

30 mm

xxx Profile length

LED STATUS

Internal Controller with 4 driving modes

Led Status	Internal controller with 4 driving modes
1	100% Continuous use
2	200% Semi-continuous use
3	270% Strobe use
4	10-100% Analog Reg

Develop your custom solution

Over 18 Standard Colours

Base IP54 Protection Degree

Variant IP65 Protection Degree

24 Vdc

Optional Polarizing Filter

CE RoHS

UK CA

Illuminator Features :

- Project achieved by internal resources and Genesi skills; Designed for machine vision applications with linear or matrix cameras;
- Fast controller which allows to have the following modes: continuous use,semi-continuous use,strobe (PNP, NPN), analog regulation.
- Microcontroller to monitor the pulse duration and the maximum temperature;
- Model GX with 5° Lens or transparent covers;
- Model GXML designed with interchangeable lens position to achieve 4° to 45° light beam;
- Model GXB for backlight function with satin, trasparent or opaline covers;
- Powerful and Fast strobe mode with energy buffering and strobe duration control, min. pulse from 1 µs;

COLOUR	WHITE		UV-A				VISIBLE				NIR			SWIR					
Led Colour	White 6000K -6K	White 4000K -4K	UV 365nm -365	UV 385nm -385	UV 395nm -395	UV 405nm -405	Blue 450nm -450	Green 524nm -524	Red 625nm -625	Deep Red 660nm -660	IR 730nm -730	IR 850nm -850	IR 950nm -950	SWIR 1050nm -1050	SWIR 1200nm -1200	SWIR 1300nm -1300	SWIR 1450nm -1450	SWIR 1550nm -1550	SWIR 1600nm -1650
Continuous use power	100 %		100%				100%				100%			100%					
Semi-continuous use power	200 %		200%				200%				200%			200%					
Strobe use power	270 %		270%				270%				270%			270%					

GX Part Number

Ex. Code : **GXXXX** - **YYY** - **WW1** - **WW2** - **WW3**

GXXXX	Base Lenghs
GX14	14 cm
GX22	22 cm
GX30	30 cm
GX38	38 cm
GX46	46 cm
GX54	54 cm
GX62	62 cm
GX102	102 cm
GX200	200 cm

GXMLXXX	Base Lenghs
GXML14	14 cm
GXML22	22 cm
GXML30	30 cm
GXML38	38 cm
GXML46	46 cm
GXML54	54 cm
GXML62	62 cm
GXML102	102 cm
GXML200	200 cm

GXBXXX	Base Lenghs
GXB14	14 cm
GXB22	22 cm
GXB30	30 cm
GXB38	38 cm
GXB46	46 cm
GXB54	54 cm
GXB62	62 cm
GXB102	102 cm
GXB200	200 cm
GXXXX	From 14 cm to 600 cm on demand

-YYY	Led Colours	EN 62471
-6K	Base 6000K Cold White	White RISK1
-4K	4000K Natural White	White RISK1
-365	UV 365 nm	UV - A RISK3
-385	UV 385 nm	
-395	UV 395 nm	
-405	UV 405 nm	
-450	450 nm Royal Blue	RISK2
-524	524 nm Green	Visible RISK1
-625	625 nm Red	
-660	660 nm Deep Red	
-730	730 nm IR	Nir RISK2
-850	850 nm IR	
-950	950 nm IR	
-1050	1050 nm SWIR	Swir RISK2
-1200	1200 nm SWIR	
-1300	1300 nm SWIR	
-1450	1450 nm SWIR	
-1550	1550 nm SWIR	
-1650	1650 nm SWIR	
-YYY	Colour on demand	

-WW1	GX Lens variants
	Base 5° Lens cover

-WW1	GXML Lens variants
-P4R	4° ML Beam angle
-P2	6° ML Beam angle
	Base 12° ML Beam angle
-P2R	22° ML Beam angle
-P1R	45° ML Beam angle

-WW1	GXB Lens variants
	Base Internal reflection

-WW2	GX Cover variants
	Base without cover
-T65	5° lens cover - IP65
-45T	45° Lens + Transparent Cover - IP65

