



LED STATUS

Led Status	Internal controller with 4 driving modes	
	1	100% Continuous use
	2	200% Semi-continuous use
	3	400% Strobe use
	4	10-100% Analog Reg

Internal Controller with 4 driving modes

M12 5P Male Connector

Pin 1	+24V
Pin 2	Start NPN < 1 to 0V
Pin 3	GND
Pin 4	Start PNP > 3 to 24V
Pin 5	1-10V Analog Reg.

develop your custom solution

18 Standard Colours

Base IP65 Protection Degree

Variant IP67 Protection Degree

24 Vdc

Optional Polarizing Filter

CE RoHS

UK CA

FC

Illuminator Features :

- Project achieved by internal resources and Genesi skills;
- 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 with 10°,30°,60°Lenses or transparent, satin and opaline covers;
- Powerful and Fast strobe mode with energy buffering and strobe duration control, min. pulse from 3 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
Continuous use power	100 %		175 %				200 %				200 %			200 %				
Semi-continuous use power	200 %		175 %				200 %				200 %			180 %				
Strobe use power	400 %		330 %				400 %				400 %			400 %				

GP Part Number

Ex. Code : **GPXXX** **-YYY** **-WW1** **-WW2**

XXX	Base Lengths
GP06	6 cm
GP12	12 cm
GP23	23 cm
GP36	36 cm
GP46	46 cm
GP56	56 cm
GP66	66 cm
GPXXX	From 6 cm to 300 cm on demand

-YYY	Led Colours		EN 62471	
-6K	Base 6000K Cold White	White	RISK1	-L10
-4K	4000K Natural White			RISK2
-365	UV 365 nm	UV - A	RISK3	
-385	UV 385 nm			
-395	UV 395 nm			
-405	UV 405 nm			
-450	450 nm Royal Blue	Visible	RISK2	
-524	524 nm Green		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			
-YYY	Colour on demand			

-WW1	Cover variants
-T	Base Trasparent cover
-OP	Base Opaline cover BACKLIGHT FUNCTION
-ST	Satin cover
-T65	Transparent cover IP65
-L10	10° lens, trasparente cover
-L30	30° lens, trasparente cover
-L60	60° lens, trasparente cover
-45T	45° Lens + Transparent Cover
-TP	Polarizing filter + Trasparent cover ONLY STROBE USE
-WW1	Cover on demand

-WW2	Cables
	20cm cable + M12 5P M
-WW2	Cable on demand

Not all combinations are available

Part Number Examples:

GP23-6K-T

Power bar 4 Driving Modes 23 cm White 6000K Transparent cover
2160/14400Lm 0,6/4A 14/96W 20cm cable M12 M 5P

GP36-365-45T

Power bar 4 Driving Modes 36 cm UV365nm 45° lens + transparent
Cover 0,9/2,7A 22/65W 20cm cable M12 M 5P

GP102-850-OP

Power bar & backlight 4 Driving Modes 102 cm IR 850nm Opaline
cover 1/3,2A 24/77W 20cm cable M12 M 5P

Design & Production
Made in Italy



Genesi LUX®

GENESI ELETTRONICA SRL - VIA BACHELET, 3/A - 41057 SPILAMBERTO (MO) - ITALY

info@genesi-lux.it - TEL. +39 059785566 - www.genesi-elettronica.com

©All Rights Reserved GENESI ELETTRONICA - GP - GENESI POWER BAR



Organization with a
certified ISO 9001:2015
Quality Management System

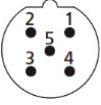
Rev. 03/25

OPERATING MODE

100% CONTINUOUS USE

Connector	PINS	Function	Description
M12 Male	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	-	

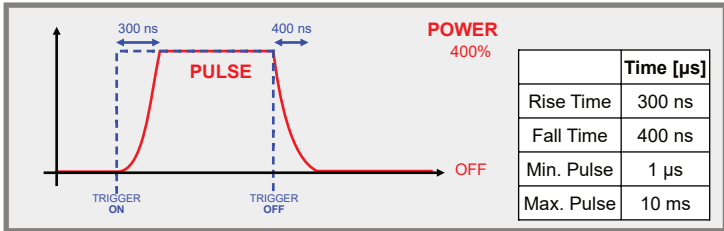
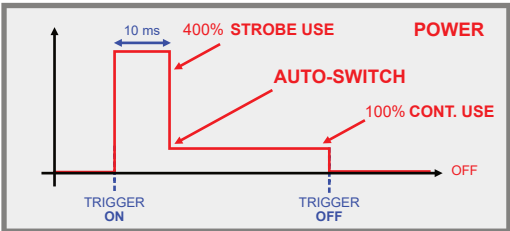
200 % SEMI-CONTINUOUS USE

