


# Photometric test report

<b>Family</b> <b>Silica® 21</b>	<b>Order number: 51MX24TCTAB</b> <b>EAN: 4058352800195</b>	<b>LP number</b> <b>59276_111</b>
	<b>Version</b> surface-mounted luminaire, reflector, black, direct distribution, asymmetric distribution, tunable white	<b>serial documentation</b> <b>03.05.2023</b>
	<b>Lamps</b> LED 4000 K   CRI ≥ 80 <b>Controlgear</b> ECG-DALI <b>Setting</b> factory setting <b>Rated values</b> Net luminous flux = 8200 lm Power consumption = 85.2 W Luminous efficacy = 96.2 lm/W	

**Luminous intensity in cd/klm** C180-0 C270-90 **Imax: 826 cd/klm**



Classifications	
DIN 5040	A 6 0
CIE	N1=74 N2=94 N3=99 N4=100 N5=100

Luminaire light output ratios	
$\eta_{LB}$	100.0%
$\phi_u$	100.0%
$\phi_o$	0.0%

Measurement conditions
DIN EN 13032 and DIN 5032

## Photometric test report

Family <b>Silica® 21</b>	Order number: <b>51MX24TCTAB</b> EAN: <b>4058352800195</b>	LP number <b>59276_111</b>
Table of values for luminous intensities		Maximum luminous intensity
		<b>siteco</b>

C-planes	0°	15° 345°	30° 330°	45° 315°	60° 300°	75° 285°	90° 270°
$\gamma$	Luminous intensity in cd/klm						
0°	661.7	661.7	661.7	661.7	661.7	661.7	661.7
5°	707.6	708.8	701.1	699.3	690.5	675.5	665.7
10°	753.6	757.8	748.0	742.6	724.7	696.1	669.4
15°	787.1	797.8	794.5	785.9	757.5	712.8	665.2
20°	806.6	820.5	826.5	809.8	762.2	699.9	638.5
25°	788.4	808.5	803.3	771.2	718.7	652.8	578.2
30°	753.6	764.4	743.7	689.2	630.6	560.4	502.1
35°	647.7	641.5	628.6	587.6	522.2	450.6	386.5
40°	481.1	487.8	495.5	479.3	412.9	335.0	271.3
45°	342.4	353.2	375.0	376.0	318.8	233.5	172.1
50°	244.7	248.8	274.8	282.8	235.7	157.9	107.9
55°	171.3	177.5	199.4	208.0	176.1	105.7	63.9
60°	115.1	122.4	144.6	155.8	127.0	61.7	29.2
65°	81.5	86.1	102.4	113.9	84.3	29.7	9.5
70°	56.7	63.4	75.3	76.6	47.3	14.7	3.6
75°	29.5	36.2	51.5	39.1	25.8	8.2	1.2
80°	5.4	7.7	15.3	17.0	11.4	3.4	0.5
85°	1.1	1.3	2.4	2.3	0.8	0.3	0.3
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
100°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
105°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
110°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
115°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
120°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
125°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
130°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
135°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0

## Photometric test report

<b>Family</b> <b>Silica® 21</b>	<b>Order number: 51MX24TCTAB</b> <b>EAN: 4058352800195</b>	<b>LP number</b> <b>59276_111</b>
<b>Table of values for luminous intensities</b>		<b>Maximum luminous intensity</b>
		<b>siteco</b>

C-planes	105° 255°	120° 240°	135° 225°	150° 210°	165° 195°	180°	Phi-zone	Total Phi-zone
$\gamma$	Luminous intensity in cd/klm						Luminous flux in lm/klm	
0°	661.7	661.7	661.7	661.7	661.7	661.7	4.0	4.0
5°	650.2	639.3	625.2	613.2	610.8	611.4	31.6	35.6
10°	635.2	606.4	576.8	550.6	537.8	533.0	62.6	98.1
15°	612.2	559.4	505.1	459.9	436.0	425.6	90.9	189.1
20°	565.1	489.6	412.9	351.3	314.5	302.5	113.2	302.3
25°	497.5	409.8	322.4	247.7	191.9	168.1	125.1	427.4
30°	412.4	312.9	216.8	129.1	80.3	67.5	124.5	551.9
35°	304.3	218.0	125.8	57.5	28.2	23.1	112.3	664.2
40°	195.6	132.8	62.5	24.4	17.4	16.1	92.9	757.1
45°	117.9	72.0	27.4	15.9	12.0	11.0	72.7	829.8
50°	70.5	38.1	14.7	10.4	7.3	6.2	55.1	884.8
55°	41.0	19.6	9.0	6.3	3.7	3.2	41.1	925.9
60°	17.5	9.3	5.4	3.7	2.8	2.3	29.2	955.1
65°	5.6	4.4	3.2	2.6	1.9	1.3	20.1	975.2
70°	2.1	2.0	1.8	1.4	1.0	0.6	13.6	988.8
75°	0.8	0.9	0.9	0.8	0.6	0.5	8.0	996.8
80°	0.5	0.5	0.5	0.5	0.4	0.4	2.7	999.5
85°	0.4	0.4	0.4	0.4	0.3	0.3	0.5	1000.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
95°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
100°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
105°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
110°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
115°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
120°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
125°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
130°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
135°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
140°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1000.0

