







## SMOOTH® 85

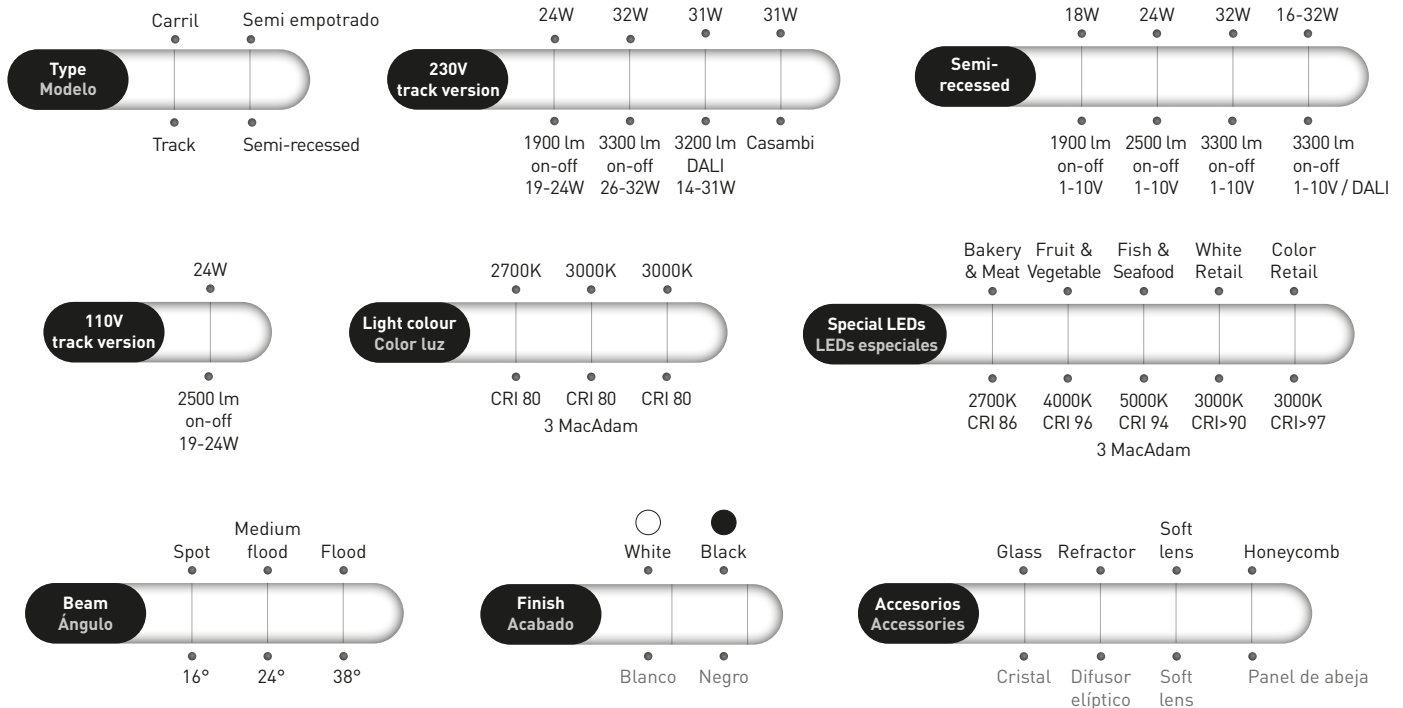


# SMOOTH® 85

- Track and semi-recessed types
- 230V and 110V versions
- Control Type: On-off, DALI, 1-10V and Casambi
- 3 beam angles: 16°, 24 and 38°
- Lumens output: from 1900lm to 3300lm
- Spotlight efficiency: 105 lm/W
- Integrated multi-power driver inside track adapter
- Spotlight with glass included for easy maintenance
- Special LEDs to improve the food and retail colors
- Smooth design without screws and slots
- Accessories: honeycomb, refractor and soft lens



- Modelos para carril y semi empotrados
- Versiones a 230V y 110V
- Tipo de Control: On-off, DALI, 1-10V y Casambi
- 3 ángulos de apertura: 16°, 24 y 38°
- Flujo luminoso: de 1900lm hasta 3300lm
- Eficiencia del proyector: 105 lm/W
- Driver multi-potencia integrado en el adaptador a carril
- Proyector con cristal incluido para facilitar el mantenimiento
- LEDs especiales para potenciar los colores en alimentación y retail
- Diseño compacto, sin tornillos y ranuras
- Accesorios: panel de abeja, difusor elíptico, soft lens



The standard track and semi-recessed version is delivered with glass.  
La versión estándar del proyector a carril y semi empotrado se suministra con cristal.

The standard semi-recessed version is delivered without driver.  
La versión estándar del proyector semi empotrado se suministra sin driver.

The accessories (refractor, soft lens and honeycomb) must be ordered together with the luminaire and it is not compatible with the glass.  
Los accesorios (difusor elíptico, soft lens y el panel de abeja) debe pedirse junto con la luminaria y no es es compatible con el cristal.

