# OT FIT 8/220-240/180 CS I MINI (NEW)

OPTOTRONIC FIT CS MINI | Compact constant current LED driver - Non dimmable



# Product family features

Supply voltage: 220...240 V
Line frequency: 50 Hz | 60 Hz
Line voltage: 198...264 V

According to EN 61347-1, 61347-2-13, 62384
RI suppression according to CISPR 15
Line harmonics according to IEC 61000-3-2

- Immunity according to IEC 61547

### Product family benefits

- Small housing for flexible luminaire designs
- Higher quality of light thanks to < 3% output ripple current
- Operating temperature: up to 60 °C
- User flexibility with four different output currents from one driver
- Flexible current selection via DIP switch
- Reversible overtemperature, overload, short-circuit and open-circuit protection
- High efficiency (up to 90%)

# Areas of application

- Extra small design for downlights, spotlights and other indoor luminaries
- Suitable for luminaires of protection classes I and II
- Suitable for indoor SELV installations



#### Technical data

#### Electrical data

Nominal input voltage	220240 V
Nominal output current	90/120/150/180 mA <sup>1)</sup>
Nominal output power	2.77.6 W
Nominal output voltage	3042 V
Maximum output power	7.6 W
Mains frequency	50/60 Hz
Input voltage AC	198264 V <sup>2)</sup>
Default output current	180 mA
Device power loss	1.2 W <sup>3)</sup>
Efficiency in full-load	86 % <sup>4)</sup>
Galvanic isolation primary/secondary	SELV
Inrush current	< 16 A
Max. ECG no. on circuit breaker 10 A (B)	36
Max. ECG no. on circuit breaker 16 A (B)	60
Output current tolerance	±7.5 % <sup>5)</sup>
Output PSTLM	≤1
Output ripple current (100 Hz)	< 3 % <sup>6)</sup>
Output SVM	≤0.4
Power factor λ	0.50C0.95 <sup>7)</sup>
Protective conductor current	<0.7 mA
Surge capability (L-N)	1 kV
Surge capability (L/N-Ground)	2 kV
Total harmonic distortion	< 15 % <sup>8)</sup>
U-OUT (working voltage)	60 V
Current set	DipSwitch

<sup>1) ±7.5%</sup> 

<sup>2)</sup> Safety voltage range

<sup>3)</sup> At 230 V, Input power 8.8 W max.

<sup>4)</sup> at 230 V, 50 Hz

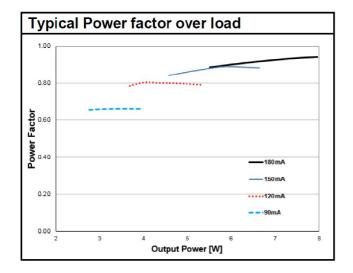
<sup>5)</sup> I out = 90mA < +/- 10 %

<sup>6)</sup> Ripple average at 100 Hz

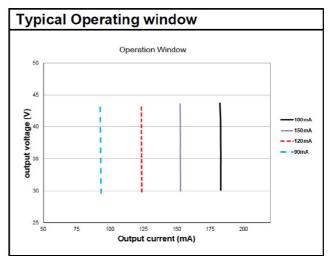
<sup>7)</sup> Full load at 230 V / 50 Hz

<sup>8)</sup> At full load, 230 V, 50 Hz / see graphs

#### Typical Power Factor v Load



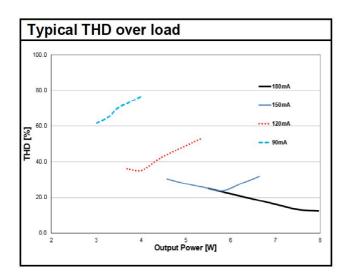
#### **Operating Window**



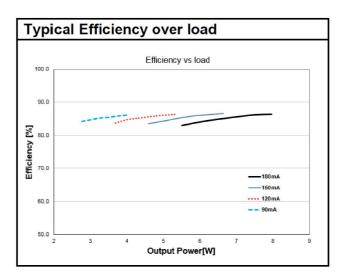
OT FIT 8/220-240/180 CS I MINI Typical Power Factor vs. Load