-WW2	GXML Cover variants
	Base without cover
-P	Polarizing filter
-T65	Transparent cover - IP65
-TP65	Transparent cover + Polarizing filter - IP65

-WW2	GXB Cover variants
	Base opaline satin cover
-T	Trasparent cover
-OP	Opaline cover
-IP65	Satin, Trasparent or Opaline cover - IP65

-WW3	Cables
	20 cm cable + M12 5P M
-70N	70 cm PVC cable + MATE-N-LOK 6P M (1-480704-0) 5 wire
-WW3	Supply connection on demand

Not all combinations are available

Part Number Examples:

GX14-6K

Power bar 4 Driving Modes 14 cm White 6000K 5° Lens cover 1080/3000Lm 0,3/0,8A 7,2/20W 20cm cable M12 M 5P

GXML30-850

Power bar 4 Driving Modes 30 cm IR 850nm 12° multi-lens (4°-45°) cover 0,9/2,4A 22/58W 20cm cable M12 M 5P

GXB78-850

Power bar & backlight 4 Driving Modes 78 cm IR 850nm Opaline satin cover 2,5/7,2A 60/173W 20cm cable M12 M 5P

Design & Production
Made in Italy



Genesi LUX®

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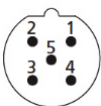


Organization with a
certified ISO 9001:2015
Quality Management System

Rev. 02/25

OPERATING MODE

100% CONTINUOUS USE

Connector	PINS	Function	Description
	1	+24 V	A) START NPN → PIN2: 0 to 1 V; B) START PNP → PIN4: 3 to 24 V; For the continuous use: it is possible to connect PIN4 directly to +24 V or PIN2 to GND
	2	A) Start NPN: 0-1 V	
	3	GND	
	4	B) Start PNP: 3-24 V	
	5	-	

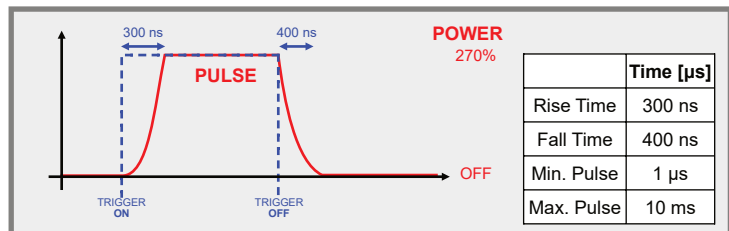
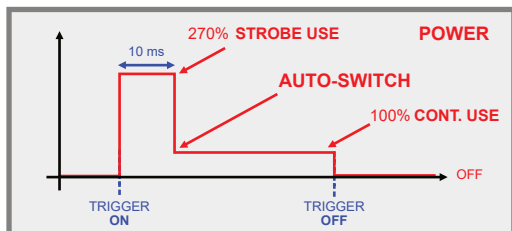
200 % SEMI-CONTINUOUS USE

Connector	PINS	Function	Description
	1	+24 V	Precondition: PIN5: 24 V A) START NPN → PIN2: 0 to 1 V; B) START PNP → PIN4: 3 to 24 V; In this mode → Tonmax = 60 s - Dtmmax = 50% For the semi-continuous use: it is possible to connect PIN4 directly to +24 V or PIN2 to GND. To use it in continuous mode with DTmax from 51% to 100%: it is necessary to use the heat sink or forced ventilation.
	2	A) Start NPN: 0-1 V	
	3	GND	
	4	B) Start PNP: 3-24 V	
	5	+24 V	

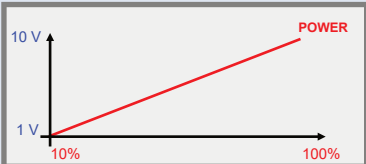
270% STROBE USE

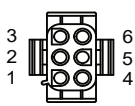


Connector	PINS	Function	Description
	1	+24 V	A) START NPN → PIN2: 0 to 1 V; B) START PNP → PIN4: 3 to 24 V; In this mode → Tonmax = 10 ms - Dtmmax = 10% AUTO-SWITCH in continuous use.
	2	A) Start NPN: 0-1 V	
	3	GND	
	4	B) Start PNP: 3-24 V	
	5	-	