**SPECIFICATIONS**  
**CARACTERÍSTICAS**

IP20	230V AC	110V AC	Track spotlight	Driver Included Track spotlight	Semi-recessed	Driver not Included Semi-recessed	on/off DALI 1-10V	CASAMBI	AL Housing	Glass included	Ta min -30°C -22°F Ta +40°C max +104°F	CE
------	---------	---------	-----------------	---------------------------------	---------------	-----------------------------------	-------------------	---------	------------	----------------	---	----

Smooth® 85			
Measures	Ø85 x 152 x 225 mm		
Weight	0,6 kg		
<b>32W (850mA)</b>			
Color temperatures	<b>2700K - CRI 80</b>	<b>3000K - CRI 80</b>	<b>4000K - CRI 80</b>
Lumens output	16° - 3110 lm 24° - 3064 lm 38° - 3058 lm	16° - 3240 lm 24° - 3192 lm 38° - 3158 lm	16° - 3370 lm 24° - 3320 lm 38° - 3312 lm
Luminaire efficiency	95 to 97 lm/W	98 to 101 lm/W	103 to 105 lm/W
<b>24W (650mA)</b>			
Color temperatures	<b>2700K - CRI 80</b>	<b>3000K - CRI 80</b>	<b>4000K - CRI 80</b>
Lumens output	16° - 2510 lm 24° - 2472 lm 38° - 2464 lm	16° - 2614 lm 24° - 2575 lm 38° - 2567 lm	16° - 2719 lm 24° - 2678 lm 38° - 2670 lm
Luminaire efficiency	102 to 105 lm/W	107 to 109 lm/W	111 to 113 lm/W

Smooth® 85 Special LEDs					
Measures	Ø85 x 152 x 225 mm				
Weight	0,6 kg				
<b>32W (850mA)</b>					
Color temperatures	<b>Bakery &amp; Meat 2700K - CRI 86</b>	<b>Fruit &amp; Vegetable 4000K - CRI 96</b>	<b>Fish &amp; Seafood 5000K - CRI 94</b>	<b>White Retail 3000K - CRI&gt; 90</b>	<b>Color Retail 3000K - CRI&gt; 97</b>
Lumens output	16° - 2177 lm 24° - 2145 lm 38° - 2140 lm	16° - 2528 lm 24° - 2490 lm 38° - 2484 lm	16° - 2555 lm 24° - 2520 lm 38° - 2513 lm	16° - 2875 lm 24° - 2832 lm 38° - 2826 lm	16° - 2690 lm 24° - 2652 lm 38° - 2645 lm
Luminaire efficiency	67 to 68 lm/W	77 to 79 lm/W	78 to 80 lm/W	88 to 90 lm/W	82 to 84 lm/W
<b>24W (650mA)</b>					
Color temperatures	<b>Bakery &amp; Meat 2700K - CRI 86</b>	<b>Fruit &amp; Vegetable 4000K - CRI 96</b>	<b>Fish &amp; Seafood 5000K - CRI 94</b>	<b>White Retail 3000K - CRI&gt; 90</b>	<b>Color Retail 3000K - CRI&gt; 97</b>
Lumens output	16° - 1757 lm 24° - 1730 lm 38° - 1725 lm	16° - 2040 lm 24° - 2008 lm 38° - 2003 lm	16° - 2112 lm 24° - 2060 lm 38° - 2054 lm	16° - 2375 lm 24° - 2317 lm 38° - 2310 lm	16° - 2223 lm 24° - 2169 lm 38° - 2162 lm
Luminaire efficiency	72 to 74 lm/W	83 to 85 lm/W	86 to 88 lm/W	96 to 99 lm/W	90 to 92 lm/W



Architect: Silvia Contreras

Color temperature conform to ANSI C78.377A.  
Lumens measurement conform to LM-79-08.  
Lumens maintenance conform to LM-80-08.

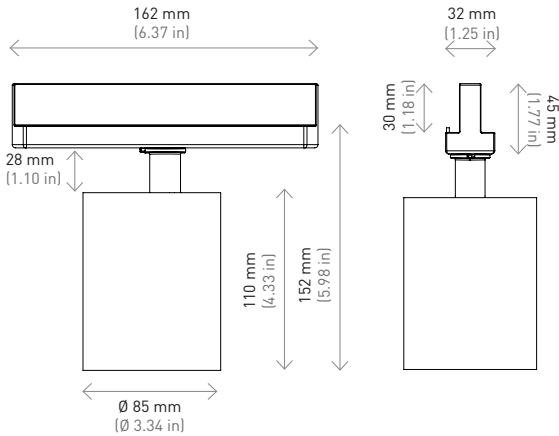
Temperatura de color según normativa ANSI C78.377A.  
Medición lumens según normativa LM-79-08.  
Mantenimiento lumens según normativa LM-80-08.

