



SmartBalance, recessed

RC480B LED42S/840 PSD W30L120 CPC W

LED Module, system flux 4200 lm - 840 neutral white - Power supply unit with DALI interface - Width 0.30 m, length 1.20 m - Concealed profile ceiling version - Plug-in connector 3-pole Wieland/Adels compatible

Many people are keen to apply recessed luminaires with a surface of light as an alternative to louver-type solutions. At the same time they expect the luminaires to be office norm-compliant as well as highly energy-efficient. Meeting all relevant office norms, SmartBalance recessed is the next step in surface-of-light recessed luminaires for the specification market. Thanks to state-of-the-art LED technology it not only offers increased energy efficiency compared with fluorescent, but is also visually appealing without being intrusive. For those looking for an exciting design element there are versions with inner masking. SmartBalance is also available in surface-mounted, suspended and free floor-standing versions.

Product data

• General Information

Number of light sources	1 pc
Lamp family code	LED Module, system flux 4200 lm
Light source color	840 neutral white
Light source replaceable	No
Driver/power unit/transformer	Power supply unit with DALI interface
Driver included	Yes
Optical element	-
Optical cover/lens type	Acrylate micro-lens optic
Emergency lighting	-
Embedded control	-
Connection	Plug-in connector 3-pole Wieland/Adels compatible
Protection class IEC	Safety class I
Glow-wire test	Temperature 650 °C, duration 5 s
Flammability mark	For mounting on normally flammable surfaces
CE mark	CE mark
ENEC mark	ENEC mark
Product family code	RC480B

• Operating and Electrical

Input Voltage	220 to 240 V
Input Frequency	50 to 60 Hz
Control signal voltage	0-16 V DC DALI

• Controls and Dimming

Dimmable	Yes
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• Mechanical and Housing

Geometry	Width 0.30 m, length 1.20 m
Housing configuration	Concealed profile ceiling version
Housing Material	Steel
Optic material	Acrylate
Optical cover/lens material	Acrylate

• Approval and Application

Ingress protection code	IP20 [Finger-protected]
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PHILIPS

SmartBalance, recessed

Mech. impact protection code IK02 [0.2] standard]

• Initial Performance (IEC Compliant)

Initial luminous flux 4200 lm
Initial LED luminaire efficacy 106 lm/W
Init. Corr. Color Temperature 4000 K
Init. Color Rendering Index >80
Initial chromaticity (0.38, 0.38) SDCM <3.5
Initial input power 39.5 W

• Over Time Performance (IEC Compliant)

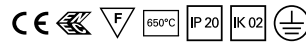
Median useful life L90B50 25000 h
Median useful life L80B50 50000 h
Median useful life L70B50 70000 h
Driver failure rate at 5000 h 1 %

• Application Conditions

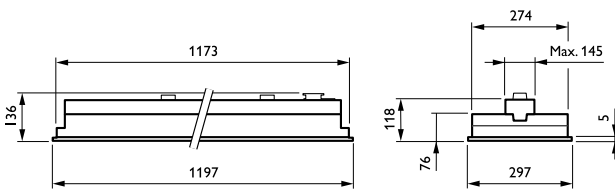
Ambient temperature range +10 to +40 °C
Maximum dim level 1%
Suitable for random switching Yes (relates to presence/ movement detection and daylight harvesting)

• Product Data

Full product code 871829127610400
Order product name RC480B LED42S/840 PSD W30L120 CPC W
EAN/UPC - Product 8718291276104
Order code 910502022603
Numerator - Quantity Per Pack 1
Numerator - Packs per outer box 1
Material Nr. (12NC) 910502022603
Net Weight (Piece) 8.300 kg