OT FIT 8/220-240/180 CS I MINI Operating Window

### Typical THD v Load



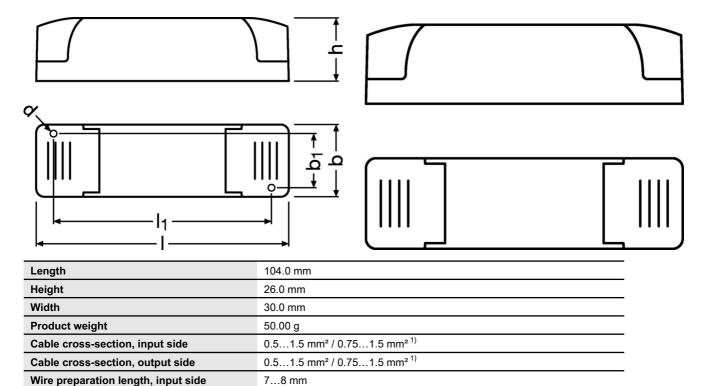
Typical Efficiency v Load 230 V 50 Hz



OT FIT 8/220-240/180 CS I MINI Typical THD Vs Load

OT FIT 8/220-240/180 CS I MINI Typical Efficiency vs. Load (230 V / 50 Hz)

#### **Dimensions & weight**



#### Colors & materials

Casing material	Plastic

7...8 m<u>m</u>

89.4 mm

22.0 mm

### Temperatures & operating conditions

Wire preparation length, output side Mounting hole spacing, length

Mounting hole spacing, width

Ambient temperature range	-20+55 °C
Max.housing temperature in case of fault	110 °C
Maximum temperature at tc test point	70 °C <sup>1)</sup>
Permitted rel. humidity during operation	585 % <sup>2)</sup>
Temperature range at storage	-2080 °C

<sup>1)</sup> Measured on tc point indicated on the product label.

<sup>1)</sup> Solid/ Flexible Leads

<sup>2)</sup> Maximum 56 days/year at 85 %

### Lifespan

ECG lifetime	50000 h <sup>1)</sup>

1) At maximum  $T_c = 70^{\circ}$ C / 10% failure rate

# Capabilities

Dimmable	No
Max. cable length to lamp/LED module	2.0 m <sup>1)</sup>
Overload protection	Automatic reversible
Overheating protection	Automatic reversible
Suitable for fixtures with prot. class	1/11
Suitable for through-wiring	No
Type of connection, input side	Push terminal
Type of connection, output side	Push terminal
Intended for no-load operation	No
No-load proof	Yes
Number of channels	1
Short-circuit protection	Automatic reversible

<sup>1)</sup> Output wires must be routed as close as possible to each other



### **Programming**

Programming device	DIPswitch

#### Certificates & standards

Type of protection	IP20			
Approval marks – approval	ENEC 05 / CCC / CE / RCM			
Standards	Acc. to IEC 61347-1 / Acc. to IEC 61347-2-13 / Acc. to IEC 62384 / Acc. to IEC 61000-3-2 / Acc. to IEC 61000-3-3 / Acc. to IEC 61547			

# Logistical data

Commodity code	85044083900

#### **Environmental information**

Information according Art. 33 of EU Regulation (EC) 1907/2006 (REACh)			
Declaration No. in SCIP database In work			
Date of Declaration	29-07-2024		
Primary Article Identifier	4052899587946		
SCIP_STATUS	In work		
SCIP_ID			



### Ecodesign regulation information:

Intended for use with LED modules.

The forward voltage of the LED light source shall be within the defined operating window of the control gear in all operating conditions including dimming if applicable.

Separate control gear and light sources must be disposed of at certified disposal companies in accordance with Directive 2012/19/EU (WEEE) in the EU and with Waste Electrical and Electronic Equipment (WEEE) Regulations 2013 in the UK. For this purpose, collection points for recycling centres and take-back systems (CRSO) are available from retailers or private disposal companies, which accept separate control gear and light sources free of charge. In this way, raw materials are conserved and materials are recycled.

#### **Download Data**

File		
Certificates	PDF	►OT FIT 8 CS MINI ENEC 35 104730 01 170923
CAD data	Compressed	►STEP file OT FIT MINI 8W
CAD data PDF	Compressed	►3D CAD drawing OT FIT MINI 8W
CAD data PDF	Compressed	►3D CAD drawing open OT FIT MINI 8W
Mandatory Publications	PDF	►OT FIT CS MINI UK DoC 4294808 03 200923
Mandatory Publications	PDF	►OT FIT CS MINI CE 3669357 08 160523
User instruction	PDF	►UI OT FIT CS I MINI



# **Logistical Data**

Product code	Product description	Packaging unit (Pieces/Unit)	Dimensions (length x width x height)	Volume	Gross weight
4052899587946	OT FIT 8/220-240/180 CS I MINI	Shipping carton box 20 Pieces	220 x 162 x 75 mm	2.67 dm³	54.25 g

The mentioned product code describes the smallest quantity unit which can be ordered. One shipping unit can contain one or more single products. When placing an order, for the quantity please enter single or multiples of a shipping unit

#### Disclaimer

Subject to change without notice. Errors and omission excepted. Always make sure to use the most recent release.