CASAS Store,  
Bilbao, Spain

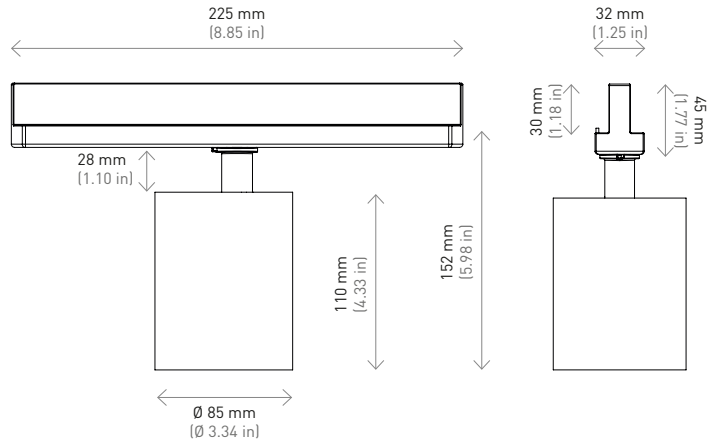
## MEASURES MEDIDAS

### SMOOTH® TRACK SPOTLIGHT

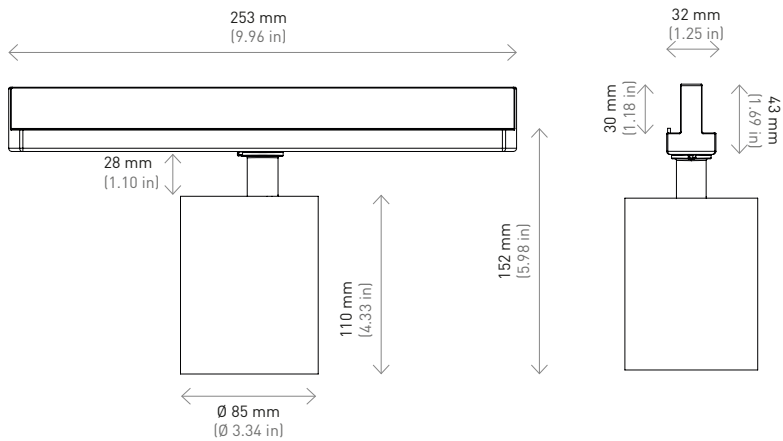
**Smooth® 19-24W (On-Off)**  
220-240V AC  
110-120V AC



**Smooth® 26-32W (On-Off)**  
220-240V AC

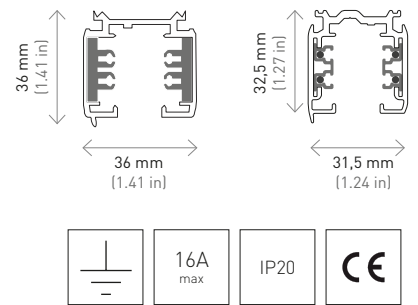


**Smooth® 14-31W (DALI)**  
220-240V AC

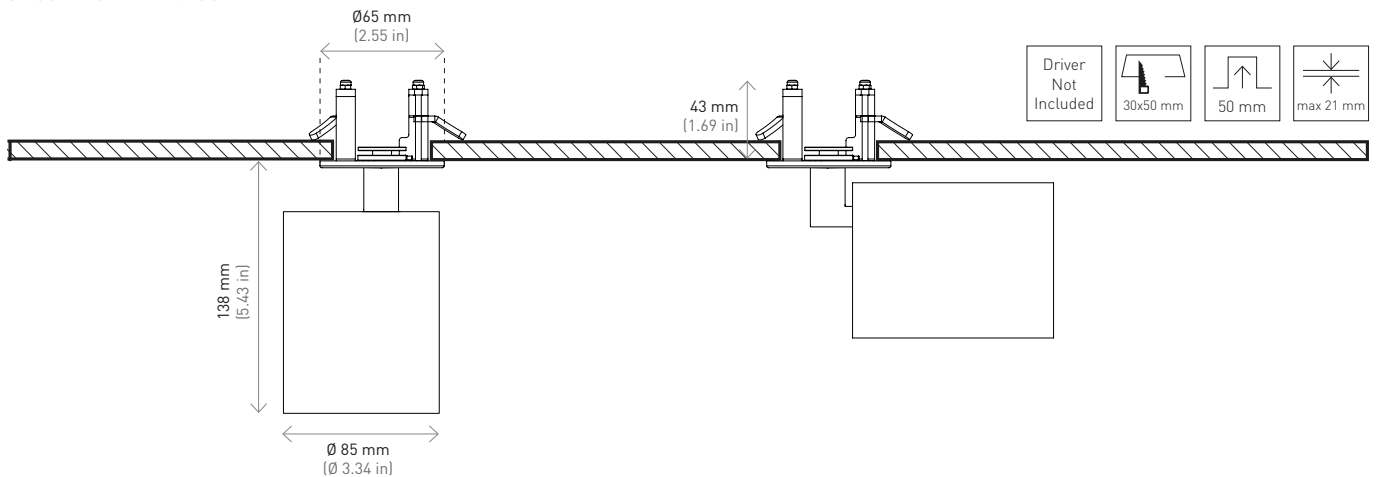


**On-Off Track (3-phase)**  
On-Off Carril (3 fases)

**DALI Track**  
Carril DALI



### SMOOTH® SEMI-RECESSED





## FINISHES ACABADOS

In order to satisfy all our customers, two different finishes are available: white and black.  
Con el fin de satisfacer las necesidades de nuestros clientes, está disponible en dos acabados: blanco y negro.



