

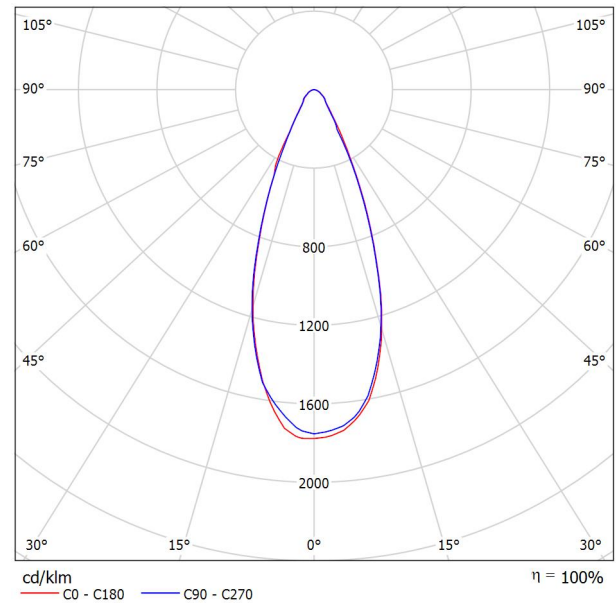


Operator
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e-Mail

LSHM-1200W(50K)Ultra-Z 40 / Luminaire Data Sheet

Luminous emittance 1:

See our luminaire catalog for an image of the luminaire.



Luminaire classification according to CIE: 100
CIE flux code: 86 95 99 100 100

Due to missing symmetry properties, no UGR table can be displayed for this luminaire.

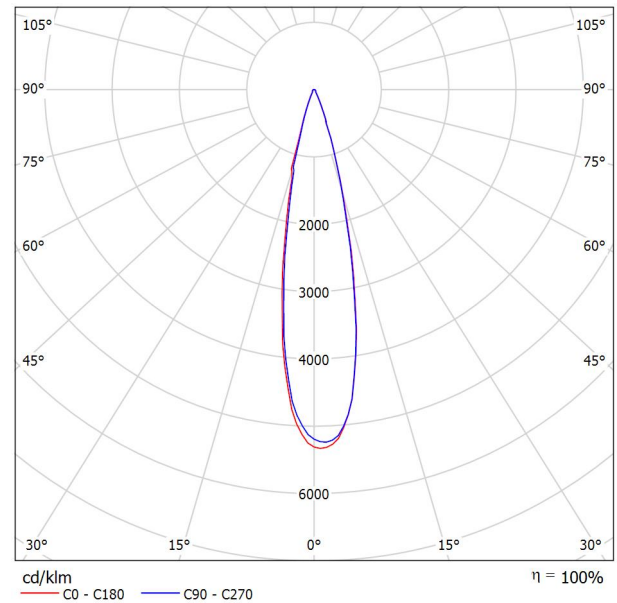


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LSHM-1200W(50K)Ultra-Z 20 / Luminaire Data Sheet

Luminous emittance 1:

See our luminaire catalog for an image of the luminaire.



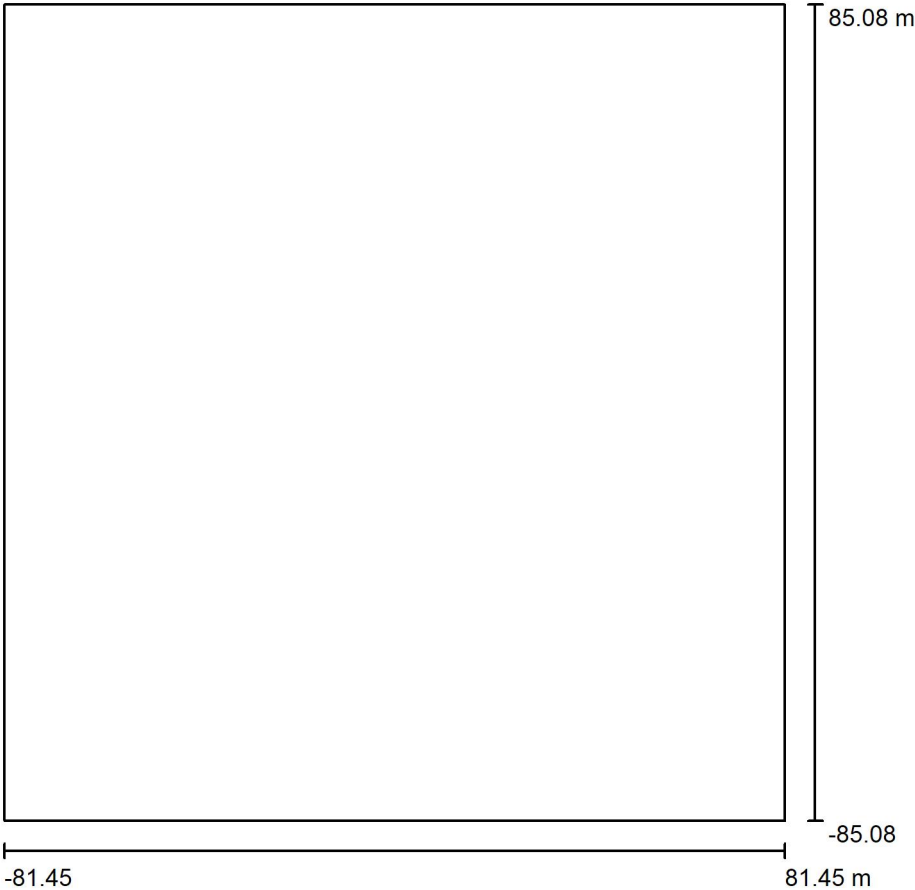
Luminaire classification according to CIE: 100
CIE flux code: 91 96 99 100 100

Due to missing symmetry properties, no UGR table can be displayed for this luminaire.



