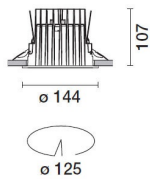## Reflex

Last information update: April 2024

Product configuration: MV98
MV98: Fixed circular recessed luminaire - Ø125 mm - neutral white - flood optic - UGR<19

Product code
MV98: Fixed circular recessed luminaire - Ø125 mm - neutral white - flood optic - UGR<19 **Attention! Code no longer in production**

Technical description
Fixed round luminaire designed to use a LED lamp with C.O.B. technology. Version with rim for surface-mounting. Reflector vacuum-metallised with aluminium vapours with an anti-scratch protective layer. Die-cast aluminium body and passive dissipation system. Product complete with LED lamp in warm white colour tone (3000K). General light emission, with controlled luminance UGR<19 1500 cd/m2 α>65° flood optic.

Installation
Recessed using torsion springs which allow easy installation in false ceilings with thickness ranging from 1 mm to 20 mm.

Colour	Weight (Kg)
White / Aluminium (39)	1.02

Mounting
ceiling recessed

Wiring
product complete with an electronic ballast

Complies with EN60598-1 and pertinent regulations

IP20 IP54 On the visible part of the product once installed   CE

Technical data

lm system:	1801		CRI (minimum):	80
W system:	15.4		Colour temperature [K]:	3000
lm source:	2050		MacAdam Step:	2
W source:	13		Life Time LED 1:	> 50,000h - L80 - B10 (Ta 25°C)
Luminous efficiency (lm/W, real value):	116.9		Lamp code:	LED
lm in emergency mode:	-		Number of lamps for optical assembly:	1
Total light flux at or above an angle of 90° [Lm]:	0		ZVEI Code:	LED
Light Output Ratio (L.O.R.) [%]:	88		Number of optical assemblies:	1
Beam angle [°]:	24°			

Polar

Imax=4875 cd

CIE
nL 0.88
98-100-100-100-88
UGR 17.0-17.0
DIN
A.61
UTE
0.88A+0.00T
F"1=978
F"1+F"2=999
F"1+F"2+F"3=1000
CIBSE
LG3 L<1500 cd/m² at 65°
UGR<19 | L<1500 cd/mq @65°

α=24°

Lux			
h	d	Em	Emax
2	0.9	921	1219
4	1.7	230	305
6	2.6	102	135
8	3.4	58	76

ø 144
107
ø 125

Utilisation factors

R	77	75	73	71	55	53	33	00	DRR
K0.8	79	74	71	69	74	71	70	68	77
1.0	82	78	76	73	77	75	75	72	82
1.5	86	84	81	79	83	81	80	77	88
2.0	89	87	85	84	86	84	83	81	92
2.5	91	89	88	87	88	87	86	84	95
3.0	92	91	90	89	89	89	88	85	97
4.0	93	92	92	91	91	90	89	87	99
5.0	94	93	93	92	92	91	90	88	100

Luminance curve limit

QC	A	G	1.15	2000	1000	500		<=300		
	B		1.50		2000	1000	750	500	<=300	
	C		1.85			2000		1000	500	<=300

C0-180   C90-270
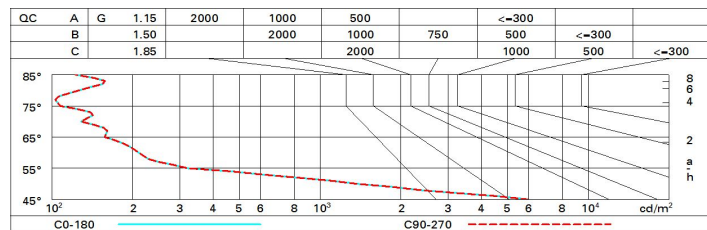
UGR diagram

Corrected UGR values (at 2050 lm bare lamp luminous flux)

Riflect.:											
ceil/cav		0.70	0.70	0.50	0.50	0.30	0.70	0.70	0.50	0.50	0.30
walls		0.50	0.30	0.50	0.30	0.30	0.50	0.30	0.50	0.30	0.30
work pl.		0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Room dim			viewed					viewed			
x	y		crosswise					endwise			
2H	2H	17.6	18.2	17.8	18.5	18.7	17.6	18.2	17.8	18.5	18.7
	3H	17.4	18.0	17.7	18.3	18.6	17.4	18.0	17.7	18.3	18.6
	4H	17.3	17.9	17.7	18.2	18.5	17.3	17.9	17.7	18.2	18.5
	6H	17.3	17.8	17.6	18.1	18.4	17.3	17.8	17.6	18.1	18.4
	8H	17.2	17.7	17.6	18.0	18.4	17.2	17.7	17.6	18.0	18.4
	12H	17.2	17.7	17.6	18.0	18.3	17.2	17.7	17.6	18.0	18.3
4H	2H	17.3	17.9	17.7	18.2	18.5	17.3	17.9	17.7	18.2	18.5
	3H	17.2	17.7	17.6	18.0	18.3	17.2	17.7	17.6	18.0	18.3
	4H	17.1	17.5	17.5	17.9	18.3	17.1	17.5	17.5	17.9	18.3
	6H	17.0	17.4	17.4	17.8	18.2	17.0	17.4	17.4	17.8	18.2
	8H	17.0	17.3	17.4	17.7	18.1	17.0	17.3	17.4	17.7	18.1
	12H	16.9	17.2	17.4	17.6	18.1	16.9	17.2	17.4	17.6	18.1
8H	4H	17.0	17.3	17.4	17.7	18.1	17.0	17.3	17.4	17.7	18.1
	6H	16.9	17.1	17.3	17.6	18.1	16.9	17.1	17.3	17.6	18.1
	8H	16.8	17.1	17.3	17.5	18.0	16.8	17.1	17.3	17.5	18.0
	12H	16.8	17.0	17.3	17.5	18.0	16.8	17.0	17.3	17.5	18.0
12H	4H	16.9	17.2	17.4	17.6	18.1	16.9	17.2	17.4	17.6	18.1
	6H	16.8	17.1	17.3	17.5	18.0	16.8	17.1	17.3	17.5	18.0
	8H	16.8	17.0	17.3	17.5	18.0	16.8	17.0	17.3	17.5	18.0

Variations with the observer position at spacing:

S =	1.0H	4.4 / -24.6	4.4 / -24.6
	1.5H	7.2 / -25.8	7.2 / -25.8
	2.0H	9.2 / -26.2	9.2 / -26.2