PATENTED

# Thin line

### MODULAR SYSTEMS

ELECTRIFIED MODULAR SYSTEMS COMPLETE WITH INTEGRATED LIGHT



L&S Lighting PORMA E FUNZIONE®



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# Thin Line

Modular electrified system to decorate a space. Variety of configurations with refined aesthetics. Ideal for retail and home environments.

The core of the Thin Line system is an innovative electrified concept (patented) to move and mount illuminated shelving units with ease, in a practical and safe way without visible connections or cables.

The system is very versatile and can be integrated in commercial, office and residential environments, enhancing living areas and wardrobes. The minimal space between panels produce a clean and continuous surface.

### C€ PATENTED

FEATURES

modularity

versatility

 no need for connectors

IDEAL FOR
• clothing

eyewear

fashion

accessories • cosmetic • pharmacy • luxury retail



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A wide range of solutions and lighting systems to furnish wall panelling at your needs, enhancing each room with ease and without the use of cables:

- Electrifiable shelves brackets
- Linear lamps for wooden shelves
- Glass and aluminum shelves complete with integrated lighting
- Luminous mirrors
- Illuminated back panels, customizable with prints for use as a visual communication tool



### Aluminium uprights with electrified slotted rack

Thin Line system consists of 2 vertical uprights (A - Side / B - Central) in which is inserted an electrified (12-24V) slotted rack made of high load resistance carbon steel (C - for shelf brackets housing): the rack is completely isolated from the aluminum uprights by means of an extruded profile (D) and a spacer (E- mounted on the base), both made of V0 UL-94 fireproof polycarbonate. Uprights are pre-drilled to be reversible and mounted in any direction and can be directly fixed to the wall with screws (fixing holes F) or by means of galvanized carbon steel brackets for precision adjustment on uneven walls (G): the side profile can be used on both end of the wall panelling (left/right). Uprights are capped at the base with a steel plate complete with a setting foot (H), by means of which it is possible to adjust the height of the rack inside the upright for perfect shelves alignment. The Thin Line system is compatible with 10 to 23mm thick wooden backs (by the customer), fixed through the keyholes slots (I  $\rightarrow$  p.13)





Wall fixing



SIDE

5x60mm minimum and dowels suited to the wall material

### Double steel screw adjustable setting foot

Allows height adjustment of the electrified slotted rack (C) inside the upright for precision shelves alignment: the whole system is electrically isolated by means of a plastic spacer (E) placed between the rack and the adjustable foot.

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CENTRAL

### Polarized 12-24V electrified slotted rack

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Thin line system features an electrified (12-24V) carbon steel slotted rack to be inserted into the aluminum upright, completely isolated by means of a plastic extrusion (made of V0 UL-94 fireproof polycarbonate). To ensure the best electrical conduction, the steel rack is previously subjected to a special copper and nickel plating surface treatment. Each rack carries a single polarized electrical signal (+ or -) which is transmitted to the LED lamps installed on the shelves through the support brackets ( $\rightarrow$  p.14). In order to correctly power the installed luminaires, it is necessary to respect the polarity alternation on each upright for the entire length of the wall panelling. Each rack is supplied with a monopolar cable (red  $\bigcirc$  /  $\bigcirc$  black) secured by means of an anti-release safety rivet and complete with connector. For the mains connection, use a driver with the same voltage (12V or 24V) as the lamps installed on the shelf: the power (W) supplied by the driver must always be greater than the total load applied (number of lamps mounted on the shelf).



### Single LED Driver connection



### Multiple LED Driver connection

In case multiple LED Drivers are needed on the same Thin Line, Drivers must be connected together by means of a bridge cable.



Polarity alternation on each upright for the entire length of the wall panelling



Driver not included



### Wooden back panel slide and interlocking assembly

Thin Line system is compatible with wooden back panels with a thickness of 10, 16 or 19 mm, to be hung on the uprights through the dedicated holes (I), with collar screws fixed on the back with a spacer (M - specific for each panel thickness: approximately 4 screws on each side for a 3 meters high panels). Panels thicker than 10mm require a grooving on the side (N) to correct fit the upright. Panels with 23 mm thickness can be hung without spacer, by means of screws only.



The width of the panel (W) is related to the width of the used wooden shelf (L, thickness of the shelf support brackets excluded)





### Electrifiable shelves brackets





Made of 3mm steel; complete with shelf support pins (O) available for 25 thick shelves (others upon request) in linear and 20° inclined design, both in side (right and left) or central for in line shelves versions. To ensure the best electrical conduction, brackets are subjected to a special copper and nickel plating surface treatment, then subsequently covered with insulating epoxy paint layer (black or dark grey): electrification contacts (P/Q) are not painted, allowing the electrical 24V signal (• / •) to be carried through the bracket, from the electrified rack inside the upright to the lamp installed on the shelf. Each bracket is supplied complete with an antirelease shelf support plug (R/S) to be installed on the shelf (the number and type vary based on the version of the bracket).

