric:
(a x b x c)
130 x 130 x 185 mm

Imperial:
(a x b x c)
5.12 x 5.12 x 7.29 in



Beam angles





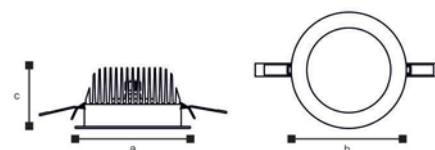
tectum m



The narrow-beam downlight for high ceilings.

A narrow angle lighting fitting as a recessed downlight? This is exactly where the tectum m can be used. With a focusing ability of up to 6°, light can be provided from high ceilings with the utmost precision. The nine different beam angles not only enable rotationally symmetrical but also asymmetrical beam characteristics, which can be used for the illumination of traffic areas or to highlight zones in entrance areas through to wall-washing applications. The possibility of controlling the fixtures via DMX enables the expansion from pureWhite to tunable-White and RGB downlights with an excellent dimming mechanism.

The low installation depth of 63 mm and a diameter of 115 mm ensures that the fixture can be used in almost any ceiling. Furthermore, the high-quality aluminium housing ensures excellent heat management of the fixture. The aluminium housing is rounded off by its cover frame that is available in three colours.



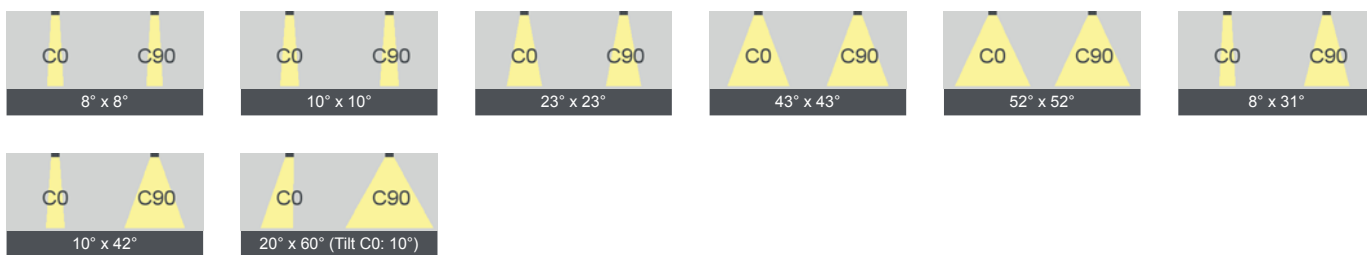
Metric:
(a x b x c)
125 x 125 x 65 mm

Imperial:
(a x b x c)
4.93 x 4.93 x 2.56 in



Haltestelle Münchner Freiheit, München

Beam angles





Controllers

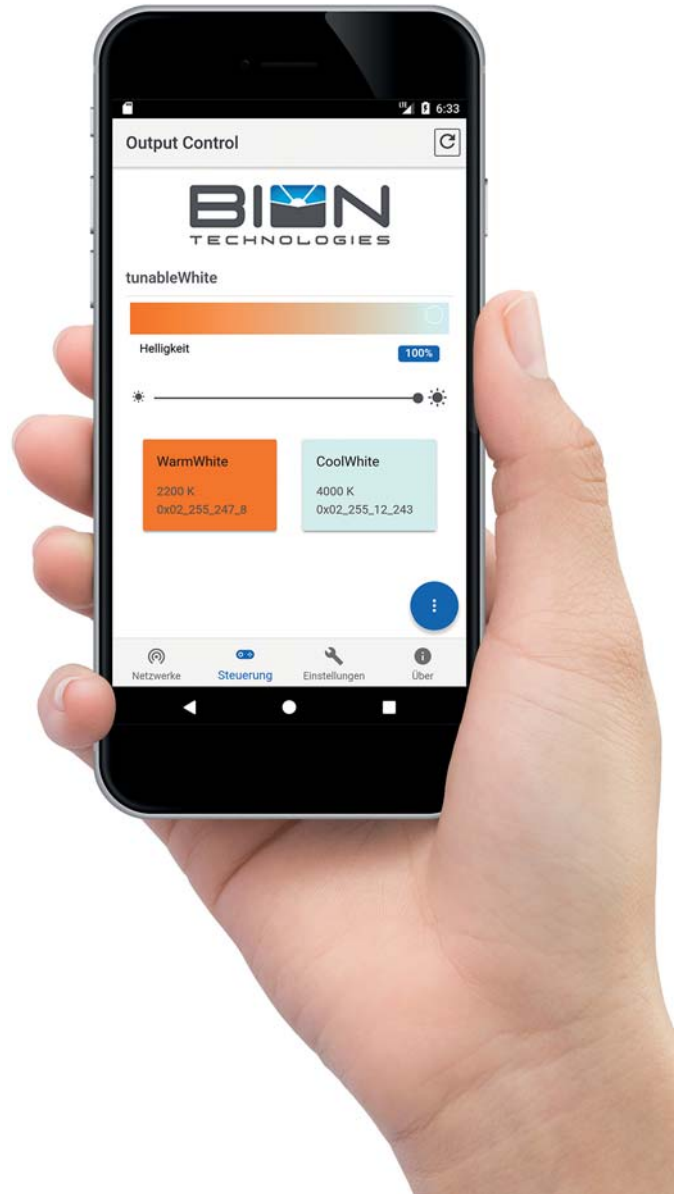
IoTcontrol

The future of IT-based lighting control.

IoTconnect is the native implementation of IT network technology into the lighting technology. Each fixture becomes its own network node with its own IP address by using WLAN or LAN technology in the individual light point. The vision of integrating light into the world of IT or smartphones is therefore becoming a reality without an intermediate step. The network technology enables direct bi-directional communication between the fixture and the user via the PC, smartphone or IP-capable building management systems. The fixtures not only receive but also return status messages to the network, which can then, e.g. be evaluated for energy monitoring and maintenance purposes.