White.  
Blanco.

(RAL 9003)



Black.  
Negro.

(RAL 9005)

## ROTATION ROTACIÓN



## DETAILS DETALLES



Smooth semi-recessed. Design without screws and slots.  
Smooth semi empotrado. Diseño compacto, sin tornillos y ranuras.

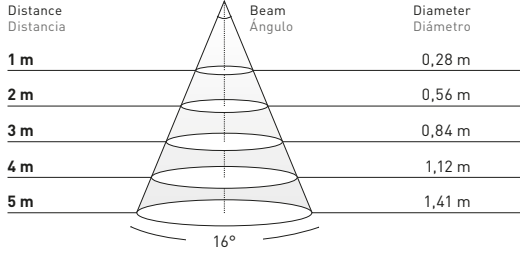


Passive heat sink.  
Disipador de calor pasivo.

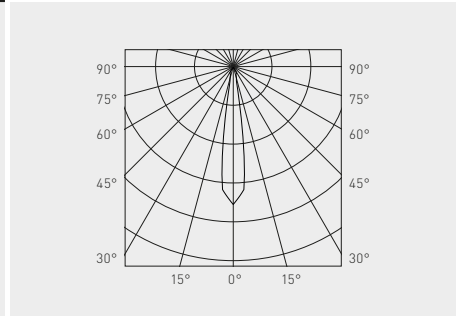
## LIGHT DISTRIBUTION CURVES FOTOMETRÍAS

### Smooth® 85

32W 16°

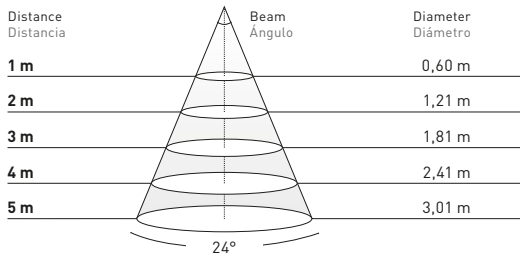


2700K	3000K	4000K
CRI 80	CRI 80	CRI 80
21787 lux	22695 lux	23603 lux
5447 lux	5674 lux	5901 lux
2421 lux	2522 lux	2623 lux
1361 lux	1418 lux	1475 lux
872 lux	908 lux	944 lux

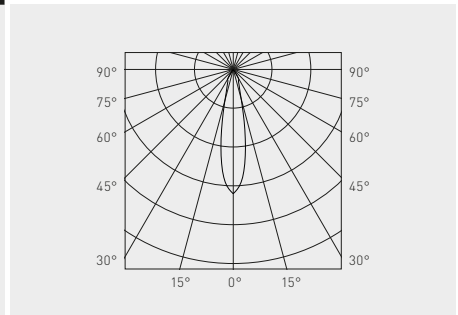


### Smooth® 85

32W 24°

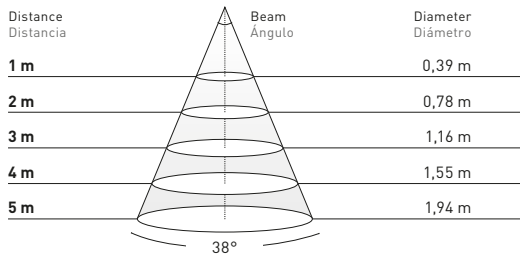


2700K	3000K	4000K
CRI 80	CRI 80	CRI 80
12322 lux	12835 lux	13348 lux
3081 lux	3209 lux	3337 lux
1369 lux	1426 lux	1483 lux
770 lux	802 lux	834 lux
492 lux	513 lux	534 lux

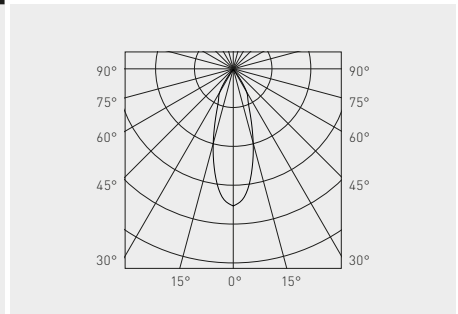


### Smooth® 85

32W 38°

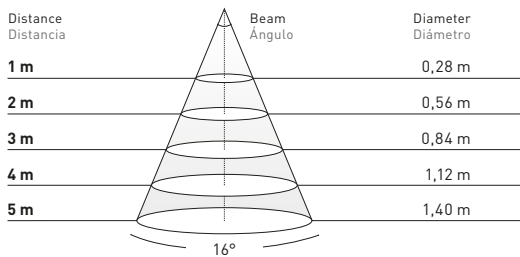


2700K	3000K	4000K
CRI 80	CRI 80	CRI 80
6602 lux	6877 lux	7152 lux
1650 lux	1719 lux	1788 lux
733 lux	764 lux	795 lux
413 lux	430 lux	447 lux
264 lux	275 lux	286 lux