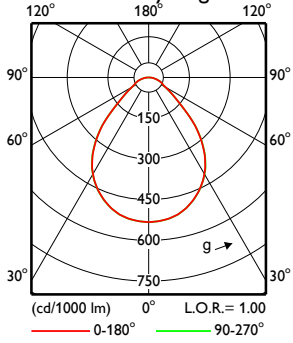
Dimensional drawing



RC480B W30L120 CPC 1xLED42S/840 AC-MLO

1 x 4200 lm

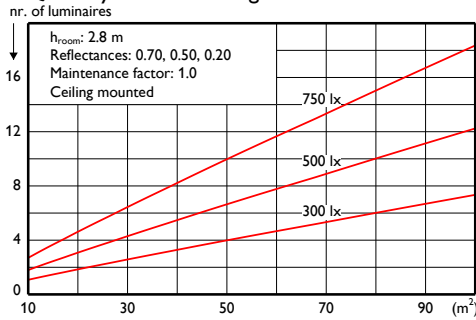
Polar intensity diagram



Light output ratio 1.00
 Service upward 0.00
 Service downward 1.00
 CIE flux code 66 90 97 100 100
 S/H ratio crosswise max. 1.3
 lengthwise max. 1.4
 UGR_{cen} (4Hx8H, 0.25H) 17
 EN12464-1 65 deg, 3000 cd/m²
 UTE71-121: 1.00C + 0.00T

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Quantity estimation diagram

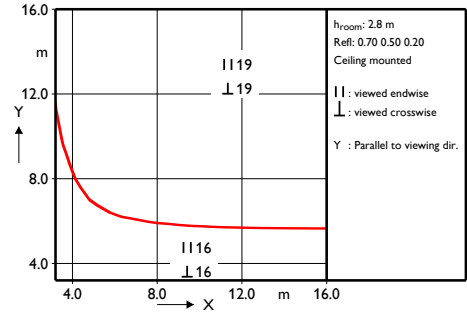


Utilisation factor table

Room Index	Reflectances for ceiling, walls and working plane (CIE)											
	0.80	0.80	0.70	0.70	0.70	0.70	0.50	0.50	0.30	0.30	0.00	0.00
0.50	0.50	0.50	0.50	0.50	0.30	0.30	0.10	0.10	0.00	0.00	0.00	0.00
0.30	0.10	0.30	0.20	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.00	0.00
0.60	0.61	0.58	0.60	0.58	0.57	0.51	0.51	0.47	0.50	0.47	0.45	0.45
0.80	0.71	0.66	0.70	0.68	0.66	0.60	0.59	0.55	0.59	0.55	0.53	0.53
1.00	0.79	0.73	0.78	0.75	0.73	0.67	0.66	0.62	0.65	0.62	0.60	0.60
1.25	0.87	0.79	0.85	0.82	0.79	0.73	0.72	0.69	0.71	0.68	0.66	0.66
1.50	0.92	0.84	0.90	0.86	0.83	0.78	0.77	0.73	0.76	0.73	0.71	0.71
2.00	1.01	0.90	0.98	0.93	0.89	0.85	0.84	0.81	0.83	0.80	0.78	0.78
2.50	1.06	0.94	1.03	0.98	0.93	0.89	0.88	0.85	0.87	0.84	0.82	0.82
3.00	1.10	0.96	1.07	1.01	0.95	0.92	0.91	0.89	0.90	0.88	0.85	0.85
4.00	1.15	0.99	1.11	1.04	0.98	0.96	0.94	0.92	0.93	0.91	0.89	0.89
5.00	1.18	1.01	1.14	1.07	1.00	0.98	0.96	0.95	0.95	0.93	0.91	0.91

Ceiling mounted

UGR diagram



Luminance Table

Plane Cone	0.0	45.0	90.0
45.0	4080	4219	4094
50.0	2938	2986	2931
55.0	2276	2268	2259
60.0	1804	1927	1786
65.0	1668	1562	1662
70.0	1672	1616	1672
75.0	1603	1610	1605
80.0	1550	1773	1553
85.0	1652	1832	1625
90.0	-	-	-

(cd/m²)