Operator
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Exterior Scene 1 / Planning data



Light loss factor: 0.80, ULR (Upward Light Ratio): 4.5%

Scale 1:1578

Luminaire Parts List

No.	Pieces	Designation (Correction Factor)	Φ (Luminaire) [lm]	Φ (Lamps) [lm]	P [W]
1	64	LSHM-1200W(50K)Ultra-Z 20 (1.000)	195659	195897	12043.0
2	16	LSHM-1200W(50K)Ultra-Z 40 (1.000)	198375	198850	1199.2
Total:			15696171	Total: 15719008	789939.2

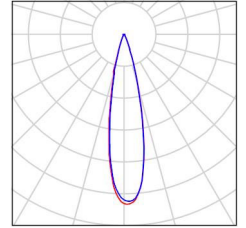


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Exterior Scene 1 / Luminaire parts list

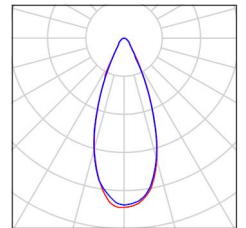
64 Pieces LSHM-1200W(50K)Ultra-Z 20
Article No.: LSHM-1200W(50K)Ultra-Z 20
Luminous flux (Luminaire): 195659 lm
Luminous flux (Lamps): 195897 lm
Luminaire Wattage: 12043.0 W
Luminaire classification according to CIE: 100
CIE flux code: 91 96 99 100 100
Fitting: 1 x 5050 (Correction Factor 1.000).

See our luminaire catalog
for an image of the
luminaire.



16 Pieces LSHM-1200W(50K)Ultra-Z 40
Article No.: LSHM-1200W(50K)Ultra-Z 40
Luminous flux (Luminaire): 198375 lm
Luminous flux (Lamps): 198850 lm
Luminaire Wattage: 1199.2 W
Luminaire classification according to CIE: 100
CIE flux code: 86 95 99 100 100
Fitting: 1 x 5050 (Correction Factor 1.000).

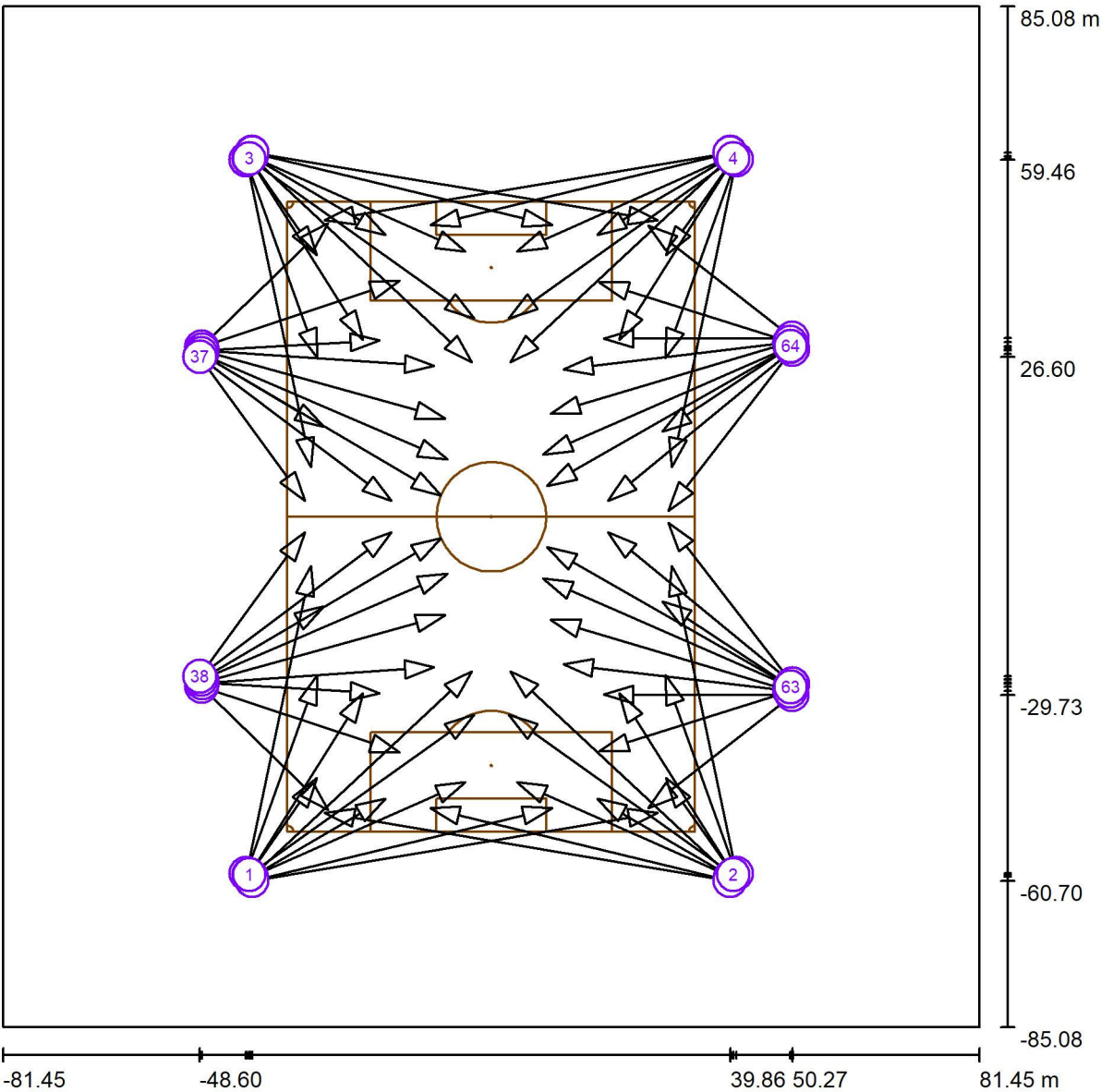
See our luminaire catalog
for an image of the
luminaire.