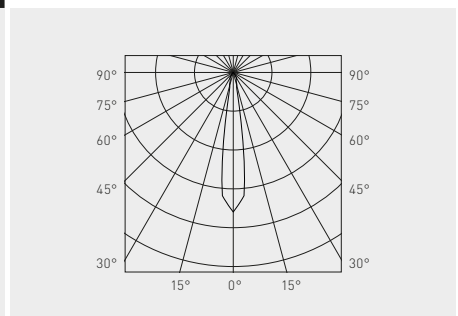


### Smooth® 85

24W 16°



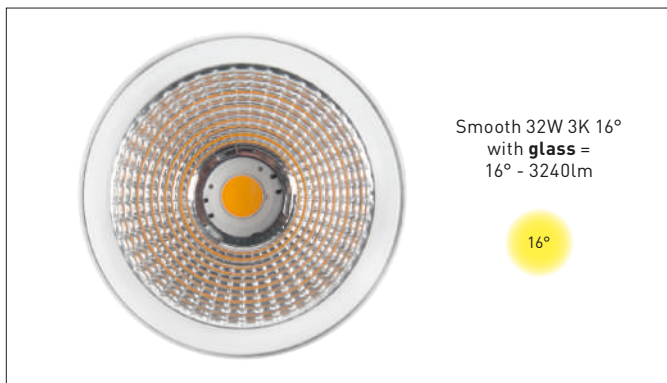
2700K	3000K	4000K
CRI 80	CRI 80	CRI 80
17511 lux	18241 lux	18971 lux
4378 lux	4560 lux	4742 lux
1546 lux	2027 lux	2108 lux
1094 lux	1140 lux	1186 lux
701 lux	730 lux	759 lux



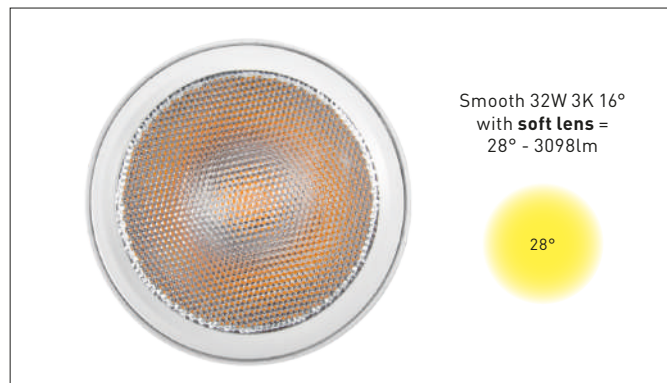
Data calculated with **Smooth® 85 with clear diffuser**.  
Lumen measurement complies with **UNE-EN 13032 / IES LM-79-08** testing procedures.  
Light distribution curves are available at [www.mclight.com](http://www.mclight.com).  
Due to continuous improvements and innovations, specifications may change without notice.

Datos calculados con **Smooth® 85 con difusor transparente**.  
Ensayado bajo las especificaciones de la norma **UNE-EN 13032 / IES LM-79-08**.  
Fotometrías disponibles en [www.mclight.com](http://www.mclight.com).  
Debido a las continuas mejoras e innovaciones, las especificaciones pueden cambiar sin previo aviso.

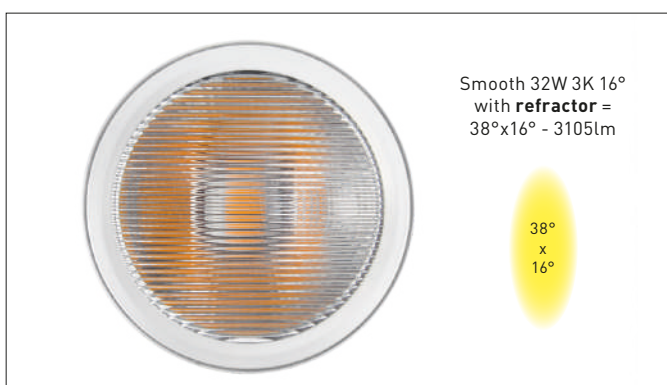
**ACCESSORIES**  
ACCESORIOS



Glass Cristal (Standard)