ANALOG REGULATION USE 100%

Connector	PINS	Function	Description
	1	+24 V	PIN5 from 1 to 10 V can adjust the power from 10% to 100%. 
	2	-	
	3	GND	
	4	-	
	5	1 V - 10 V	

Connector	PINS	Function
	1	+24 V
	2	Start PNP: 3-24 V
	3	Start NPN: 0-1 V
	4	Analog 1 V - 10 V
	5	GND

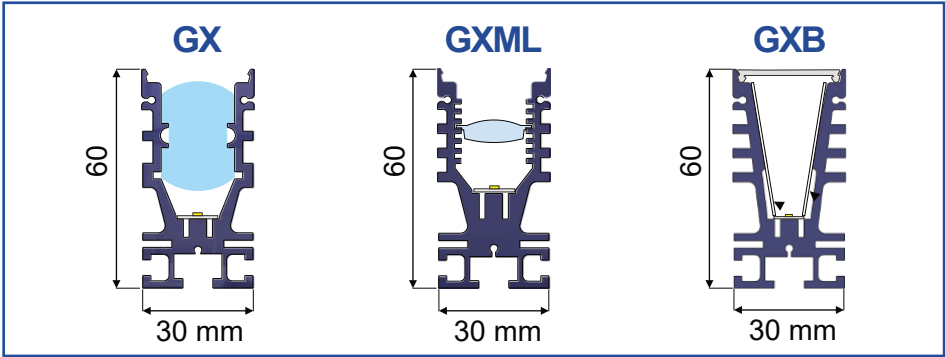


270% STROBE USE POWER can be reached only from WHITE / VISIBLE / NIR LEDs, for other wavelengths check the power table at page 1.

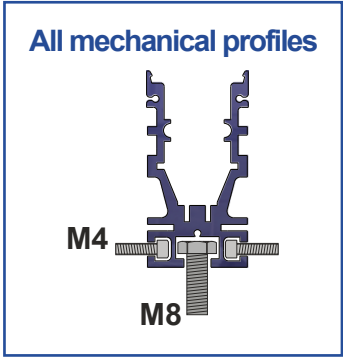


MicroController temperature protection → at 80°C the PCB enables the protection and restores the functioning at T<60°.

