



Quintessence square – The system solution for excellent visual comfort

Large luminaire spacing, high uniformity and excellent visual comfort

Quintessence sets standards in terms of visual comfort, efficiency and quality of light for recessed luminaires. The product range consists of downlights, lens wallwashers and directional spotlights. Characteristic of Quintessence downlights and lens wallwashers are their good glare control and high uniformity of illumination. The 90° beam angle and a 40° shielding angle allow wide luminaire spacing for efficient general lighting. Tunable white technology

also enables the color temperature of the light to be modified. Human Centric Lighting concepts are thus supported, matched to the incident daylight.

Quintessence square Recessed luminaires



Structure and characteristics

The features described here are typical of products in this range. Special versions may offer additional or varying features. A comprehensive description of the features of individual products can be found on our website.

1 ERCO low brightness reflector

- Downlight: cut-off angle 40° from horizontal
- Aluminum, anodized, satin matt

or

Wallwasher reflector

- Cut-off angle 80° from horizontal
- Aluminum, anodized, satin matt

2 ERCO LED module

- High-power LEDs: warm white (2700K or 3000K) or neutral white (3500K or 4000K)
- Directional luminaire with collimating lens made of optical polymer

3 Diffuser or lens

- Made of optical polymer
- Diffuser lens, wide flood, extra wide flood or lens system, wallwash
- Directional luminaire with Spherolit lens narrow spot, spot or flood

4 Mounting frame

- Covered mounting detail
- Fixing for ceiling thicknesses of 1-30mm
- Polymer, white
- For flush mounting: mounting frame to be ordered separately, fixing for ceiling thicknesses of 1/2" - 1" / 12.5-25mm

5 Housing

- Cast aluminum, designed as heat sink
- Fixing frame: polymer, black
- Directional luminaire: 0°-20° tilt, 360° rotation. Lockable angles of tilt and rotation

6 Control gear

- Switchable, trailing edge dimmable or 0-10V dimmable
- Trailing edge dimmable version:**
- Operation at 120V: Dimming with external dimmers possible

Variants on request

- Reflector: coated matt gold, matt silver or matt champagne
- Mounting frame: 10,000 further colors
- Control: Lutron

Please contact your ERCO consultant.



Design and application:
www.erco.com/quintessence-square

Quintessence square Recessed luminaires



Very high visual comfort
The low brightness reflector combines maximum visual comfort with an optimum light output ratio.

Suitable for office workstations
ERCO develops luminaires with the specifications of good glare control and high visual comfort. UGR values are used as support for purely norm-referenced lighting. With downlights though this should not be carried out using 'blanket' values, but should be implemented according to the individual arrangement of luminaires in the room.

Covered or flush mounting detail
As standard, all recessed luminaires have overlapping installation details. Flush mounting frames are available as accessories.

Special characteristics

- Excellent visual comfort
- For office workstation lighting as of UGR 18.5
- Flush or covered mounting detail

- ERCO high-power LEDs
- Efficient Spherolit technology
- Cut-off 40°/80° from horizontal
- Different light distributions
- Different light colors

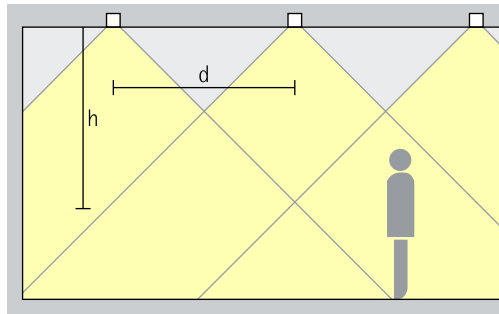
- Excellent thermal management
- EMC-optimized
- Various construction sizes
- Lockable
- Tool-free mounting

- Switchable
- Trailing edge dimmable
- 0-10V dimmable

Quintessence square Recessed luminaires – Luminaire arrangement

Downlights

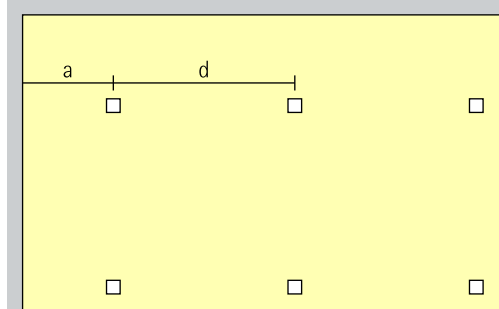
Wide flood, Extra wide flood



General lighting

For uniform ambient lighting with high visual comfort, the spacing (d) between two Quintessence downlights may be up to approximately 1.5 times the height (h) of the luminaire above the working plane.