The scope of the function and performance of the system can be maximised via the integrated sensors on the light point, and expanded by usage profiles or dynamic air-conditioning regulation. The communication between the fixture and the network takes place via the wireless protocol UDP (User Datagram Protocol), which guarantees a fast and, therefore lean communication between the participants. System-critical or safety-relevant processes are secured by a secondary protocol and encryption.

IoTconnect, the BIONcontrol app and BIONserver will provide you with reliable solutions for the use of network-integrated control irrespective of whether you are a user, planner or manufacturer.



IoTconnect

IoTconnect driver is the core of the new network technology. Whether integrated in the fixture as PCB system components or as tophat rail systems, they provide the user with the benefits of network technology, such as native, super-fast bi-directional communication with each end device capable of WiFi without detours such as hubs or Bluetooth converters. The integration of IoTconnect-capable systems into existing networks becomes child's play.

BIONcontrol

The BIONcontrol app allows you to easily communicate with your IOT fixture or IOT system. Simply set up the start settings for the fixtures or flexibly configure entire fixture networks directly from your app. The outstanding usability of the app and the user-based access profiles design the exposure to large light installations in a very intuitive manner. The app is available for Android and iOS.

BIONserver

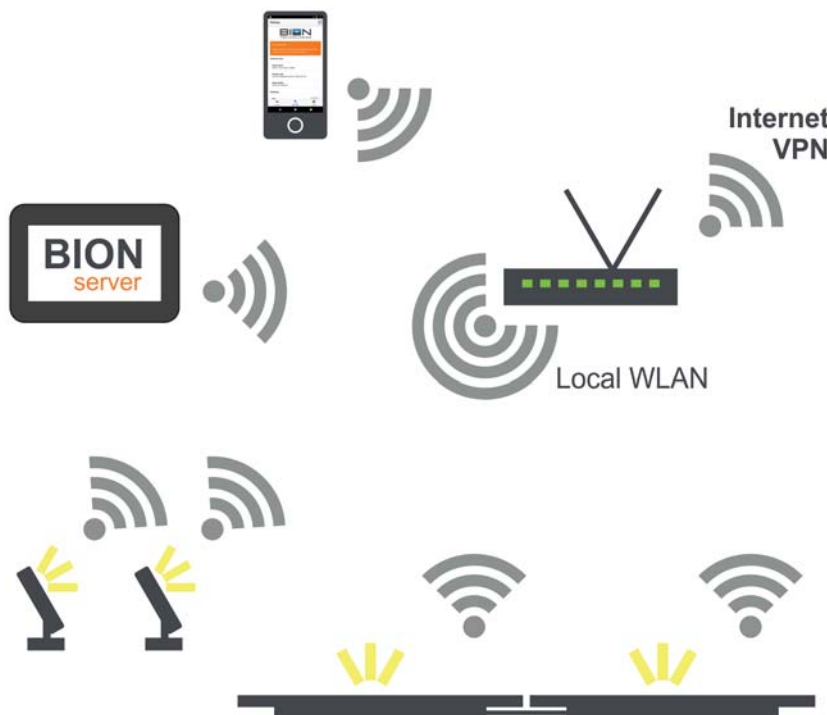
BIONserver is a hardware unit that completes your IOT network. The self-sufficient, calendrical control ensures the stored functions and programmes are played in a punctual manner and thus, permanently takes over the BIONcontrol function. You can easily change the settings of the Bionserver via your smartphone without having any previous knowledge about lighting controls or building management systems.