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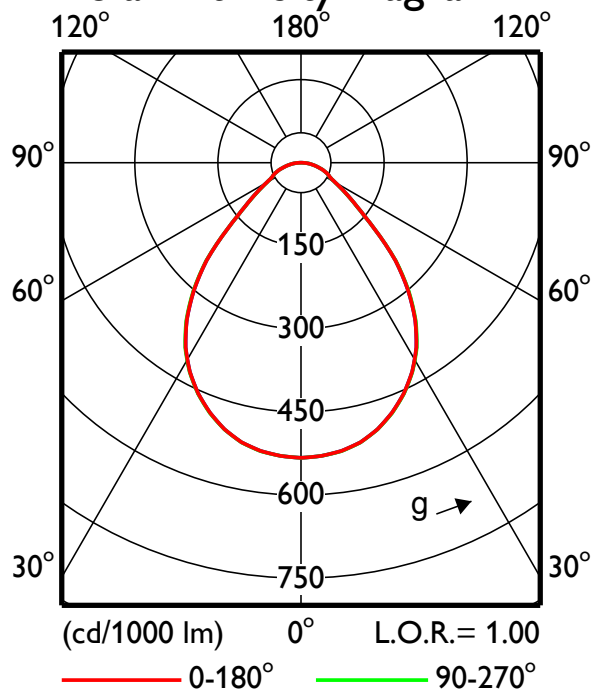
Photometric data



RC480B W30L120 CPC 1xLED42S/840 AC-MLO

1 x 4200 lm

Polar intensity diagram



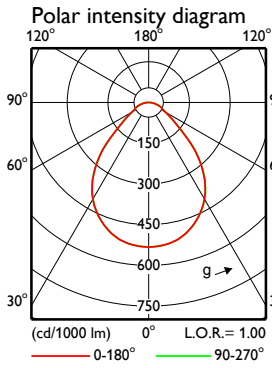
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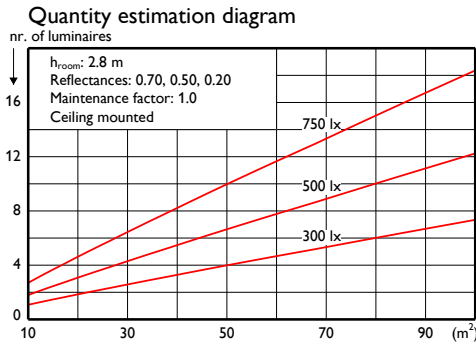
RC480B W30L120 CPC 1xLED42S/840 AC-MLO

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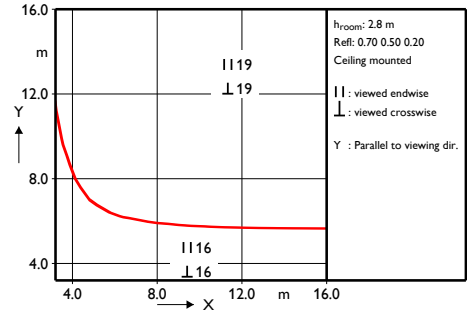


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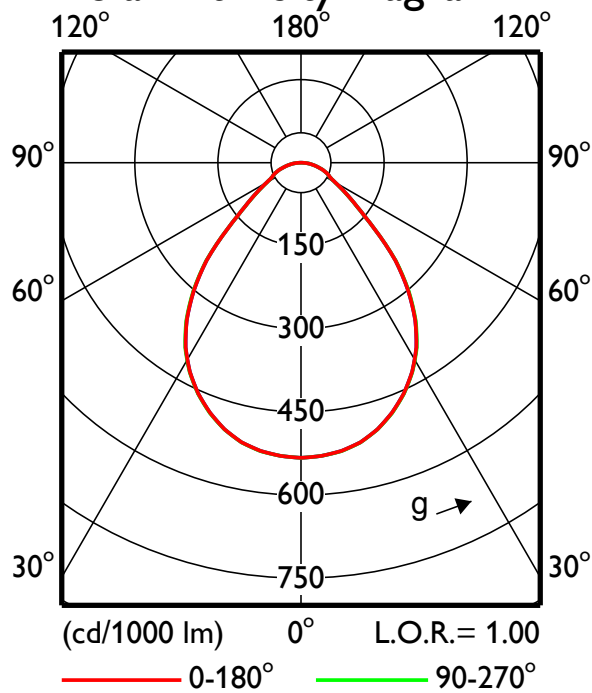
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RC480B W30L120 CPC 1xLED42S/840 AC-MLO

1 x 4200 lm

Polar intensity diagram



LVW1963400

2016-06-17

IFPC1_RC480BW30L120CPC1xLED42S830AC-MLO



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