Connector	PINS	Function	Description
M12 Male	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 → Ton_{max} = 60 s - Dt_{max} = 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 DT _{max} 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	

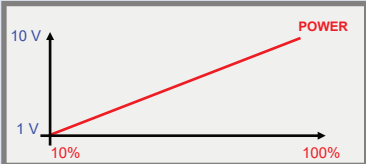
400% STROBE USE



Connector	PINS	Function	Description
M12 Male	1	+24 V	A) START NPN → PIN2: 0 to 1 V; B) START PNP → PIN4: 3 to 24 V; In this mode → Ton_{max} = 10 ms - Dt_{max} = 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
M12 Male	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	



400% 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°.

Design & Production
Made in Italy



Genesi LUX®
GENESI ELETTRONICA SRL - VIA BACHELET, 3/A - 41057 SPILAMBERTO (MO) - ITALY
info@genesi-lux.it - TEL. +39 059785566 - www.genesi-elettronica.com
©All Rights Reserved GENESI ELETTRONICA - GP - GENESI POWER BAR

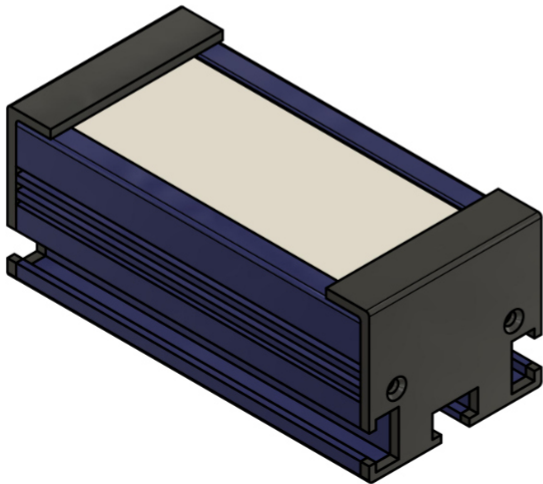
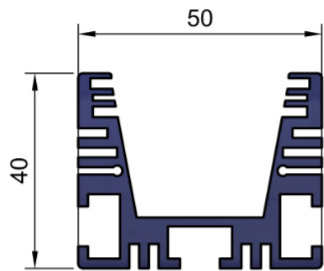


Organization with a
certified ISO 9001:2015
Quality Management System

Rev. 03/25

MECHANICAL DRAWING

Scale	Unit of measurement
1:2	mm
Weight GP12	
275 g	
Weight GP23	
430 g	
Weight GP66	
1.243 Kg	



For 3D mechanical drawing requests - info@genesi-lux.it

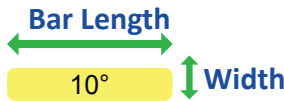
90°

LIGHT PROJECTION

- T		
Working distance	Width mm	Power W/m²
20 cm	TBD	TBD
40 cm	TBD	TBD
100 cm	TBD	TBD

60°

30°



- ST		
Working distance	Width mm	Power W/m²
20 cm	TBD	TBD
40 cm	TBD	TBD
100 cm	TBD	TBD

- L60		
Working distance	Width mm	Power W/m²
20 cm	TBD	TBD
40 cm	TBD	TBD
100 cm	TBD	TBD

- L30		
Working distance	Width mm	Power W/m²
20 cm	70	270-480-1080
40 cm	160	126-224-504
100 cm	380	28-50-112

- L10		
Working distance	Width mm	Power W/m²
20 cm	50	430-790-1580
40 cm	110	230-430-860
100 cm	200	95-173-346

- OP		
Working distance	Width mm	Power W/m²
20 cm	270	19-37-74
40 cm	540	5,3-10,4-21
100 cm	1300	1-1,8-3,6

- OP BACKLIGHT FUNCTION	
Working Distance	Luminance cd/m²
On Surface	48.000-88.000-115.000
homogeneity ± 5% for width 35 mm	