Arrangement: $d \leq 1.5 \times h$

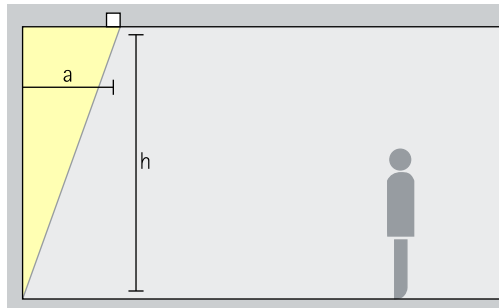


The wall offset should be half the luminaire spacing.

Arrangement: $a = d / 2$

Lens wallwashers

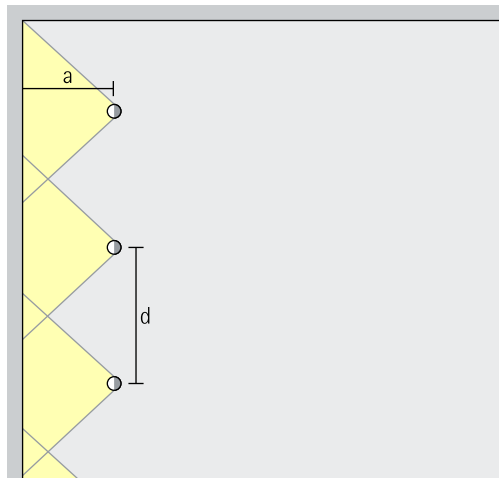
Wallwash



Wallwashing

For uniform vertical illuminance, the distance (a) of Quintessence lens wallwashers from the wall should be around one third of the room height (h).

Arrangement: $a = 1/3 \times h$



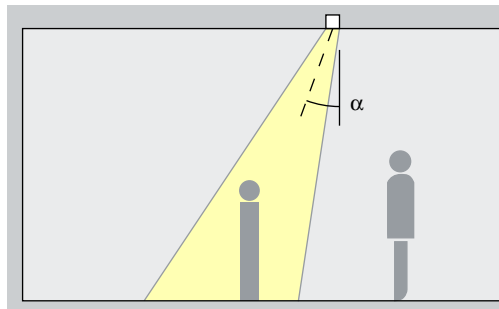
For good longitudinal uniformity, the spacing (d) of Quintessence lens wallwashers may be up to 1.3 times the offset from the wall (a).

Arrangement: $d \leq 1.3 \times a$

The optimal wall offset and luminaire spacing for each product are indicated in the wallwasher tables in the catalogue and the product data sheets.