Operator
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e-Mail

Exterior Scene 1 / Sport Luminaires (Coordinates List)



Scale 1 : 1165

List of the Sport Luminaires

Luminaire	Index	Position [m]			Aiming Point [m]			Angle [°]	Alignment	Pole
		X	Y	Z	X	Y	Z			
LSHM-1200W(50K)Ultra-Z 40	1	-40.364	-59.673	20.500	-29.100	-43.600	0.000	46.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	2	40.364	-59.673	20.500	29.100	-43.600	0.000	46.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	3	-40.364	59.673	20.500	-29.100	43.600	0.000	46.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	4	40.364	59.673	20.500	29.100	43.600	0.000	46.2	(C 90, G IMax)	Pole Position 1

Operator
Telephone
Fax
e-Mail

Exterior Scene 1 / Sport Luminaire (Coordinates List)

List of the Sport Luminaire

Luminaire	Index	Position [m]			Aiming Point [m]			Angle [°]	Alignment	Pole
		X	Y	Z	X	Y	Z			
LSHM-1200W(50K)Ultra-Z 20	5	-40.880	-59.461	20.500	-30.100	-8.223	0.000	21.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	6	40.880	-59.461	20.500	30.100	-8.223	0.000	21.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	7	-40.880	59.461	20.500	-30.100	8.223	0.000	21.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	8	40.880	59.461	20.500	30.100	8.223	0.000	21.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	9	-39.964	-60.055	21.200	-3.200	-25.748	0.000	22.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	10	39.964	-60.055	21.200	3.200	-25.748	0.000	22.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	11	-39.964	60.055	21.200	-3.200	25.748	0.000	22.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	12	39.964	60.055	21.200	3.200	25.748	0.000	22.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	9	-39.964	-60.055	20.500	-17.659	-46.972	0.000	38.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	10	39.964	-60.055	20.500	17.659	-46.972	0.000	38.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	11	-39.964	60.055	20.500	-17.659	46.972	0.000	38.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	12	39.964	60.055	20.500	17.659	46.972	0.000	38.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	13	-40.900	-59.500	21.200	-29.000	-26.400	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	14	40.900	-59.500	21.200	29.000	-26.400	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	15	-40.900	59.500	21.200	-29.000	26.400	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	16	40.900	59.500	21.200	29.000	26.400	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	17	-39.900	-60.700	21.200	10.184	-48.600	0.000	22.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	18	39.900	-60.700	21.200	-10.184	-48.600	0.000	22.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	19	-39.900	60.700	21.200	10.184	48.600	0.000	22.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	20	39.900	60.700	21.200	-10.184	48.600	0.000	22.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	21	-40.400	-59.700	22.000	-2.900	-33.000	0.000	25.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	22	40.400	-59.700	22.000	2.900	-33.000	0.000	25.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	23	-40.400	59.700	22.000	-2.900	33.000	0.000	25.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	24	40.400	59.700	22.000	2.900	33.000	0.000	25.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	25	-40.000	-60.070	22.000	-4.300	-44.200	0.000	29.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	26	40.000	-60.070	22.000	4.300	-44.200	0.000	29.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	27	-40.000	60.070	22.000	-4.300	44.200	0.000	29.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	28	40.000	60.070	22.000	4.300	44.200	0.000	29.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	29	-39.856	-60.688	20.500	27.800	-49.400	0.000	16.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	30	39.856	-60.688	20.500	-27.800	-49.400	0.000	16.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	31	-39.856	60.688	20.500	27.800	49.400	0.000	16.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	32	39.856	60.688	20.500	-27.800	49.400	0.000	16.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	33	-48.200	27.700	20.500	-18.600	29.400	0.000	34.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	34	-48.200	-27.700	20.500	-18.600	-29.400	0.000	34.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	33	-48.200	27.700	21.200	-7.663	16.400	0.000	26.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	34	-48.200	-27.700	21.200	-7.663	-16.400	0.000	26.7	(C 90, G IMax)	Pole Position 1

Operator
Telephone
Fax
e-Mail

Exterior Scene 1 / Sport Luminaire (Coordinates List)

List of the Sport Luminaire

Luminaire	Index	Position [m]			Aiming Point [m]			Angle [°]	Alignment	Pole
		X	Y	Z	X	Y	Z			
LSHM-1200W(50K)Ultra-Z 20	35	-48.283	27.114	21.200	-8.422	3.576	0.000	24.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	36	-48.283	-27.114	21.200	-8.422	-3.576	0.000	24.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	37	-48.600	26.600	20.500	-31.100	2.607	0.000	34.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	38	-48.600	-26.600	20.500	-31.100	-2.607	0.000	34.6	(C 90, G IMax)	/
LSHM-1200W(50K)Ultra-Z 20	39	-48.300	28.305	20.500	-27.200	48.900	0.000	34.8	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	40	-48.300	-28.305	20.500	-27.200	-48.900	0.000	34.8	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	1	-40.364	-59.673	21.200	-21.359	-29.445	0.000	30.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	2	40.364	-59.673	21.200	21.359	-29.445	0.000	30.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	3	-40.364	59.673	21.200	-21.359	29.445	0.000	30.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	4	40.364	59.673	21.200	21.359	29.445	0.000	30.7	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	41	49.902	-28.379	20.500	8.649	-10.291	0.000	24.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	42	49.902	28.379	20.500	8.649	10.291	0.000	24.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	43	50.300	-27.900	21.200	19.500	-2.600	0.000	28.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	44	50.300	27.900	21.200	19.500	2.600	0.000	28.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	45	50.266	-27.874	20.500	29.500	-1.000	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	46	50.266	27.874	20.500	29.500	1.000	0.000	31.1	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	47	49.815	-29.101	20.500	12.024	-24.600	0.000	28.3	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	48	49.815	29.101	20.500	12.024	24.600	0.000	28.3	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	49	50.218	-29.731	20.500	26.176	-48.581	0.000	33.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	50	50.218	29.731	20.500	26.176	48.581	0.000	33.9	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	51	-48.300	27.100	20.500	-27.900	14.956	0.000	40.8	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	52	-48.300	-27.100	20.500	-27.900	-14.956	0.000	40.8	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	41	49.902	-28.379	21.200	28.500	-14.200	0.000	39.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	42	49.902	28.379	21.200	28.500	14.200	0.000	39.5	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	53	-48.300	28.300	21.200	-15.300	39.300	0.000	31.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	54	-48.300	-28.300	21.200	-15.300	-39.300	0.000	31.4	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	49	50.218	-29.731	21.200	18.800	-29.662	0.000	34.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 40	50	50.218	29.731	21.200	18.800	29.662	0.000	34.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	55	-48.200	27.736	22.000	-9.548	25.100	0.000	29.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	56	-48.200	-27.736	22.000	-9.548	-25.100	0.000	29.6	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	57	49.856	-29.093	21.200	9.900	-17.200	0.000	27.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	58	49.856	29.093	21.200	9.900	17.200	0.000	27.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	59	-48.325	27.131	22.000	-7.300	9.500	0.000	26.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	60	-48.325	-27.131	22.000	-7.300	-9.500	0.000	26.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	61	49.900	-29.100	22.000	17.997	-39.100	0.000	33.3	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	62	49.900	29.100	22.000	17.997	39.100	0.000	33.3	(C 90, G IMax)	Pole Position 1