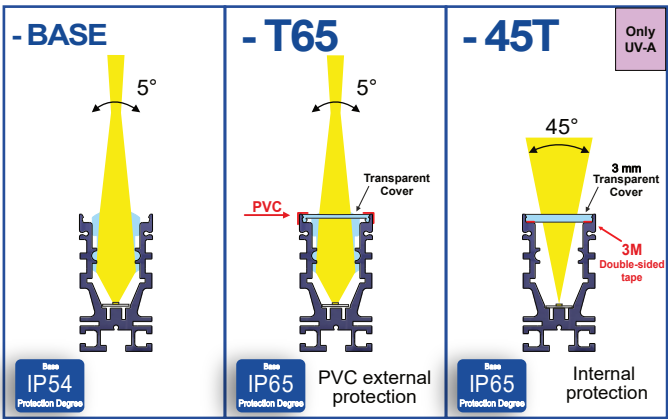
MECHANICAL DRAWINGS



FIXING



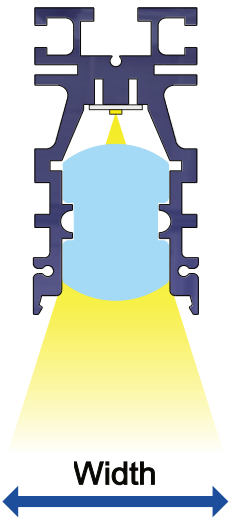
BEAM ANGLES AND COVERS GX



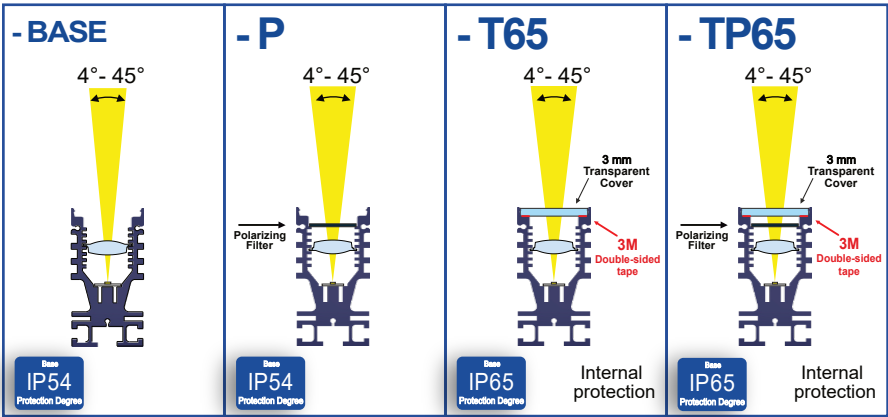
LIGHT PROJECTION GX

GX30-6K		
Working distance	Width mm	Power W/m²
20 cm	12	433 - 860 - 1169
40 cm	20	165 - 330 - 445
100 cm	50	29,5 - 59 - 79,6

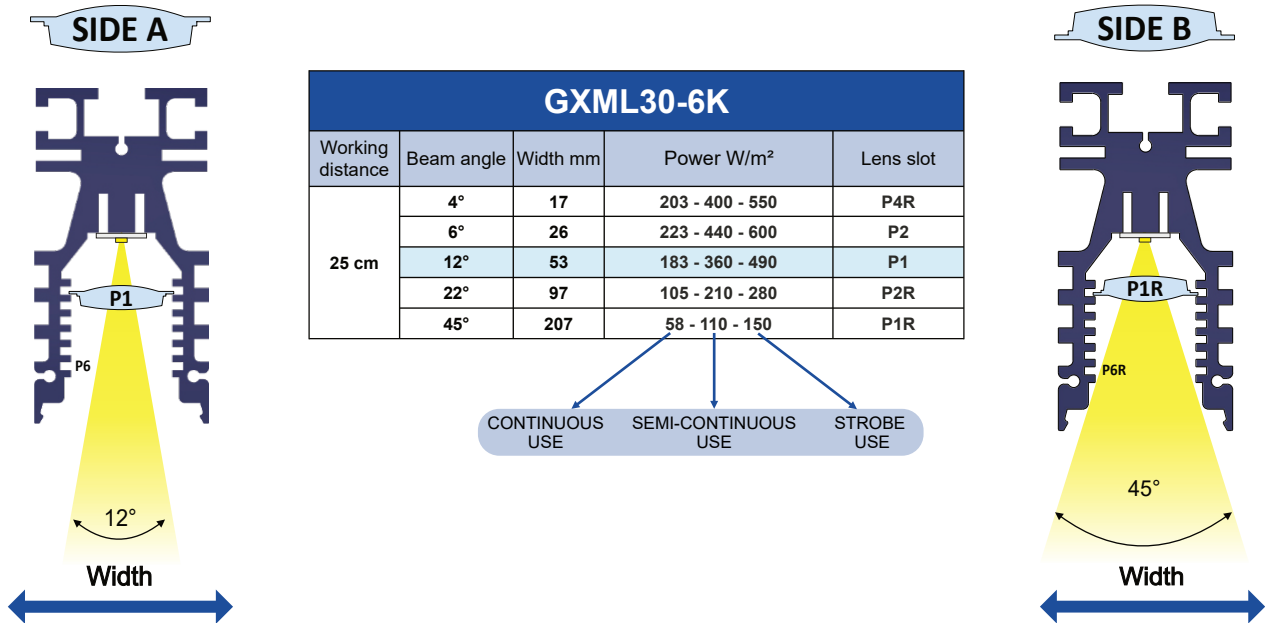
CONTINUOUS USE SEMI-CONTINUOUS USE STROBE USE