Soft lens



Refractor Difusor elíptico

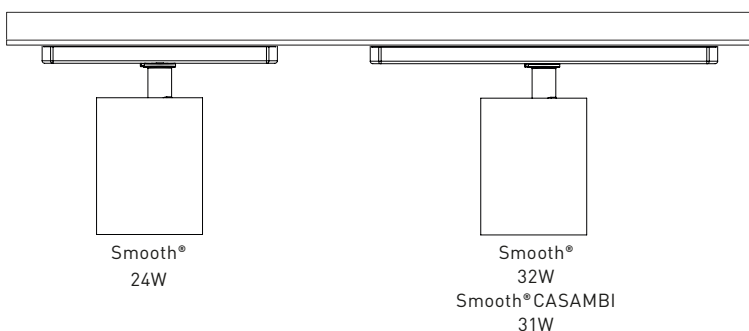


Honeycomb Panel de abeja

**CONNECTIONS**  
CONEXIONES

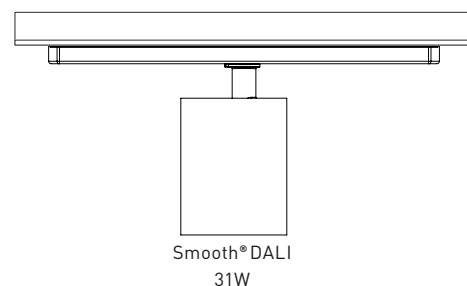
**On-Off track (16A, 220-250V, 3 phases)**

Carril On-Off (16A, 220-250V, 3 fases)

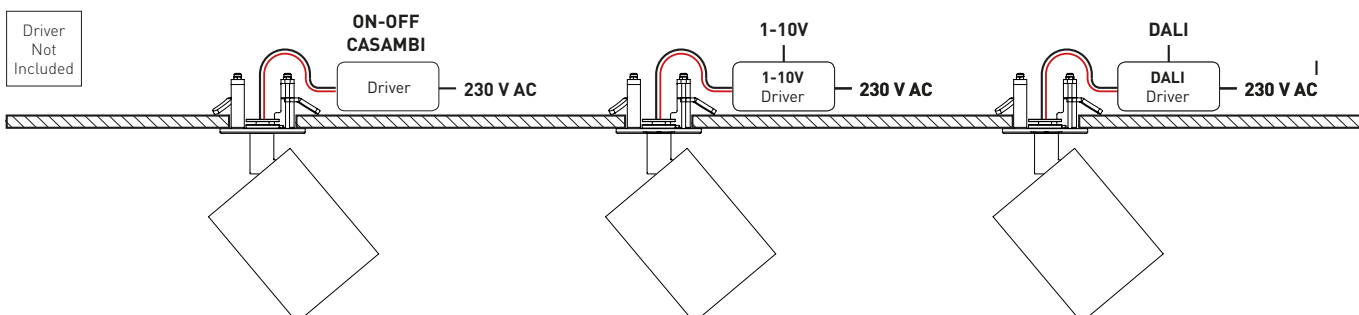


**DALI track (16A, 400V)**

Carril DALI (16A, 400V)

