



Philips GentleSpace – High-quality, efficient lighting engineered for excellence in tough environments

GentleSpace gen4

GentleSpace gen4 is the ultimate lighting solution for industrial settings and indoor sports facilities. It exceeds expectations by ensuring superior light quality, improving employee safety and productivity, and complying with all the relevant safety regulations. Engineered for longevity, GentleSpace gen4 reduces the frequency, hassle, and costs of maintenance, making it ideal for high-ceiling installations. Its energy-efficient design cuts operational expenses, offering maximum application efficiency and an attractive total cost of ownership (TCO). This product range offers a wide variety of optics, beam angles (from very narrow to wide), lumen packages, and connectivity options. With GentleSpace gen4 you can easily create a tailor-made lighting solution for every high-ceiling application. Its modern, flat design makes it easier to install, clean, and maintain. The single optical window design provides superior visual performance. A variety of mounting possibilities and connectors, like the pre-mounted IP65 connector, enable quick and easy installation. The robust design allows it to withstand harsh conditions in all sorts of environments. You can choose between various cover materials, including specialized variants for extreme temperatures (XT), hazardous areas (ATEX 2/22), and sports applications. Additionally, GentleSpace gen4 offers advanced connectivity options. It's ready to use in connected lighting systems like Interact. Reliable, high-efficiency lighting with smart connectivity – a bright choice for a better future. Embrace sustainability with GentleSpace gen4, the highbay lighting solution that complies with the principles of the circular economy by prioritising durability and recyclability. The luminaire is serviceable, with all the information available at your fingertips via the Signify Service tag app. Whether you are looking

for a reliable "fit and forget" solution or one that can be adapted and controlled after installation, GentleSpace gen4 is the right choice for you.

Benefits

- Robust design, created to withstand harsh conditions in all sorts of environments
- Compact product architecture, resistant to high impact (IK08), water, and dust (IP65)
- Excellent light uniformity and low glare for optimised working conditions with improved safety and greater visual comfort
- Attractive total cost of ownership thanks to its high luminous efficacy (up to 189 lm/W), long lifetime (100,000 hours @L85), and optimized lighting plan that requires fewer luminaires per application
- Easy installation. Single-piece, lighter architecture (approximately 20% lighter than the previous generation) with multiple mounting options for flexible installation in various environments and conditions
- Interact Ready connectivity for smart lighting. Connect to the cloud and discover additional ways to save energy through optimised efficiency, motion sensing and daylight harvesting, as well as improved lighting management, productivity and safety
- Engineered with sustainability in mind. Meets lighting for circularity criteria to help you achieve your sustainability goals

Features

- Exceptional performance with UltraEfficient (UE, 189 lm/W) and High-Efficiency (HE, 183 lm/W) versions
- Long service life of 100,000 hours at L85
- High water (IP65) and impact protection (IK08)
- Wide variety of optics (wide beam/medium beam/narrow beam/extra narrow beam/high-rack/asymmetrical)
- Special options for a broad range of applications: Extreme version (XT) up to 70°C, Safety Class I or II, swimming pool protected version (SWP), marine protection (MSP), VDE certified ball-proof (BP) option, ATEX 2/22 certified version. Tested against a broad list of chemical substances that may be present in industrial settings
- Detachable mounting system for easy installation, including various mounting options and connectors (IP65 pre-mounted connector, or fly-wire cable)
- Robust, die-cast aluminum housing with efficient thermal management and flat front and rear design for easy installation, cleaning, and maintenance
- Single LED module design for superior light quality
- Access to the Signify Service tag app with service and maintenance information

Application

- Manufacturing sites (from food and beverage to heavy industry)
- Warehouses and logistics centres
- Indoor sports facilities, swimming pools, and exhibition halls