## Photometric test report

<b>Family</b> Silica® 21	<b>Order number: 51MX24TCTAB</b> <b>EAN: 4058352800195</b>	<b>LP number</b> 59276_111
-----------------------------	---------------------------------------------------------------	-------------------------------

<b>UGR-Table</b>	<b>Standard room</b>	<b>siteco</b>
------------------	----------------------	---------------

Reflection factor of ceiling	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3	
Reflection factor of walls	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3	
Reflection factor of floor	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	
Room dimensions	View crosswise (C0)					View endwise (C90)					
x	y										
2H	2H	23.8	25.2	24.1	25.5	25.8	19.7	21.1	20.0	21.4	21.7
	3H	24.3	25.5	24.7	25.9	26.2	19.6	20.9	20.0	21.2	21.6
	4H	24.4	25.6	24.8	25.9	26.3	19.6	20.7	20.0	21.1	21.4
	6H	24.4	25.5	24.8	25.8	26.2	19.5	20.5	19.9	20.9	21.3
	8H	24.4	25.4	24.8	25.8	26.2	19.5	20.5	19.9	20.8	21.2
	12H	24.4	25.3	24.9	25.7	26.1	19.5	20.4	19.9	20.8	21.2
4H	2H	24.2	25.3	24.6	25.7	26.0	20.4	21.6	20.8	21.9	22.3
	3H	24.9	25.9	25.4	26.3	26.7	20.6	21.5	21.0	21.9	22.3
	4H	25.2	26.0	25.6	26.4	26.9	20.5	21.4	21.0	21.8	22.2
	6H	25.2	25.9	25.7	26.4	26.8	20.5	21.2	20.9	21.6	22.1
	8H	25.2	25.8	25.6	26.3	26.8	20.5	21.1	20.9	21.6	22.0
	12H	25.2	25.7	25.7	26.2	26.7	20.4	21.0	20.9	21.5	22.0
8H	4H	25.3	25.9	25.7	26.4	26.8	20.8	21.4	21.3	21.9	22.4
	6H	25.3	25.8	25.8	26.3	26.8	20.8	21.3	21.3	21.8	22.3
	8H	25.3	25.7	25.8	26.2	26.7	20.7	21.2	21.2	21.7	22.2
	12H	25.2	25.6	25.8	26.1	26.7	20.7	21.1	21.2	21.6	22.1
12H	4H	25.3	25.8	25.8	26.3	26.8	20.8	21.4	21.3	21.8	22.3
	6H	25.3	25.7	25.8	26.2	26.8	20.8	21.2	21.3	21.7	22.2
	8H	25.3	25.6	25.8	26.1	26.7	20.8	21.1	21.3	21.6	22.2

<b>Luminance table</b>	<b>Max. for <math>\gamma \geq 65^\circ</math></b>	<b>Photometric dimensions in mm:</b>	<b>L = 2940</b>										
			<b>B = 49</b>										
<b>C-planes</b>	<b>0°</b>	<b>15°</b>	<b>30°</b>	<b>45°</b>	<b>60°</b>	<b>75°</b>	<b>90°</b>	<b>105°</b>	<b>120°</b>	<b>135°</b>	<b>150°</b>	<b>165°</b>	<b>180°</b>
	<b>345°</b>	<b>330°</b>	<b>315°</b>	<b>300°</b>	<b>285°</b>	<b>270°</b>	<b>255°</b>	<b>240°</b>	<b>225°</b>	<b>210°</b>	<b>195°</b>		
$\gamma$	<b>Luminance in cd/m<sup>2</sup></b>												
45°	27562.9	28428.1	30184.7	30263.3	25666.6	18797.7	13852.3	9489.8	5799.2	2204.0	1276.8	969.2	887.9
50°	21668.8	22034.2	24331.8	25043.2	20871.0	13979.9	9555.8	6242.1	3377.2	1298.8	921.0	647.9	548.0
55°	17000.6	17614.7	19791.0	20642.1	17474.7	10488.0	6337.0	4073.4	1945.7	894.2	625.9	371.6	316.8
60°	13100.4	13932.1	16460.8	17732.5	14462.4	7018.7	3324.5	1989.8	1061.7	617.9	418.9	315.1	267.0
65°	10972.2	11595.1	13794.3	15339.8	11352.4	3997.6	1276.4	758.8	589.3	437.2	343.6	252.9	172.5
70°	9442.1	10551.3	12528.0	12744.8	7864.7	2441.0	596.3	348.7	337.8	298.1	236.7	168.1	101.2
75°	6479.9	7957.8	11329.0	8595.1	5684.8	1807.3	269.8	169.6	200.6	190.9	169.6	141.0	109.7
80°	1765.2	2519.4	5028.4	5576.4	3743.7	1121.1	167.2	149.5	167.2	174.4	167.2	142.3	128.2
85°	709.3	871.9	1595.5	1509.9	510.7	226.6	205.7	241.0	262.5	269.7	255.4	220.1	198.5

**Photometric test report**

<b>Family</b> <b>Silica® 21</b>	<b>Order number: 51MX24TCTAB</b> <b>EAN: 4058352800195</b>	<b>LP number</b> <b>59276_111</b>
------------------------------------	---------------------------------------------------------------	--------------------------------------

**Luminance values in cd/m<sup>2</sup>**      γ 65°    γ 70°    γ 75°    γ 80°    γ 85°      **siteco**