Access point mode



In the access point mode, a fixture equipped with the IOTconnect driver provides an adhoc WiFi access point. A smartphone (iOS/Android) capable of WiFi can be connected to this access point. The network access is encrypted with the WPA2 safety standard and therefore, it is just as safe as current WLANs in the IT sector. The BIONcontrol can be used to control and set the fixture and read the data of the fixture. Furthermore, the brightness or colourfulness can be stored as a start value for when it is next switched on, irrespective of the type of fixture. The app is free of charge in the Apple App Store or Google Play.

Network mode



In the network mode one or several connected wireless access points provide a network, which the fixtures that are equipped with the IOTconnect driver connect to. The access data is permanently stored in the fixture and the fixture will attempt to connect with the stored network during each start up. In this operating mode, the security is also guaranteed by a WPA2 encryption technology. Once registered in the network, the fixtures can be automatically detected via the "Discover command". The fixtures can then be grouped in groups and zones. Each group can be individually controlled. In the network mode, the fixtures can also be activated with the network-capable controls of the third-party providers via the open protocol. This enables an easy integration into the existing building technology.

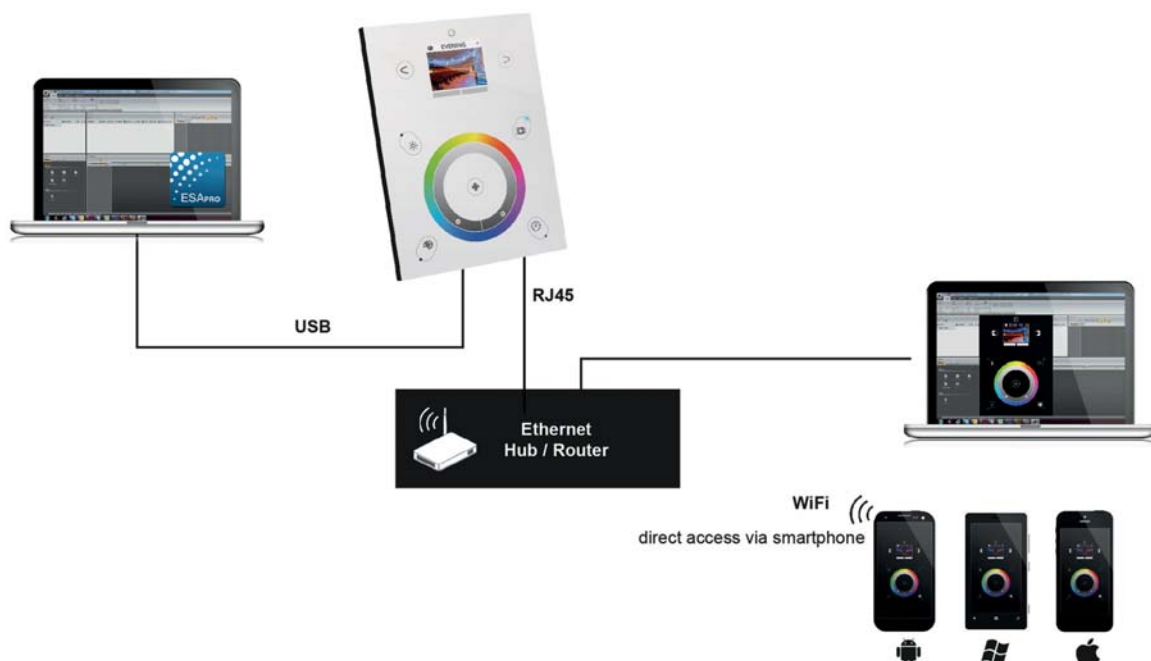
cambium xl

Appealing design combined with user-friendliness



The DMX-controller cambium xl features a touch-sensitive glass display that allows for convenient changes in light effects. The cambium xl comes with additional software, that allows you to quickly program the controller on your Mac or PC. Changes in speed and color can easily be made with your smartphone or tablet.

- Remote Control Apps for iOS | Android
- Life Control for Color Palette, Speed and Dimming
- Network- / USB-Interface







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