Versions

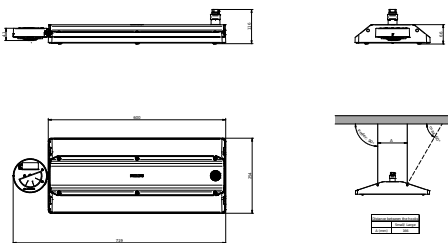


GentleSpace gen4-large, suspension

GentleSpace gen4-large, wall-bracket

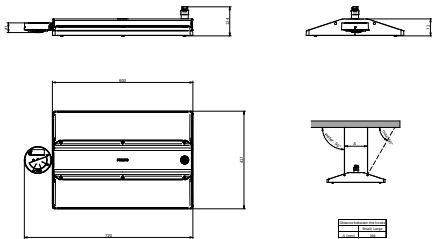
Dimensional drawing

BY580X suspended



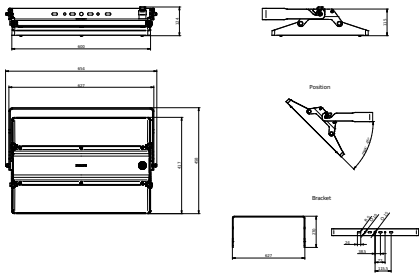
With Wieland connector on a cable or free cable finish, cable length is 0.5m or 1m or 1.5m or 2m

BY581X suspended



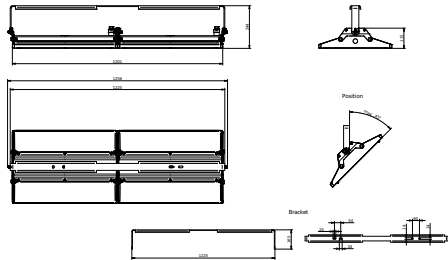
With Wieland connector on a cable or free cable finish, cable length is 0.5m or 1m or 1.5m or 2m

BY581P, BY583P Wallmounted bracket



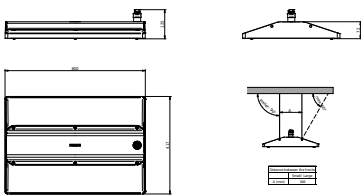
With Wieland connector on a cable or free cable finish, cable length is 0.5m or 1m or 1.5m or 2m

700S Bracket



With Wieland connector on a cable or free cable finish, cable length is 0.5m or 1m or 1.5m or 2m

BY581P, BY583P suspended



With Wieland connector on a cable or free cable finish, cable length is 0.5m or 1m or 1.5m or 2m

General Information	
Driver included	Yes
Number of gear units	Unit
Light Technical	
Correlated Colour Temperature (Nom)	4000 K
Colour rendering index (CRI)	>80
Operating and Electrical	
Protection class IEC	Safety class I
Input Voltage	220 to 240 V
Line Frequency	50 to 60 Hz
Mechanical and Housing	
Housing Colour	Silver
Ingress protection code	IP65
Emergency Operation	
Central Emergency	No
Approval and Application	
CE mark	Yes
ENEC mark	ENEC mark
Flammability mark	For mounting on easily flammable surfaces
Initial Performance (IEC Compliant)	
Luminous flux tolerance	+/-10%

General Information

Order Code	Full Product Name	Service Tag
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	Yes
910505102857	BY580X 170S/840 SIA WB GC SI H4	Yes
910505102859	BY581X 350S/840 SIA WB GC SI H4	Yes
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	Yes
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	Yes
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	Yes
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	-
910505102875	BY581P 250S/840 PSU HE WB GC SI	Yes
910505102881	BY581P 350S/840 DIA WB GC SI	Yes
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	Yes
910505102921	BY581P 250S/840 DIA HE XNB GC SI	-
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	-

Light Technical

Order Code	Full Product Name	Luminous efficacy (rated) (nom.)	Luminous Flux	Optic type
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	177 lm/W	70,000 lm	Symmetrical
910505102857	BY580X 170S/840 SIA WB GC SI H4	167 lm/W	17,000 lm	Symmetrical
910505102859	BY581X 350S/840 SIA WB GC SI H4	167 lm/W	35,000 lm	Symmetrical
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	178 lm/W	13,000 lm	Symmetrical
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	184 lm/W	25,000 lm	Symmetrical
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	184 lm/W	25,000 lm	Symmetrical