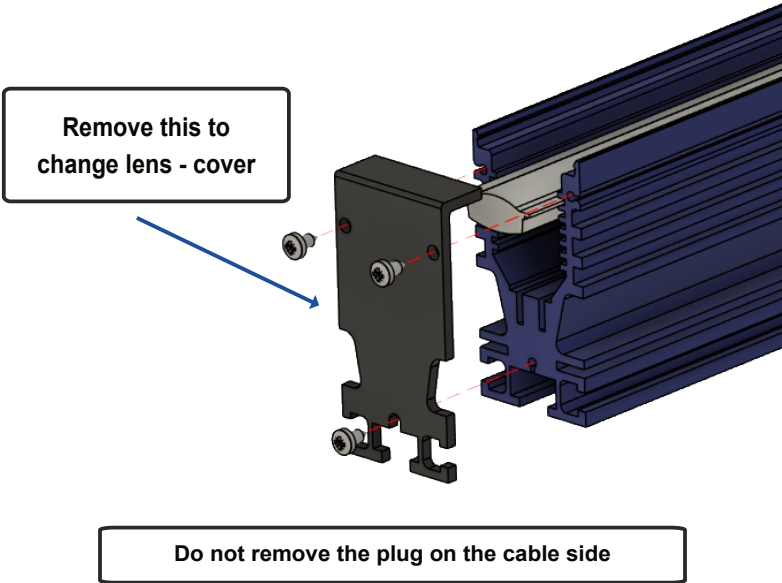
BEAM ANGLES AND COVERS GXML



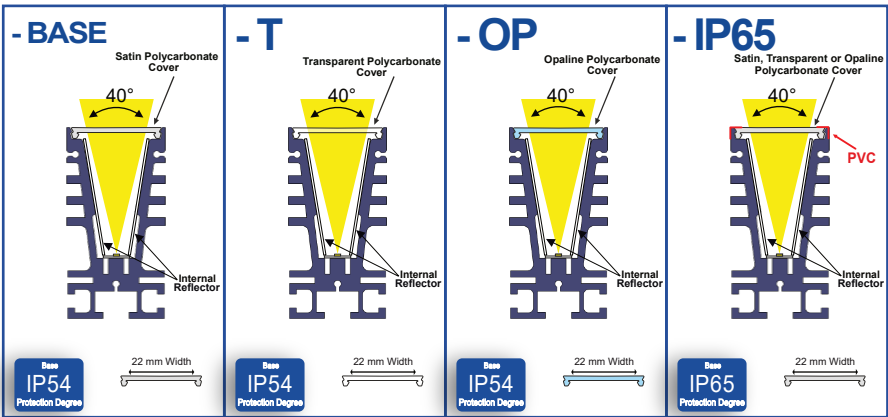
LIGHT PROJECTION GXML



HOW TO CHANGE THE LENS POSITION



BEAM ANGLES AND COVERS GXB

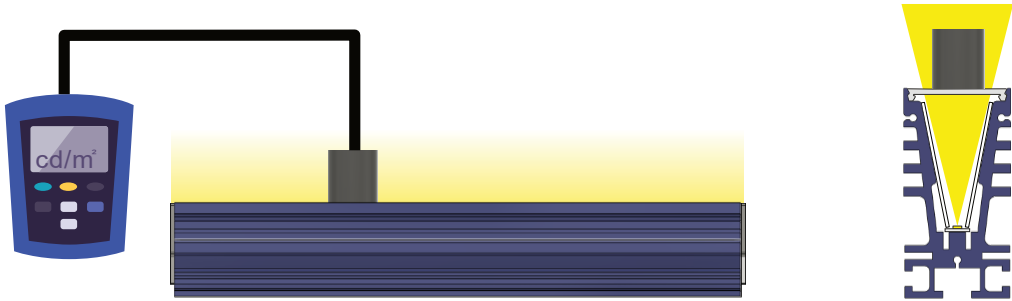


LIGHT PROJECTION GXB

GXB30-6K	
Working Distance	Luminance cd/m²
On Surface	100k - 200k - 270k
CONTINUOUS USE SEMI-CONTINUOUS USE STROBE USE	