Operator
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Exterior Scene 1 / Sport Luminaires (Coordinates List)

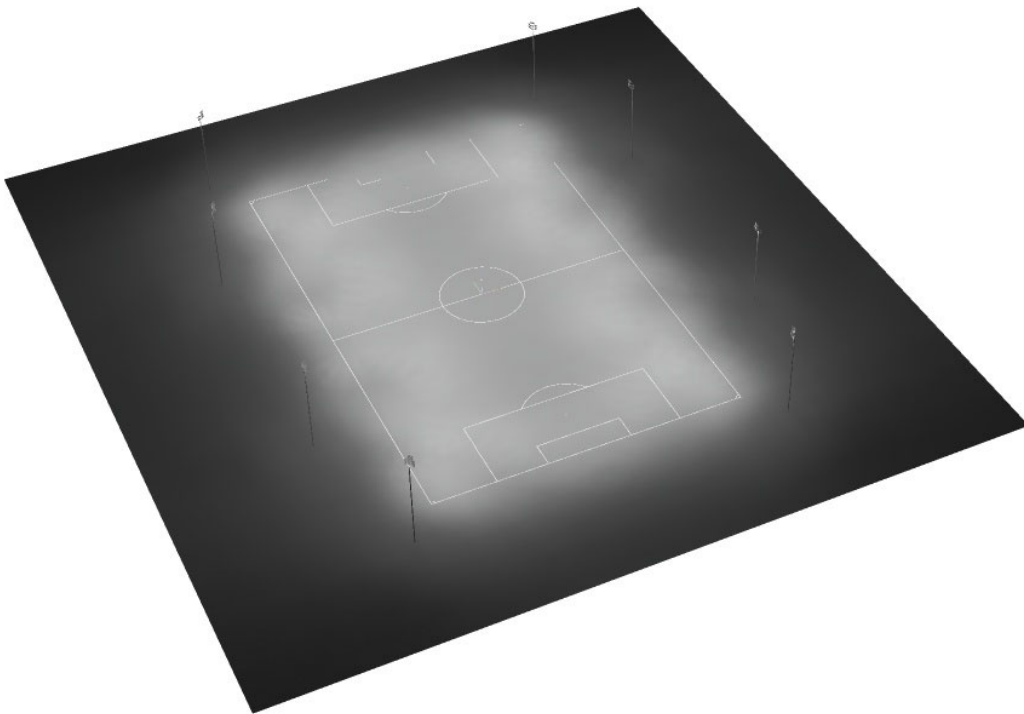
List of the Sport Luminaires

Luminaire	Index	Position [m]			Aiming Point [m]			Angle [°]	Alignment	Pole
		X	Y	Z	X	Y	Z			
LSHM-1200W(50K)Ultra-Z 20	37	-48.600	26.600	21.200	-16.700	2.600	0.000	28.0	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	38	-48.600	-26.600	21.200	-16.700	-2.600	0.000	28.0	(C 90, G IMax)	/
LSHM-1200W(50K)Ultra-Z 20	63	49.941	-28.400	22.000	9.330	-5.114	0.000	25.2	(C 90, G IMax)	Pole Position 1
LSHM-1200W(50K)Ultra-Z 20	64	49.941	28.400	22.000	9.330	5.114	0.000	25.2	(C 90, G IMax)	Pole Position 1



Operator
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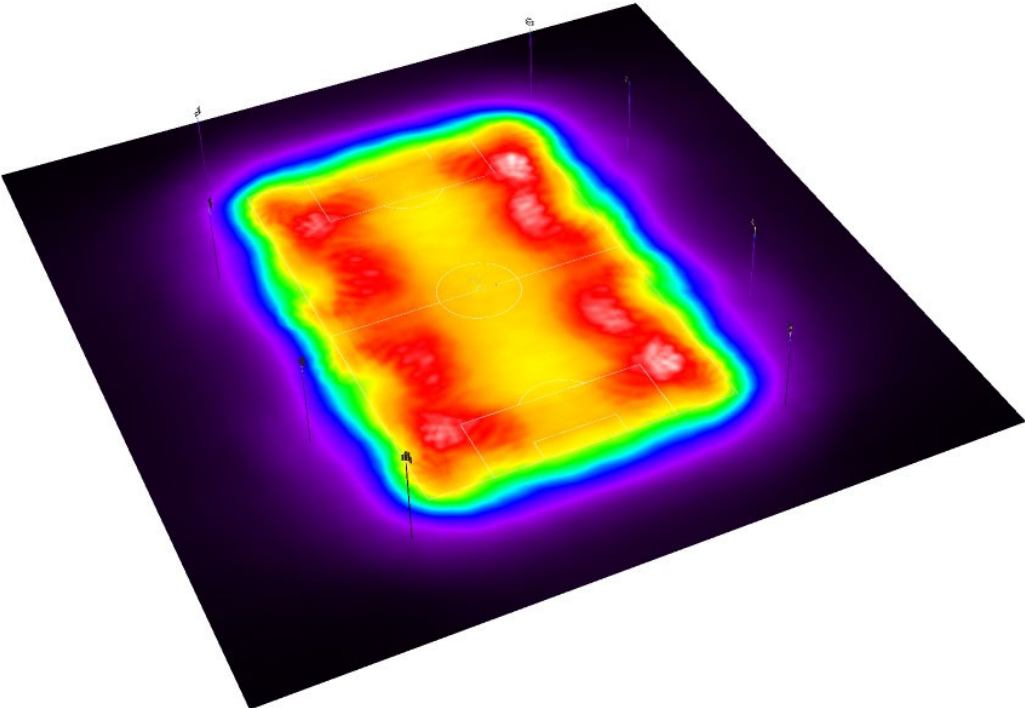
Exterior Scene 1 / 3D Rendering