Order Code	Full Product Name	Luminous efficacy (rated) (nom.)	Luminous Flux	Optic type
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	176 lm/W	25,000 lm	Assymetric beam angle
910505102875	BY581P 250S/840 PSU HE WB GC SI	184 lm/W	25,000 lm	Symmetrical
910505102881	BY581P 350S/840 DIA WB GC SI	167 lm/W	35,000 lm	Symmetrical
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	174 lm/W	25,000 lm	Symmetrical
910505102921	BY581P 250S/840 DIA HE XNB GC SI	181 lm/W	25,000 lm	Symmetrical
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	177 lm/W	35,000 lm	Symmetrical

Operating and Electrical

Order Code	Full Product Name	Power Consumption	Suitable for random switching
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	397 W	No
910505102857	BY580X 170S/840 SIA WB GC SI H4	102 W	Yes (relates to presence/movement detection and daylight harvesting)
910505102859	BY581X 350S/840 SIA WB GC SI H4	210 W	Yes (relates to presence/movement detection and daylight harvesting)
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	73 W	Yes (relates to presence/movement detection and daylight harvesting)
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	136 W	Yes (relates to presence/movement

Order Code	Full Product Name	Power Consumption	Suitable for random switching
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	136 W	detection and daylight harvesting) Yes (relates to presence/movement detection and daylight harvesting)
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	142 W	No
910505102875	BY581P 250S/840 PSU HE WB GC SI	136 W	No
910505102881	BY581P 350S/840 DIA WB GC SI	210 W	No
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	144 W	No
910505102921	BY581P 250S/840 DIA HE XNB GC SI	138 W	No
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	198 W	No

Controls and Dimming

Order Code	Full Product Name	Dimmable	Embedded control	Maximum dim level
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	Yes	-	10%
910505102857	BY580X 170S/840 SIA WB GC SI H4	Yes	Sensor SNH (R) 210	-
910505102859	BY581X 350S/840 SIA WB GC SI H4	Yes	Sensor SNH (R) 210	-
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	Yes	Sensor SNH (R) 210	-
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	Yes	Sensor SNH (R) 210	-
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	Yes	Sensor SNH (R) 210	-

Order Code	Full Product Name	Dimmable	Embedded control	Maximum dim level
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	Yes	-	10%
910505102875	BY581P 250S/840 PSU HE WB GC SI	No	-	-
910505102881	BY581P 350S/840 DIA WB GC SI	Yes	-	10%
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	Yes	-	10%
910505102921	BY581P 250S/840 DIA HE XNB GC SI	Yes	-	10%
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	Yes	-	10%

Mechanical and Housing

Order Code	Full Product Name	Mech. impact protection code
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	IK07
910505102857	BY580X 170S/840 SIA WB GC SI H4	IK03
910505102859	BY581X 350S/840 SIA WB GC SI H4	IK03
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	IK03
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	IK03
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	IK03

Order Code	Full Product Name	Mech. impact protection code
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	IK07
910505102875	BY581P 250S/840 PSU HE WB GC SI	IK07
910505102881	BY581P 350S/840 DIA WB GC SI	IK07
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	IK07
910505102921	BY581P 250S/840 DIA HE XNB GC SI	IK07
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	IK07

Emergency Operation (1/2)

					Power consumption during Central DC emergency mode
Order Code	Full Product Name	Emergency lighting	Emergency flux	Type of emergency lighting battery	
910505102956	BY581P	-	-	-	-
	700S/840				
	DIA HE WB				
	GC SI BR				
910505102857	BY580X	-	-	-	-
	170S/840 SIA				
	WB GC SI H4				
910505102859	BY581X	-	-	-	-
	350S/840 SIA				
	WB GC SI H4				
910505102860	BY580X	-	-	-	-
	130S/840 SIA				
	HE WB GC SI				
	H4				
910505102862	BY581X	-	-	-	-
	250S/840 SIA				
	HE WB GC SI				
	H4				
910505102871	BY581X	Emergency lighting	850 lm	Lithium	5 W
	250S/840 SIA	3 hours			
	HE WB GC SI	duration			
	ELW3 H4	with Wireless Interface			
910505102913	BY581P	-	-	-	-
	250S/840				

Emergency Operation (2/2)

Order Code	Full Product Name	Rated duration of the emergency lighting (when fully charged)
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	-
910505102857	BY580X 170S/840 SIA WB GC SI H4	-
910505102859	BY581X 350S/840 SIA WB GC SI H4	-
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	-
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	-
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	3 h