Powers related to the white colour homogeneity: ± 5%

Design & Production
Made in Italy



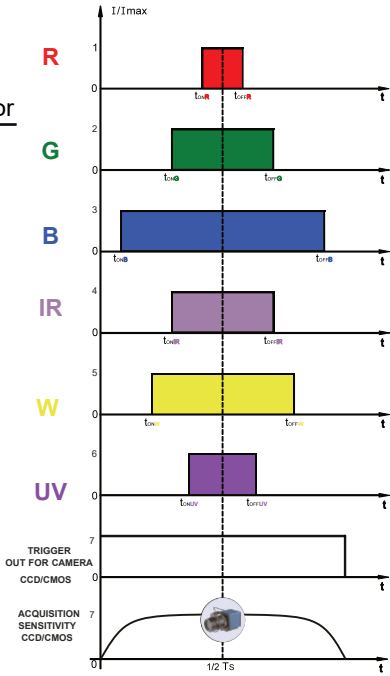
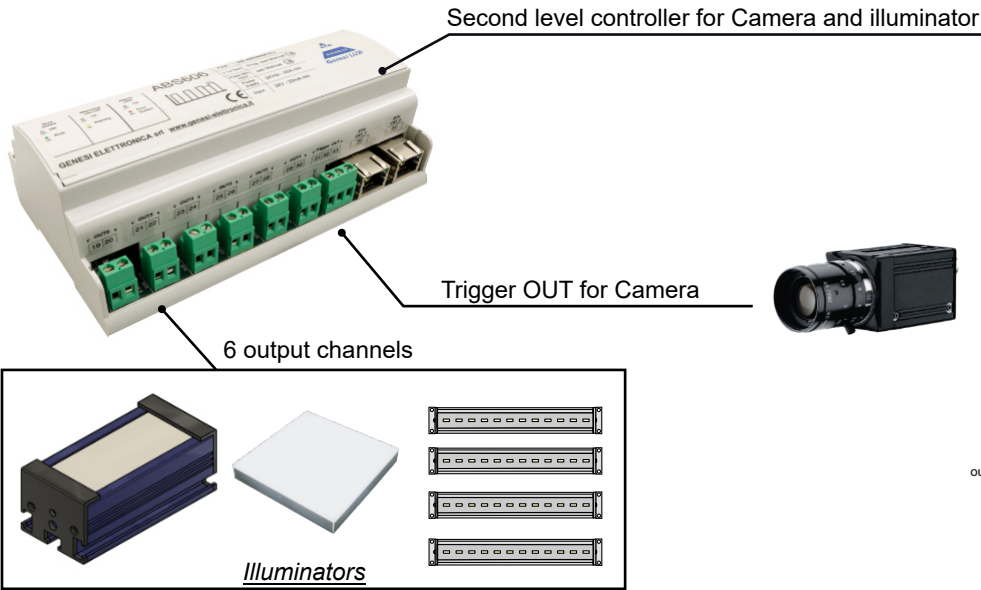
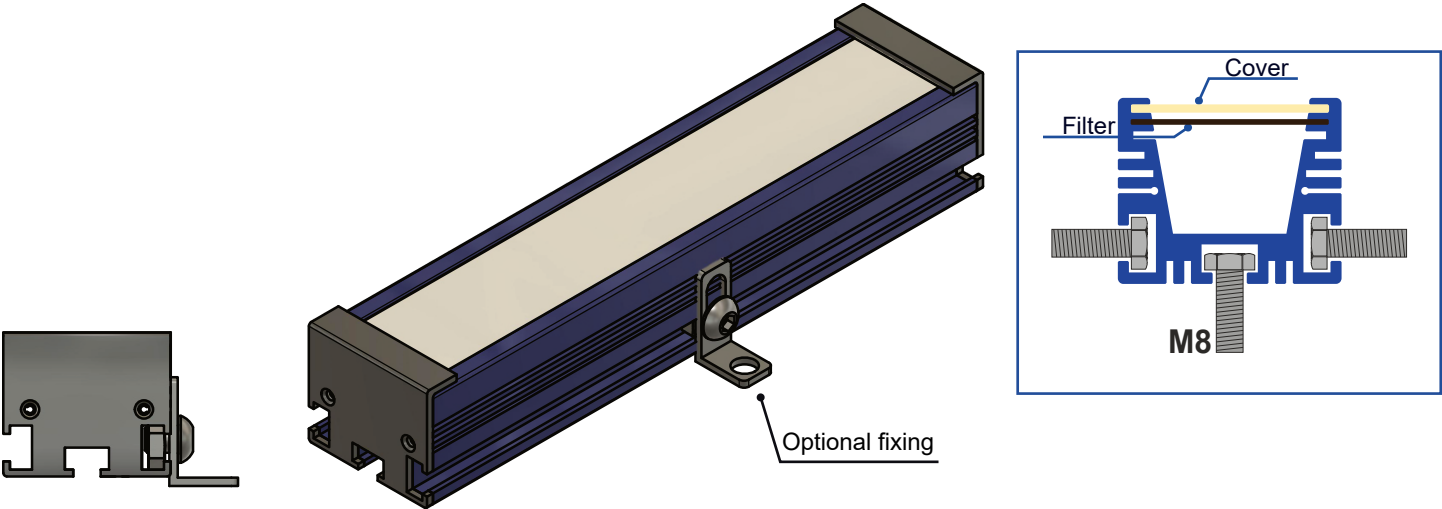
Genesi LUX®
GENESI ELETTRONICA SRL - VIA BACHELET, 3/A - 41057 SPILAMBERTO (MO) - ITALY
info@genesi-lux.it - TEL. +39 059785566 - www.genesi-elettronica.com
©All Rights Reserved GENESI ELETTRONICA - GP - GENESI POWER BAR