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Exterior Scene 1 / False Color Rendering

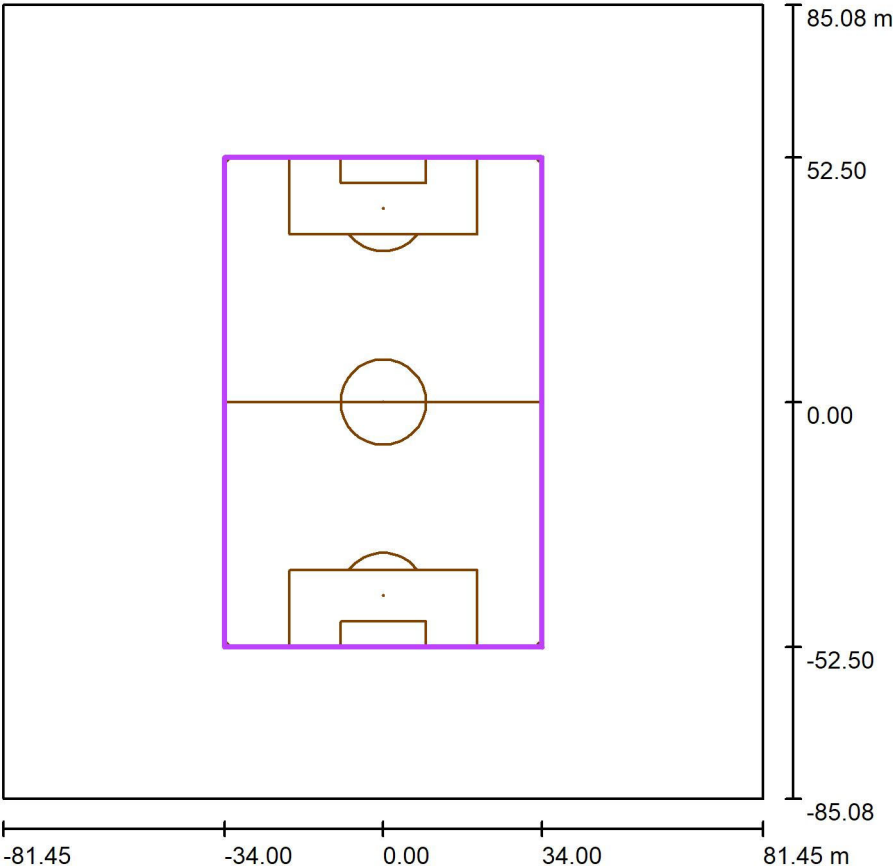


lx



Operator
Telephone
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e-Mail

Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Summary



Scale 1 : 1623

Position: (0.000 m, 0.000 m, 0.000 m)
Size: (105.000 m, 68.000 m)
Rotation: (0.0°, 0.0°, 90.0°)
Type: Normal, Grid: 21 x 13 Points
Belongs to the following sport arena: Soccer Field 1

Results overview

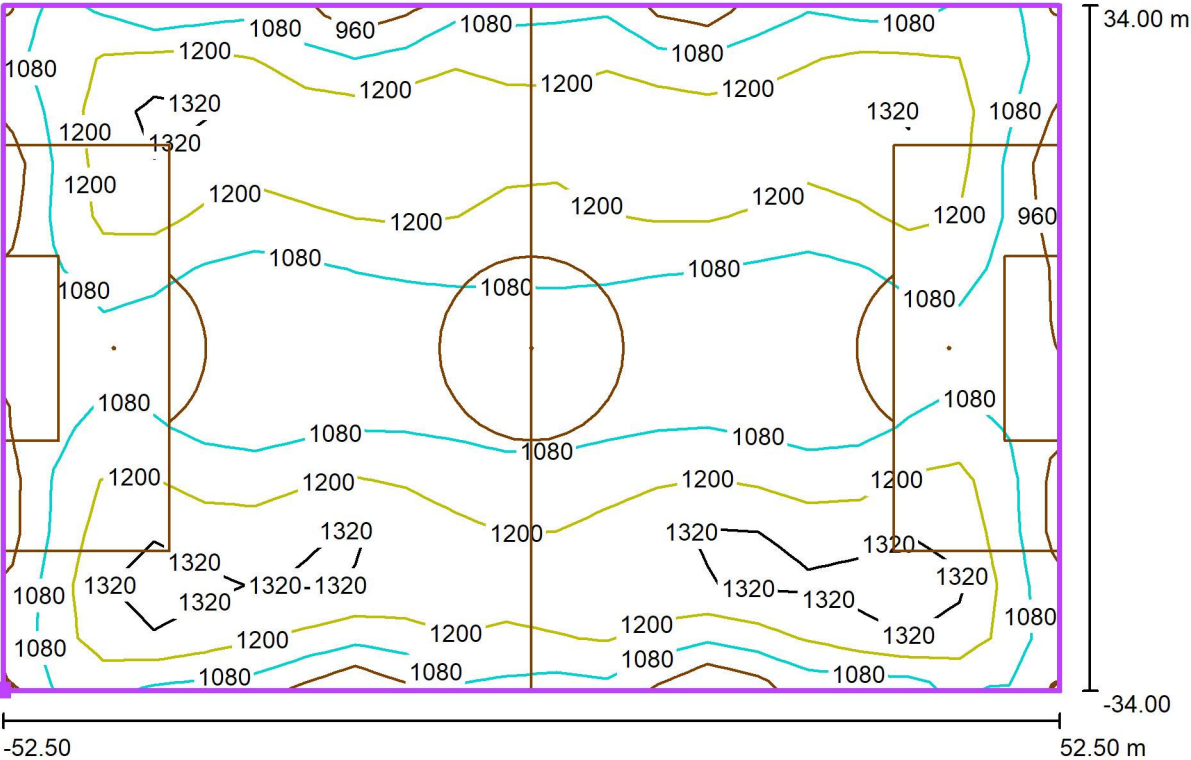
No.	Type	E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	$u0$	E_{min} / E_{max}	$E_{h\ m} / E_m$	H [m]	Camera
1	perpendicular	1152	943	1498	0.82	0.63	/	0.000	/
2	horizontal	1152	943	1498	0.82	0.63	/	0.000	/
3	vertical, 0.0°	1059	441	1936	0.42	0.23	1.09	1.000	/