Approval and Application

					Power consumption during Central DC emergency mode
Order Code	Full Product Name	Emergency lighting	Emergency flux	Type of emergency lighting battery	
	DIA HE ASYM				
	GC SI MBW				
910505102875	BY581P	-	-	-	-
	250S/840				
	PSU HE WB				
	GC SI				
910505102881	BY581P	-	-	-	-
	350S/840				
	DIA WB GC SI				
910505102895	BY581P	Emergency lighting	850 lm	Lithium	5 W
	250S/840	3- hour			
	DIA WB GC SI	duration			
	ELD3	with DALI interface			
910505102921	BY581P	-	-	-	-
	250S/840				
	DIA HE XNB				
	GC SI				
910505102937	BY581P	-	-	-	-
	350S/840				
	DIA HE WB				
	GC SI XT 1m				

Order Code	Full Product Name	Rated duration of the emergency lighting (when fully charged)
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	-
910505102875	BY581P 250S/840 PSU HE WB GC SI	-
910505102881	BY581P 350S/840 DIA WB GC SI	-
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	3 h
910505102921	BY581P 250S/840 DIA HE XNB GC SI	-
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	-

Order Code	Full Product Name	Ambient temperature range	Glow-wire test	Flickering value (PstLM)	Stroboscopic effect
910505102956	BY581P	-30 to +55 °C	Temperature	0.22	0.01
	700S/840		650 °C,		
	DIA HE WB		duration 30 s		
	GC SI BR				
910505102857	BY580X	-30 to +55 °C	Temperature	1	0.4
	170S/840		650 °C,		
	SIA WB GC		duration 30 s		
	SI H4				
910505102859	BY581X	-30 to +55 °C	Temperature	1	0.4
	350S/840		650 °C,		
	SIA WB GC		duration 30 s		
	SI H4				
910505102860	BY580X	-30 to +55 °C	Temperature	1	0.4
	130S/840		650 °C,		
	SIA HE WB		duration 30 s		
	GC SI H4				
910505102862	BY581X	-30 to +55 °C	Temperature	1	0.4
	250S/840		650 °C,		
	SIA HE WB		duration 30 s		
	GC SI H4				
910505102871	BY581X	0°C to 25°C	Temperature	1	0.4
	250S/840		850 °C,		
	SIA HE WB		duration 30 s		
	GC SI ELW3 H4				

Initial Performance (IEC Compliant)

Order Code	Full Product Name	Initial chromaticity
910505102956	BY581P 700S/840 DIA HE WB GC SI BR	(0.383, 0.377) SDCM 3
910505102857	BY580X 170S/840 SIA WB GC SI H4	(0.380, 0.375) SDCM 3
910505102859	BY581X 350S/840 SIA WB GC SI H4	(0.380, 0.375) SDCM 3
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	(0.383, 0.377) SDCM 3
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	(0.383, 0.377) SDCM 3
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	(0.383, 0.377) SDCM 3

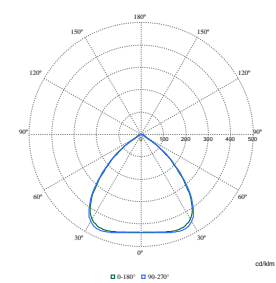
Product Data

Order Code	Full Product Name	Product family code
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910505102857	BY580X 170S/840 SIA WB GC SI H4	BY580X
910505102859	BY581X 350S/840 SIA WB GC SI H4	BY581X
910505102860	BY580X 130S/840 SIA HE WB GC SI H4	BY580X
910505102862	BY581X 250S/840 SIA HE WB GC SI H4	BY581X
910505102871	BY581X 250S/840 SIA HE WB GC SI ELW3 H4	BY581X