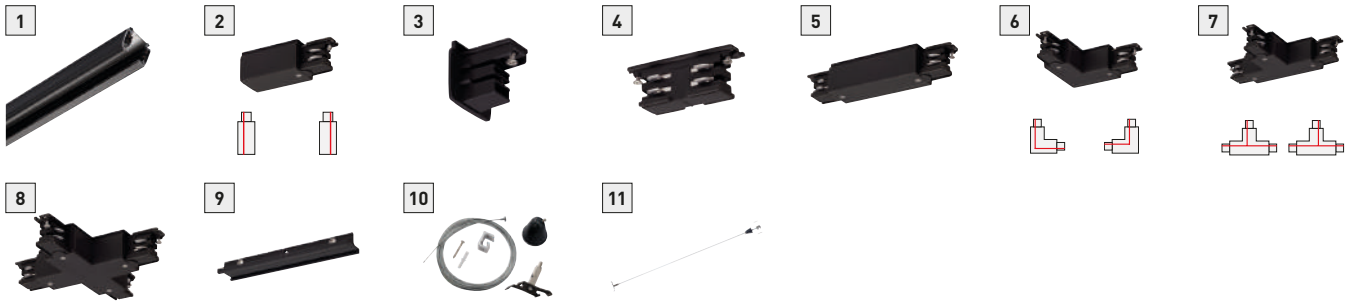


**Smooth® Semi-recessed**





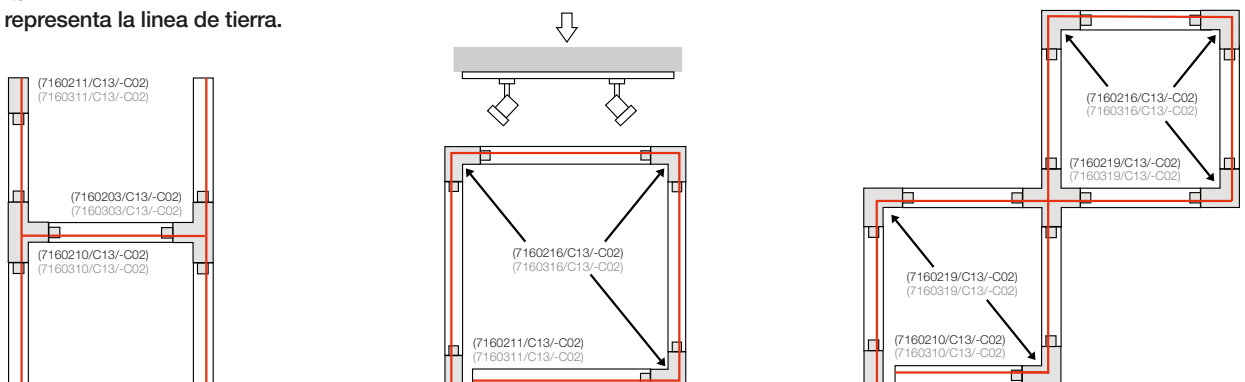
## ACCESSORIES REFERENCES REFERENCIAS ACCESORIOS



On/Off (3F)	DALI			
7160201/C13	7160301/C13	Track surface,1m (black)	Carril superficie, 1m. (negro)	1
7160201/C02	7160301/C02	Track surface,1m (white)	Carril superficie, 1m. (blanco)	
7160202/C13	7160302/C13	Track surface,2m (black)	Carril superficie, 2m. (negro)	
7160202/C02	7160302/C02	Track surface,2m (white)	Carril superficie, 2m. (blanco)	
7160203/C13	7160303/C13	Track surface,3m (black)	Carril superficie, 3m. (negro)	
7160203/C02	7160303/C02	Track surface,3m (white)	Carril superficie, 3m. (blanco)	
7160210/C13	7160310/C13	Earth electrode right (black)	Alimentador, tierra derecha (negro)	2
7160210/C02	7160310/C02	Earth electrode right (white)	Alimentador, tierra derecha (blanco)	
7160211/C13	7160311/C13	Earth electrode left (black)	Alimentador, tierra izquierda (negro)	
7160211/C02	7160311/C02	Earth electrode left (white)	Alimentador, tierra izquierda (blanco)	
7160212/C13	7160312/C13	End Cap (black)	Tapa final (negro)	3
7160212/C02	7160312/C02	End Cap (white)	Tapa final (blanco)	
7160213/C13	7160313/C13	Long connector (black)	Conector longitudinal (negro)	4
7160213/C02	7160313/C02	Long connector (white)	Conector longitudinal (blanco)	
7160214/C13	7160314/C13	Long connector with feed-in capability (black)	Conector longitudinal, con alimentador (negro)	5
7160214/C02	7160314/C02	Long connector with feed-in capability (white)	Conector longitudinal con alimentador (blanco)	
7160215/C13	7160315/C13	L-connector, earth electrode inside (black)	Conector en L, tierra interior (negro)	6
7160215/C02	7160315/C02	L-connector, earth electrode inside (white)	Conector en L, tierra interior (blanco)	
7160216/C13	7160316/C13	L-connector, earth electrode outside (black)	Conector en L, tierra exterior (negro)	
7160216/C02	7160316/C02	L-connector, earth electrode outside (white)	Conector en L, tierra exterior (blanco)	
7160217/C13	7160317/C13	T-connector, earth electrode left (black)	Conector en T, tierra izquierda (negro)	7
7160217/C02	7160317/C02	T-connector, earth electrode left (white)	Conector en T, tierra izquierda (blanco)	
7160218/C13	7160318/C13	T-connector, earth electrode right (black)	Conector en T, tierra derecha (negro)	
7160218/C02	7160318/C02	T-connector, earth electrode right (white)	Conector en T, tierra derecha (blanco)	
7160219/C13	7160319/C13	X-connector (black)	Conector en X (negro)	8
7160219/C02	7160319/C02	X-connector (white)	Conector en X (blanco)	
7160230/C13	7160330/C13	Joint connector (black)	Unión mecánica carriles (negro)	9
7160230/C02	7160330/C02	Joint connector (white)	Unión mecánica carriles (blanco)	
7160231/C13	7160331/C13	Wire suspension (black)	Cable de suspensión 5m "on/off"   3m "DALI" (negro)	10
7160231/C02	7160331/C02	Wire suspension (white)	Cable de suspensión 5m "on/off"   3m "DALI" (blanco)	
7160232/C13	7160332/C13	Pendant suspension (black)	Suspensión rígida 1m "on/off"   1m "DALI" (negro)	11
7160232/C02	7160332/C02	Pendant suspension (white)	Suspensión rígida 1m "on/off"   1m "DALI" (blanco)	

Vistas en planta.

La línea roja representa la línea de tierra.