GXB30-6K-T	
Working Distance	Luminance cd/m²
On Surface	320k - 600k - 840k
CONTINUOUS USE SEMI-CONTINUOUS USE STROBE USE	

GXB30-6K-OP	
Working Distance	Luminance cd/m²
On Surface	65k - 130k - 175k
CONTINUOUS USE SEMI-CONTINUOUS USE STROBE USE	



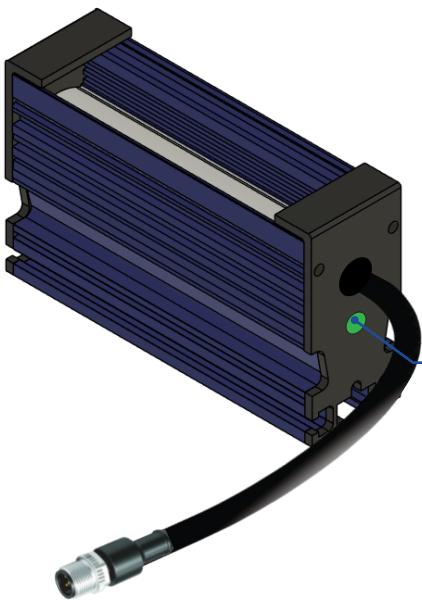
ACCESSORIES

CODE	DESCRIPTION
GE-M12F-5X050-2M	Female extension PVC Cable 5P 2Mt 0,5mm2 + M12 5P Female
GE-M12F-5X050-5M	Female extension PVC Cable 5P 5Mt 0,5mm2 + M12 5P Female
GE-M12F-5X050-10M	Female extension PVC Cable 5P 10Mt 0,5mm2 + M12 5P Female
GE-70N-2X1-3x035-2M	Female extension PVC Cable 5P 2Mt 2x1 + 3x0,35mm2 + Mate-N-LOK 6P Female
GE-70N-2X1-3x035-5M	Female extension PVC Cable 5P 5Mt 2x1 + 3x0,35mm2 + Mate-N-LOK 6P Female
GE-70N-2X1-3x035-10M	Female extension PVC Cable 5P 10Mt 2x1 + 3x0,35mm2 + Mate-N-LOK 6P Female
GE-ABS606E	6+1 channels Strobe Voltage Controller, Buffer 60A /1ms 24Vdc, Programmable ETH, Max cycle freq. over 500Khz
GE-ABS606C-CAT	6+1 channels Strobe Voltage Controller, Buffer 60A /1ms 24Vdc , Programmable Ethercat, Max cycle freq. over 500Khz

Tailor-Made

Connector	PINS	Function	Description
M12 Male	1		
	2		
	3		
	4		
	5		

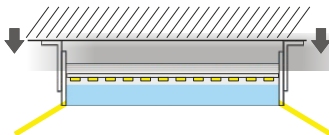
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LED STATUS

Mode	Led colour signal		Function/note
Powered	Blue		-
100% Continuous use	Green		-
0-100% Analog Reg	Yellow		-
270% Strobe Use	Fast blinking green		-
200% Semi-continuous use standby	Purple		Without PNP or NPN input only +24V analog IN
200% Semi-continuous use	Slow blinking purple		With PNP o NPN input +24V analog IN
Over 10% ton error	Fast blinking red		10 sec stop
Over 80° temperature in pcb controller	Slow blinking green-yellow-red		Up to < 60° stop

The indicated IP protection degree is guaranteed only if the product is positioned downward



STANDARDS		
EMC immunity :	EN 61547:2009	
EMC emission :	EN 55015:2019	
Photobiologic risk :	EN 62471:2008 GLS: RISK 1	Only for white light, continuous use
Assessment of lighting equipment related to human exposure to electromagnetic fields	EN 62493:2015	

WARNING

-Electrical device exclusively for professional use. Installation can be done by qualified personnel only.
-In case of power supply wire damage, its replacement has to be done at the head office exclusively.

Warranty loss in case of inappropriate use and tampering.



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Made in Italy



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Rev. 02/25