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Max load: 15Kg

### Anti-release shelf support plug (linear)

Each linear bracket is supplied complete with anti-release plug (R) for frontal insertion of the shelf onto the support pins (O) on the brackets. Plugs must be mounted by means of screws (wooden shelves - side of the shelf requires milling - screws not included) or by pressure (glass shelves with aluminum frame - see p.19). The number of plugs included vary based on the type of bracket used (Left / Central / Right)



### Anti-release shelf support plug (inclined)

Each inclined bracket is supplied complete with anti-release plug (S) for insertion from above of wooden shelves onto the brackets' support pins (O). The side of the shelves requires specific milling for the plugs to be inserted. The number of plugs included vary based on the type of bracket used (Left / Central / Right)



### Lamps with integrated contacts

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Thin Line System integrates perfectly with SKY PIN, the collection of linear lamps complete with integrated spring loaded contacts: the lamp is installed in the shelf without wiring, aligned with the electrified contact point on the support brackets (**P**). It is recommended, for ease and flexibility during installation, to opt for the "depolarized" SKY PIN versions, which allows the installation of the lamp in any orientation (no need to respect the electrified support bracket's polarity). Upon request it is possible to customize the position on the support bracket of the elecrified contact point, thus choosing the installation point of the lamp on the shelf.







### Lamps with cabled connectors

For other lighting systems it is possible to use a pair of connectors cabled to the lamp: connectors must be installed on the sides of the shelf, aligned with the electrified contact points (**P**) on the support brackets. To optimize the wiring inside the shelf, both the positioning of the electrified contact point and the length of the lamp cable can be customized upon request.











### Glass shelf with aluminum frame

Anodized aluminium frame in black or titanium bronze finish, complete with integrated lighting with electrification contacts; 4mm transparent glass; compatible with linear shelves support brackets. Custom measures upon request.



### VIP luminous mirror

Anodized aluminium frame in black or titanium bronze finish; front light on 4 sides, with or without backlighting, and proximity swith mounted on the side; custom measures upon request.



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## Solaris light panel

Bespoke measure only; frameless; replaces or integrates the wooden back panel; customizable with prints for use as a visual communication tool.





### Wall panelling installation

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brackets





2 - Place the next upright (central): use a back panel as a 1 - Fix the first upright (side) to the wall, checking that it template to locate the correct position of the upright and is levelled and adjusting its verticality using the wall fixing mark the fixing points

### Wall panelling installation



5 - Connect the polarized cables to the LED Driver (to be fixed to the wall or inside junction box / inspectionable compartment)



**3** - Remove the back panel and fix the upright to the wall, adjusting its verticality using the wall fixing brackets



4 - Repeat steps 2 and 3 to complete wall mounting of all uprights, respect the polarity alternation on each upright for the entire length of the wall panelling



7 - Adjust the height of the slotted rack inside the uprights by means of the setting foot' screw: use two shelf brackets to check that the racks are leveled correctly (repeat the operation for the entire length of the wall panelling)



6 - Install the back panels on the uprights (sliding and anchorage): it is suggested to prepare an inspection hatch to access the LED Driver.

## Configuration system

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### A Complete side upright

Anodized aluminium side upright; cabled slotted rack ( $\bigcirc$  /  $\bigcirc$ ) complete with insulation profile; setting foot (not assembled). Extension cable ( $I \rightarrow p.28$ ) included with 🛛 rack. Screws and dowels for wall installation not included; other measures and finishes upon request



3000 mm		
Black	Ð	145TLL3000N
	0	145TLL3000N1
Aluminium	Ð	145TLL3000S
	0	145TLL3000S1



### **B** Complete central upright

Anodized aluminium central upright; cabled slotted rack (🕈 / 🗢) complete with insulation profile; setting foot (not assembled). Extension cable (I $\rightarrow$  p.28) included with 🛛 rack. Screws and dowels for wall installation not included; other measures and finishes upon request

Ð

0

Ð

0

3000 mm

Aluminium

Black



8
<u> </u>

### **C** Wall fixing brackets

	tets for 3m upright. els not included.		
3 pcs			
Side	145TLK001	SIDE	CENTRAL
Central	145TLK002		

### **D** Back panel fixing screw



### E Anti-release shelf support plug

Included with linear shelves support brackets (plug number depends on bracket's type). Screws not included

Left support bracket	2 pcs
Central support bracket	4 pcs
Right support bracket	2 pcs





### F Anti-release shelf support plug

Included with inclined shelves support brackets (plug number depends on bracket's type).