$E_{h\ m} / E_m$ = Relationship between middle horizontal and vertical illuminance, H = Measuring Height



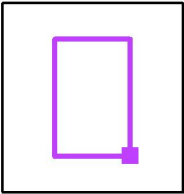
Operator
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Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Isolines (E, Horizontal)



Values in Lux, Scale 1 : 751

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m,
0.000 m)



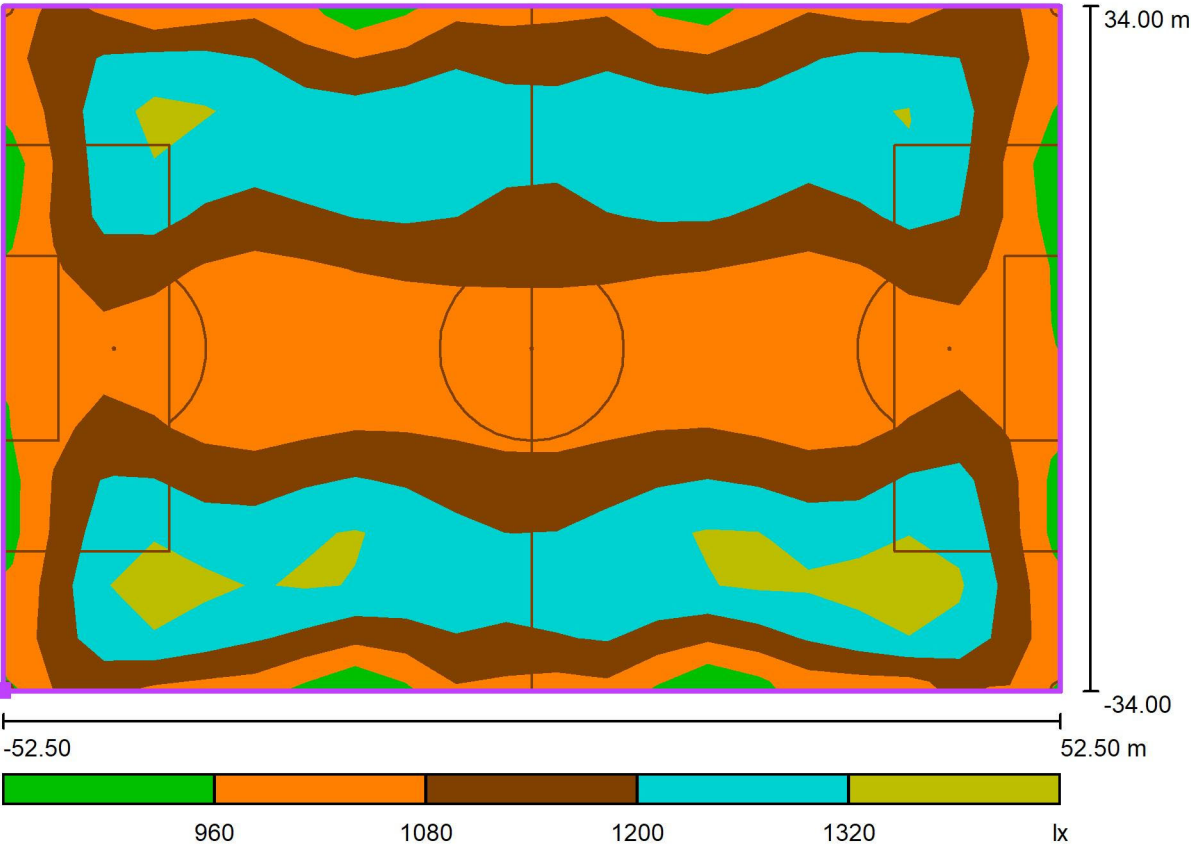
Grid: 21 x 13 Points

E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	u_0	E_{min} / E_{max}
1152	943	1498	0.82	0.63



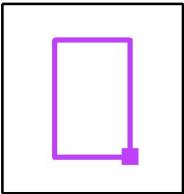
Operator
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e-Mail

Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Greyscale (E, Horizontal)



Scale 1 : 751

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m,
0.000 m)