Rev. 03/25

ACCESSORIES

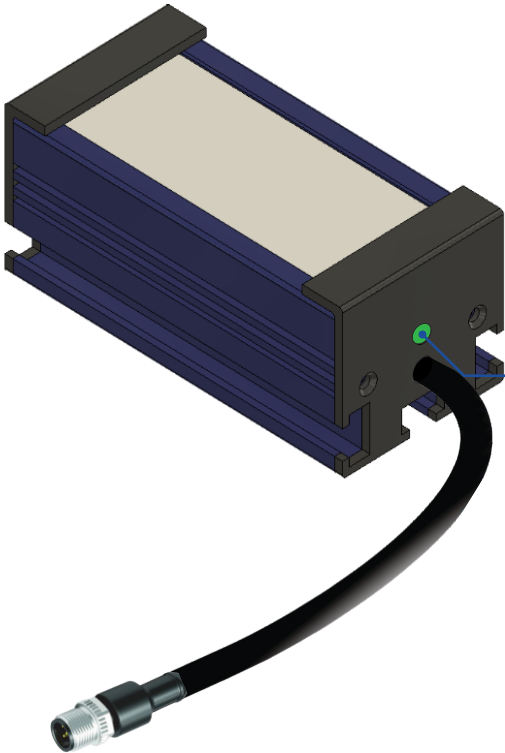
CODE	DESCRIPTION
GP-FIX	GP fixing kit (2pz)
GP-FIX-R	Rotating GP fixing kit (2 pz)
GE-M12F-5X050-2M	M12 connector 2 meter long female PVC cable
GE-M12F-5X050-5M	M12 connector 5 meter long female PVC cable
GE-M12F-5X050-10M	M12 connector 10 meter long female PVC cable
GE-ABS606E	LED Voltage Controller with 6 programmable channels and 10/100 Ethernet. Second level controller for Camera and illuminator.



Tailor-Made

Connector	PINS	Function	Description
M12 Male	1		
	2		
	3		
	4		
	5		

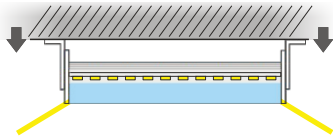
DEVELOP YOUR CUSTOM PRODUCT WITH OUR R&D TEAM



LED STATUS

Mode	Led colour signal		Function/note
Powered	Blue		-
100% Continuous use	Green		-
0-100% Analog Reg	Yellow		-
400% 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 or 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 55015:2013 + A1	
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.



Design & Production
Made in Italy



Genesi LUX®
GENESI ELETTRONICA SRL - VIA BACHELET, 3/A - 41057 SPILAMBERTO (MO) - ITALY
info@genesi-lux.it - TEL. +39 059785566 - www.genesi-elettronica.com
©All Rights Reserved GENESI ELETTRONICA - GP - GENESI POWER BAR



Rev. 03/25