Left inclined support bracket	2 pcs	
Central inclined support bracket	4 pcs	
Right inclined support bracket	2 pcs	





### **G** Electrifiable shelves brackets (linear)

Made of painted steel (black or dark grey); other measures and finishes upon request; non electrifiable version on request.



W 300 x H 25mm (shelf dimension)		
Nero	Left	145RL0300SXN
	Central	145RC0300N
	Right	145RL0300DXN
Grigio	Left	145RL0300SXM
	Central	145RC0300M
	Right	145RL0300DXM

W 500 x H 25mm (shelf dimension)		
Nero	Left	145RL0500SXN
	Central	145RC0500N
	Right	145RL0500DXN
Grigio	Left	145RL0500SXM
	Central	145RC0500M
	Right	145RL0500DXM

### H Electrifiable shelves brackets (inclined)

Made of painted steel (black or dark grey); other measures and finishes upon request; non electrifiable version on request.

W 300 x H 25mm (shelf dimension)		
Nero	Left	145RIL0300SXN
	Central	145RIC0300N
	Right	145RIL0300DXN
Grigio	Left	145RIL0300SXM
	Central	145RIC0300M
	Right	145RIL0300DXM

W 500 x H 25mm (shelf dimension)		
Nero	Left	145RIL0500SXN
	Central	145RIC0500N
	Right	145RIL0500DXN
Grigio	Left	145RIL0500SXM
	Central	145RIC0500M
	Right	145RIL0500DXN





Shelves insertions on support brackets from above, anti-release shelf support plugs (F - p.26) included

### Extension cable



### **L** 6 Ways distribution box



### M Bridge cable

For complete uprights connection to multiple Drivers. Diagram  $\rightarrow$  p.11 1 pcs 6CA6664

### **N** MEC Driver cable



### O SKY PIN

Linear rec screen cover a loaded contac	nd depo	1 0
600mm 4,16W	2700K	182S0600CW
	4000K	182S0600CN
900mm 6,56W	2700K	182S0900CW
	4000K	182S0900CN

### **P** Glass shelf with aluminum frame

Anodized aluminium frame in black or titanium bronze finish, complete with integrated lighting with electrification contacts; 4mm transparent glass; compatible with linear shelves support brackets. Custom measures upon request.



600 x 300 mm		4,16W
Black	2700K	193TL0001WN
	4000K	193TL0001NN
Titanium Bronze	2700K	193TL0001WBT
	4000K	193TL0001NBT
900 x 30	0 mm	6,56W
Black	2700K	193TI 0002WN

Black	2700K	193TL0002WN
	4000K	193TL0002NN
Titanium Bronze	2700K	193TL0002WBT
	4000K	193TL0002NBT

dimensions in mm

4,16W	600 x 500 mm	
193TL0003WN	2700K	Black
193TL0003NN	4000K	
193TL0003WBT	2700K	Titanium Bronze
193TL0003NBT	4000K	

900 x 500 mm		6,56W
Black	2700K	193TL0004WN
	4000K	193TL0004NN
Titanium Bronze	2700K	193TL0004WBT
	4000K	193TL0004NBT

## **Q** VIP luminous mirror

Anodized aluminium frame in black or titanium bronze finish; front light on 4 sides, with or without backlighting, and proximity swith mounted on the side (double switch in backlit models); custom measures upon request.



Black	2700K	19440900W0600N			
	4000K	19440900N0600N			
Titanium Bronze	2700K	19440900W0600B1			
	4000K	19440900N0600B1			
900 x 600 with backlighting 60W					
900 x 60	0 with ba	cklighting 60			
<b>900 x 60</b> Black	00 with ba	acklighting 60V 19480900W0600N			
Black Titanium	2700K 4000K	19480900W0600N			
Black	2700K 4000K	19480900W0600N 19480900N0600N			

44W

900 x 600

1800 x 6	00	66W
Black	2700K	19441800W0600NI
	4000K	19441800N0600NI
Titanium	2700K	19441800W0600BTI
Bronze	4000K	19441800N0600BTI

1800 x 600 with backlighting 98W				
Black	2700K	19481800W0	600NI	
	4000K	19481800NC	600NI	
Titanium Bronze	2700K	19481800W06	600BTI	
	4000K	19481800N06	SOOBTI	



dimensions in mm

NOTES



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