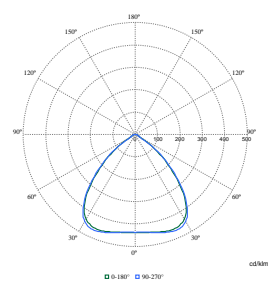
Order Code	Full Product Name	Ambient temperature range	Glow-wire test	Flickering value (PstLM)	Stroboscopic effect
910505102913	BY581P	-30 to +55 °C	Temperature	0.12	0.07
	250S/840		650 °C,		
	DIA HE		duration 30 s		
	ASYM GC SI MBW				
910505102875	BY581P	-30 to +55 °C	Temperature	0.04	0.07
	250S/840		650 °C,		
	PSU HE WB		duration 30 s		
	GC SI				
910505102881	BY581P	-30 to +55 °C	Temperature	0.22	0.01
	350S/840		650 °C,		
	DIA WB GC		duration 30 s		
	SI				
910505102895	BY581P	0°C to 25°C	Temperature	0.12	0.07
	250S/840		850 °C,		
	DIA WB GC		duration 30 s		
	SI ELD3				
910505102921	BY581P	-30 to +55 °C	Temperature	0.12	0.07
	250S/840		650 °C,		
	DIA HE		duration 30 s		
	XNB GC SI				
910505102937	BY581P	-30°C to 55°C	Temperature	0.22	0.01
	350S/840		650 °C,		
	DIA HE WB		duration 30 s		
	GC SI XT 1m				

Order Code	Full Product Name	Initial chromaticity
910505102913	BY581P 250S/840 DIA HE ASYM GC SI MBW	(0.383, 0.377) SDCM 3
910505102875	BY581P 250S/840 PSU HE WB GC SI	(0.383, 0.377) SDCM 3
910505102881	BY581P 350S/840 DIA WB GC SI	(0.380, 0.375) SDCM 3
910505102895	BY581P 250S/840 DIA WB GC SI ELD3	(0.380, 0.375) SDCM 3
910505102921	BY581P 250S/840 DIA HE XNB GC SI	(0.383, 0.377) SDCM 3
910505102937	BY581P 350S/840 DIA HE WB GC SI XT 1m	(0.383, 0.377) SDCM 3

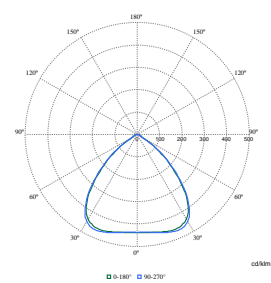
Polar Wide Diagrams



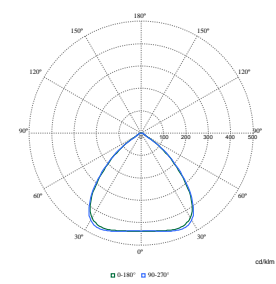
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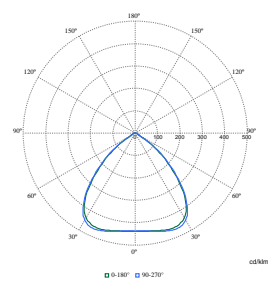
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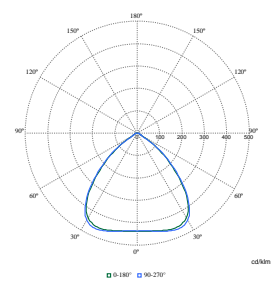
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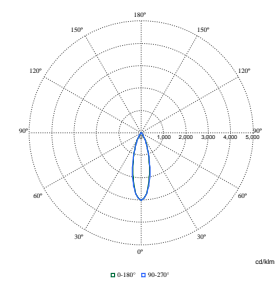
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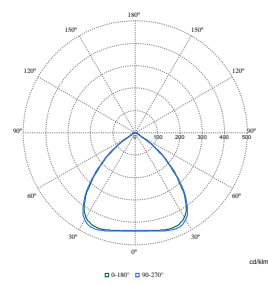
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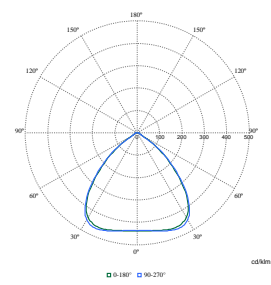
Polar Normal (separate) - BY580PI - 910505102862



Polar Normal (separate) - BY580PI - 910505102921



Polar Normal (separate) - BY580PI - 910505102859



Polar Normal (separate) - BY580PI - 910505102860

Polar Wide Diagrams