Directional luminaires

Narrow spot, Spot, Flood

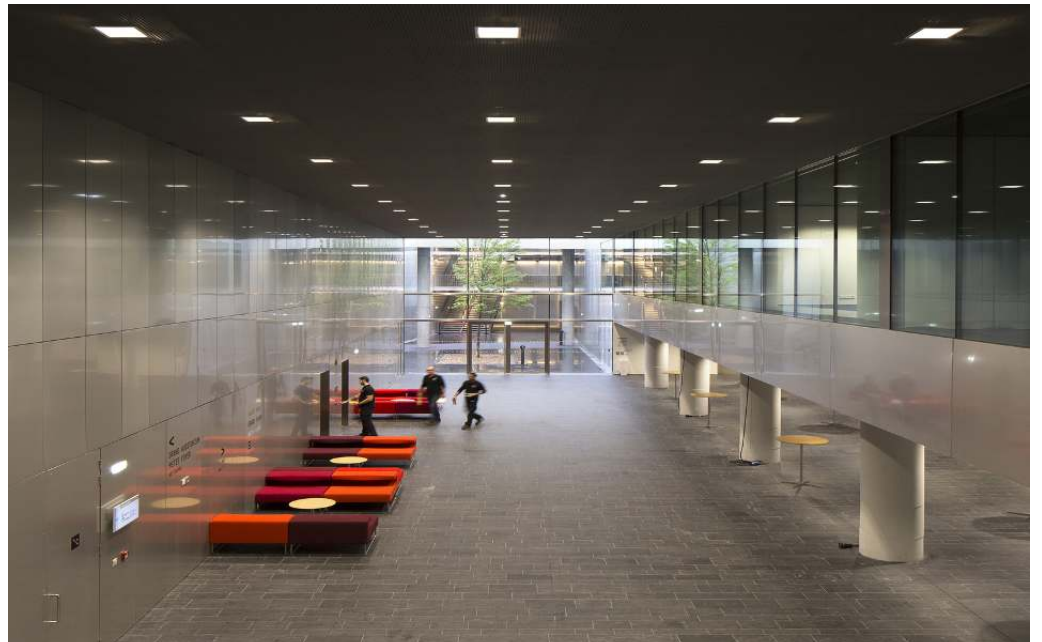


Accentuation

Quintessence directional luminaires accentuate artwork, products and architectural details effectively. The ideal angle of tilt (α) for this is around 20°. The object is modelled without distorting the effect as a result of excessive shadowing. It also prevents shadows cast by the observer.

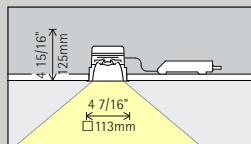
Arrangement: $\alpha = 20^\circ$

Centre des Congrès Couvent des Jacobins, Rennes.
Architecture: Jean Guervilly, Paris.
Lighting design: TPFI, Rennes.
Photography: CIP-ment Guillaume, Paris.

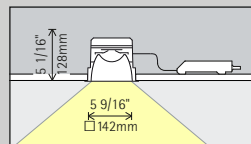


Quintessence square Recessed luminaires

Construction size



Size 3



Size 4

LED module
Maximum value at 4000K CRI 82

12W/1650lm	2W/275lm (Narrow spot)
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18W/2475lm	2W/275lm (Narrow spot)
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Light color

	2700K CRI 92		3500K CRI 92
	3000K CRI 92		4000K CRI 82
	3000K CRI 97		4000K CRI 92

	2700K CRI 92		3500K CRI 92
	3000K CRI 92		4000K CRI 82
	3000K CRI 97		4000K CRI 92

Light distribution

Downlights		Directional luminaires	
	Wide flood		Narrow spot
	Extra wide flood		Spot
	Lens wallwashers		Flood
	Wallwash		

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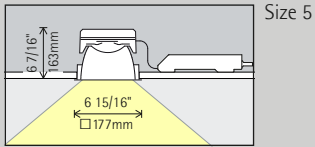
Control

	Switchable
	Trailing edge dimmable
0-10V	0-10V

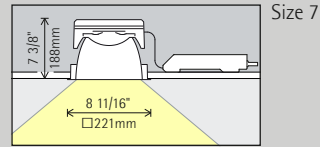
	Switchable
	Trailing edge dimmable
0-10V	0-10V

Accessories

	Junction box		Mounting frame
	Flexible metal conduit		Cover frame
	Plaster frame		
	Ultra airtight I.C. box		



Size 5



Size 7

24W/3300lm	6W/825lm (Narrow spot)
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32W/4400lm	8W/1100lm (Narrow spot)
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	2700K CRI 92		3500K CRI 92
	3000K CRI 92		4000K CRI 82
	3000K CRI 97		4000K CRI 92

	2700K CRI 92		3500K CRI 92
	3000K CRI 92		4000K CRI 82
	3000K CRI 97		4000K CRI 92

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Article numbers and planning data:
www.erco.com/014092-us

Design and application:
www.erco.com/quintessence-square