**REFERENCES**  
**REFERENCIAS**
**7161** X X X /XX/XXX

**COLOR COLOR**

/80/2K7	2700K
/80/3K	3000K
/80/4K	4000K
/86/2K7	Bakery & Meat
/96/4K	Fruit & Vegetable
/94/5K	Fish & Seafood
/90/3KX	White Retail
/97/3K	Color Retail

**BEAM ÁNGULO**

0	16° - Spot
1	24° - Medium Flood
2	38° - Flood

**FINISHES ACABADOS**

2	Black Negro
3	White Blanco

**TYPE MODELO**

0	Carril
2	Semi empotrado

**OPTIONS**  
**OPCIONES**
**CONTROL TRACK SPOTLIGHT CONTROL PROYECTOR CARRIL**

On-Off	19-24W	230V AC	
On-Off	19-24W	110V AC	
On-Off	26-32W	230V AC	<b>(Standard)</b>
DALI	14-31W	230V AC	
CASAMBI	14-31W	230V AC	

The standard track spotlight version is delivered with multi-power driver 26-32W On-Off 230 V AC.

La versión estándar del proyector a carril se suministra con driver 26-32W On-Off 230 V AC.

**ACCESSORIES ACCESORIOS**

Glass Cristal	<b>(Standard)</b>
Refractor Difusor elíptico	
Soft lens Soft lens	
Honeycomb Panel de abeja	

The standard spotlight version is delivered with glass.

The accessories (refractor, soft lens and honeycomb) must be ordered together with the luminaire and it is not compatible with the glass.

The standard semi-recessed spotlight version is delivered without driver.

La versión estándar del proyector se suministra con cristal.

Los accesorios (difusor elíptico, soft lens y el panel de abeja) debe pedirse junto con la luminaria y no es compatible con el cristal.

La versión estándar del proyector semi empotrado se suministra sin driver.

**TABLE DIP-SWITCH TRACK SPOTLIGHT**  
**TABLA DIP-SWITCH PROYECTOR CARRIL**
**Smooth® 19-24W (On-Off)**

DIP-SWITCH	1	2
500 mA (18,5W)	-	-
550 mA (20 W)	ON	-
600 mA (22 W)	-	ON
650 mA (24W)	ON	ON

The standard version with multi-power driver is supplied with the DIP switch at maximum power

La versión estándar con driver multi-potencia se suministran con el DIP switch at máximo de potencia

**Smooth® 26-32W (On-Off)**

DIP-SWITCH	1	2
700 mA (26W)	-	-
750 mA (28W)	ON	-
800 mA (30W)	-	ON
850 mA (32W)	ON	ON

**Smooth® 14-31W (DALI)**

DIP-SWITCH	1	2	3	4
325 mA (14W)	-	-	-	-
350 mA (15,5W)	-	-	-	ON
375 mA (16,5W)	-	-	ON	-
400 mA (17,5W)	-	-	ON	ON
425 mA (18,5W)	-	ON	-	-
450 mA (19,5W)	-	ON	-	ON
475 mA (21W)	-	ON	ON	-
500 mA (22W)	-	ON	ON	ON

DIP-SWITCH	1	2	3	4
525 mA (23W)	ON	-	-	-
550 mA (24W)	ON	-	-	ON
575 mA (25W)	ON	-	ON	-
600 mA (26,5W)	ON	-	ON	ON
625 mA (27,5W)	ON	ON	-	-
650 mA (28,5W)	ON	ON	-	ON
675 mA (29,5W)	ON	ON	ON	-
700 mA (31W)	ON	ON	ON	ON



To control the luminaires via Bluetooth see page 312  
 Para controlar las luminarias via Bluetooth consultar página 312

**DRIVERS REFERENCES FOR SEMI RECESSED SPOTLIGHT**  
**REFERENCIAS DRIVERS PARA PROYECTOR SEMI EMPOTRADO**

1



2



3



Drivers 500mA				
3090773	x	x	On-Off Led Driver 500mA 16W	Led Driver 500mA 16W On-Off
3090774	x	x	1-10V Led Driver 500mA 18W	Led Driver 500mA 18W 1-10V
Drivers 700mA				
3091009		x	On-Off Led Driver 700mA 3.5W-30W	Led Driver 700mA 3.5W-30W On-Off
3090777		x	1-10V Led Driver 700mA 24W	Led Driver 700mA 24W 1-10V
Drivers 900mA				
3090779		x	On-Off Led Driver 900mA 32W	Led Driver 900mA 32W On-Off
3090780		x	1-10V Led Driver 900mA 32W	Led Driver 900mA 32W 1-10V
Multi-power driver 300-900 mA				
3091012	x	x	On-Off Led Driver Multi-power 300mA-1050mA 13W-40W	Led Driver Multi-power 300mA-1050mA 13W-40W On-Off
3090704	x	x	DALI / 1-10V / PUSH Led Driver Multi-power Max.50W	Led Driver Multi-power Max.50W DALI / 1-10V / PUSH
Drivers multi-power Bluetooth				
7150930	x	x	Casambi Led Driver Multi-power 300mA-1050mA 38W	Led Driver Multi-power 300mA-1050mA 38W Casambi
7150931	x	x	Zigbee Led Driver Multi-power 300mA-1050mA 38W	Led Driver Multi-power 300mA-1050mA 38W Zigbee