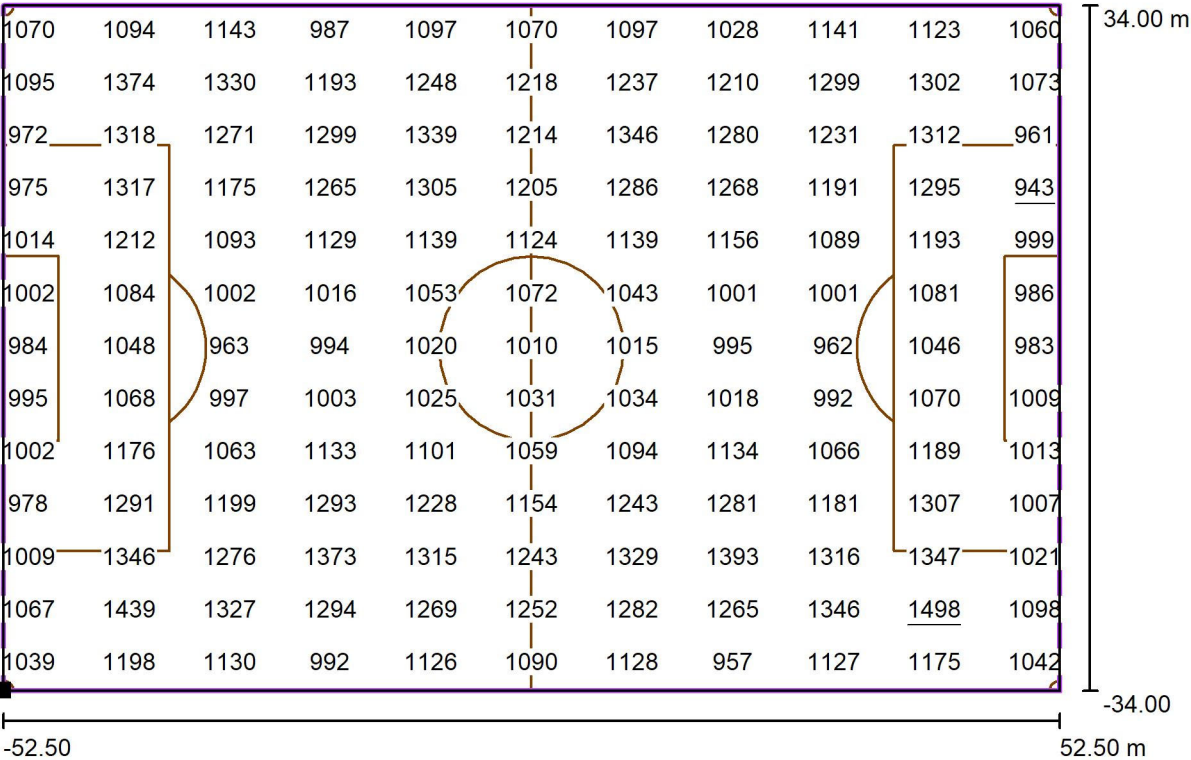
Grid: 21 x 13 Points

E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	u_0	E_{min} / E_{max}
1152	943	1498	0.82	0.63



Operator
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e-Mail

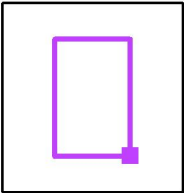
Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Value Chart (E, Horizontal)



Values in Lux, Scale 1 : 751

Not all calculated values could be displayed.

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m,
0.000 m)



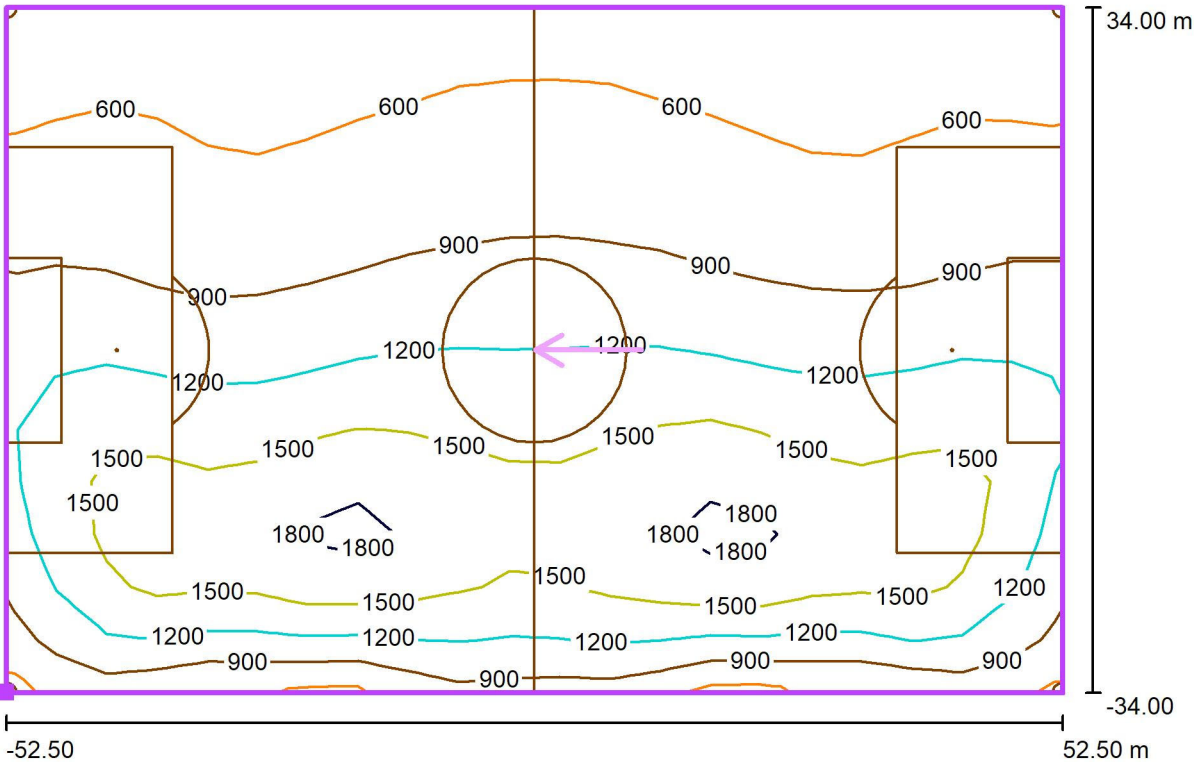
Grid: 21 x 13 Points

E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	u_0	E_{min} / E_{max}
1152	943	1498	0.82	0.63



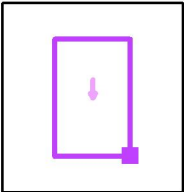
Operator
Telephone
Fax
e-Mail

Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Isolines (E, Vertical)



Values in Lux, Scale 1 : 751

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m,
0.000 m)



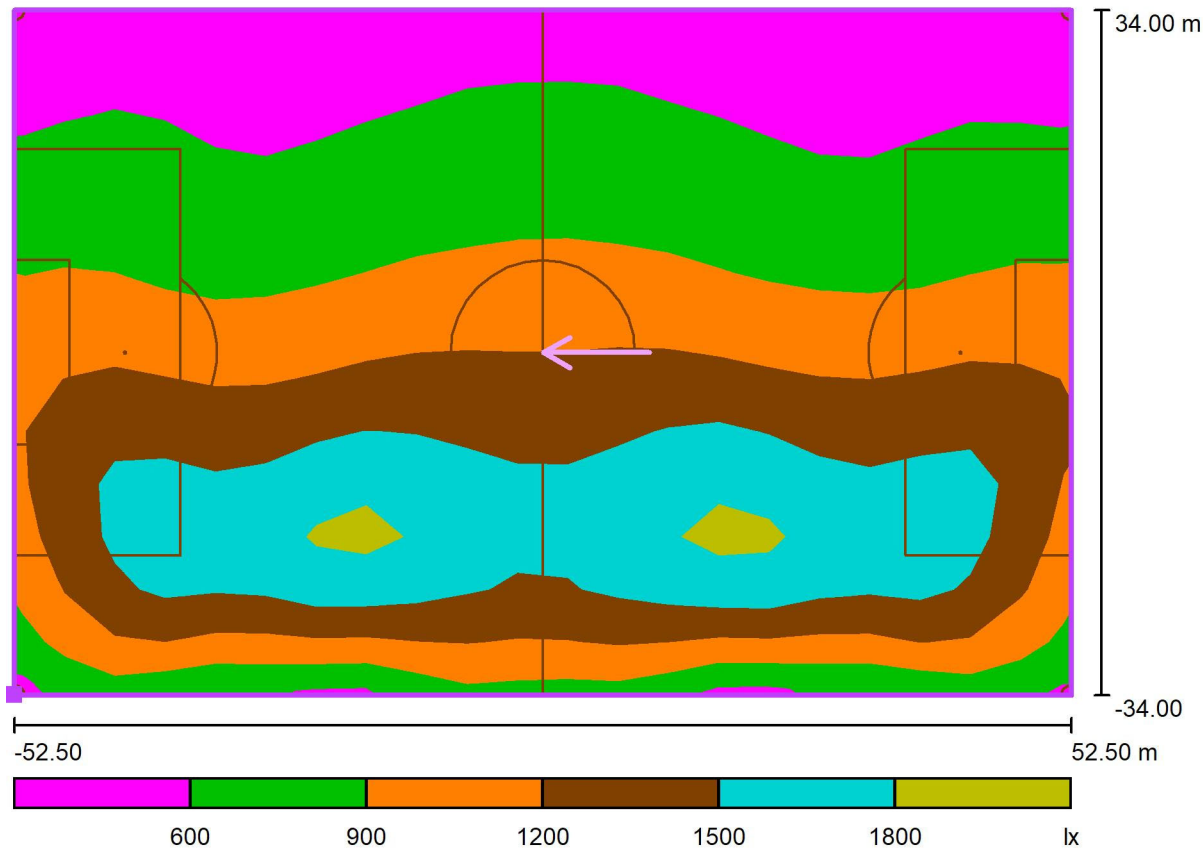
Grid: 21 x 13 Points

E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	u_0	E_{min} / E_{max}
1059	441	1936	0.42	0.23



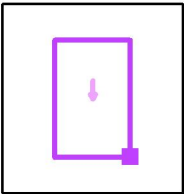
Operator
Telephone
Fax
e-Mail

Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Greyscale (E, Vertical)



Scale 1 : 751

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m, 0.000 m)

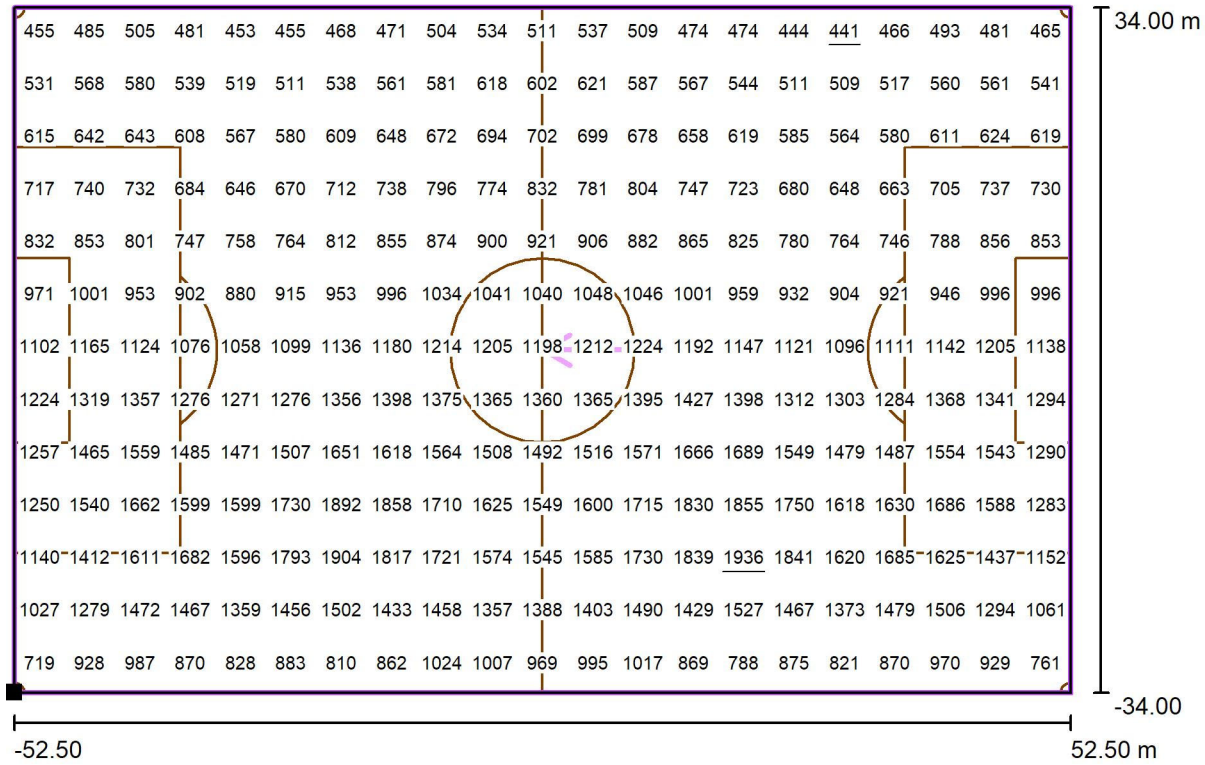


Grid: 21 x 13 Points

E_{av} [lx]	E_{min} [lx]	E_{max} [lx]	u0	E_{min} / E_{max}
1059	441	1936	0.42	0.23

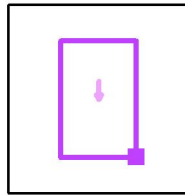
Operator
Telephone
Fax
e-Mail

Exterior Scene 1 / Soccer Field 1 Calculation Grid (PA) / Value Chart (E, Vertical)



Values in Lux, Scale 1 : 751

Position of surface in external scene:
Marked point: (34.000 m, -52.500 m,
0.000 m)



Grid: 21 x 13 Points

E_{av} [lx]
1059

E_{min} [lx]
441

E_{max} [lx]
1936

u_0
0.42

E_{min} / E_{max}
0.23