

Langho FC

3G Pitch

Date: 31-03-2026

Designer: Andy Poplett

Description:

The nominal values shown in this report are the result of precision calculations, based upon precisely positioned luminaires in a fixed relationship to each other and to the area under examination. In practice the values may vary due to tolerances on luminaires, luminaire positioning, reflection properties and electrical supply.

Signify

Unit 3

Guildford Business Park

Guildford

Surrey

GU2 8XG



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1. Project Description

1.1 Description

Maintenance Factor:- 0.90

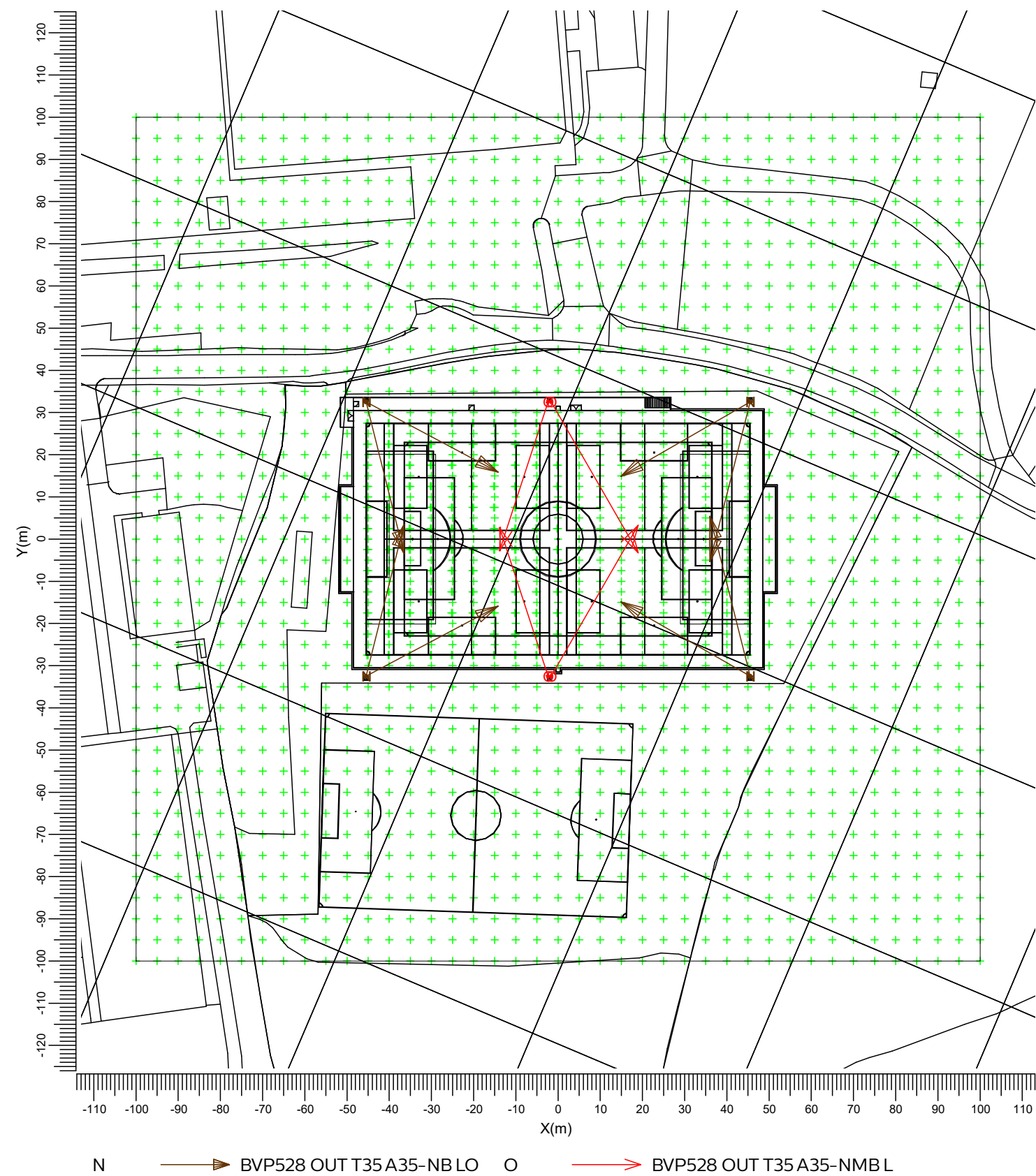
Pitch 91m x 55m (Fenced Area 97m x 61m)

The design has been completed using the Philips Asymmetric OptiVision LED GEN 3.5 A35 Floodlights. A total of 12 no have been used to achieve an average of 200lux.

Floodlights are mounted on 6 x 15 metre columns

All Floodlights fitted with integral LO (maximum cut off) louvres to reduce spill and glare.

1.2 Top Project Overview



Scale
1:1250

2. Summary

2.1 Project Luminaires

Code	Qty	Luminaire Type	Lamp Type	Power (W)	Flux (lm)
N	8	BVP528 OUT T35 A35-NB LO	1 * LED2590-4S/757	1505.9	1 * 259000
O	4	BVP528 OUT T35 A35-NMB LO	1 * LED2590-4S/757	1505.9	1 * 259000

The total installed power: 18.07 (kWatt)

Number of Luminaires Per Switching Mode:

Switching Mode	Luminaire Code		Power (kWatt)
	N	O	
Main Pitch	8	4	18.07
Half Pitch	4	2	9.04
All ON	8	4	18.07

Number of Luminaires Per Arrangement:

Arrangement	Luminaire Code		Power (kWatt)
	N	O	
Centre 1	0	2	3.01
Centre 2	0	2	3.01
Corner 1	4	0	6.02
Corner 2	4	0	6.02

2.2 Calculation Results

Switching Modes:

Code	Switching Mode	Maintenance factor
1	Main Pitch	0.90
2	Half Pitch	0.90
3	All ON	1.00

(II)luminance Calculations:

Calculation	Switching Mode	Type	Unit	Ave Min/AveMin/Max		
Football	1	Surface Illuminance	lux	232	0.70	0.51
Half Pitch	2	Surface Illuminance	lux	209	0.65	0.44
Spillage	3	Surface Illuminance	lux	43.1	0.00	0.00

Obtrusive Light Calculations:

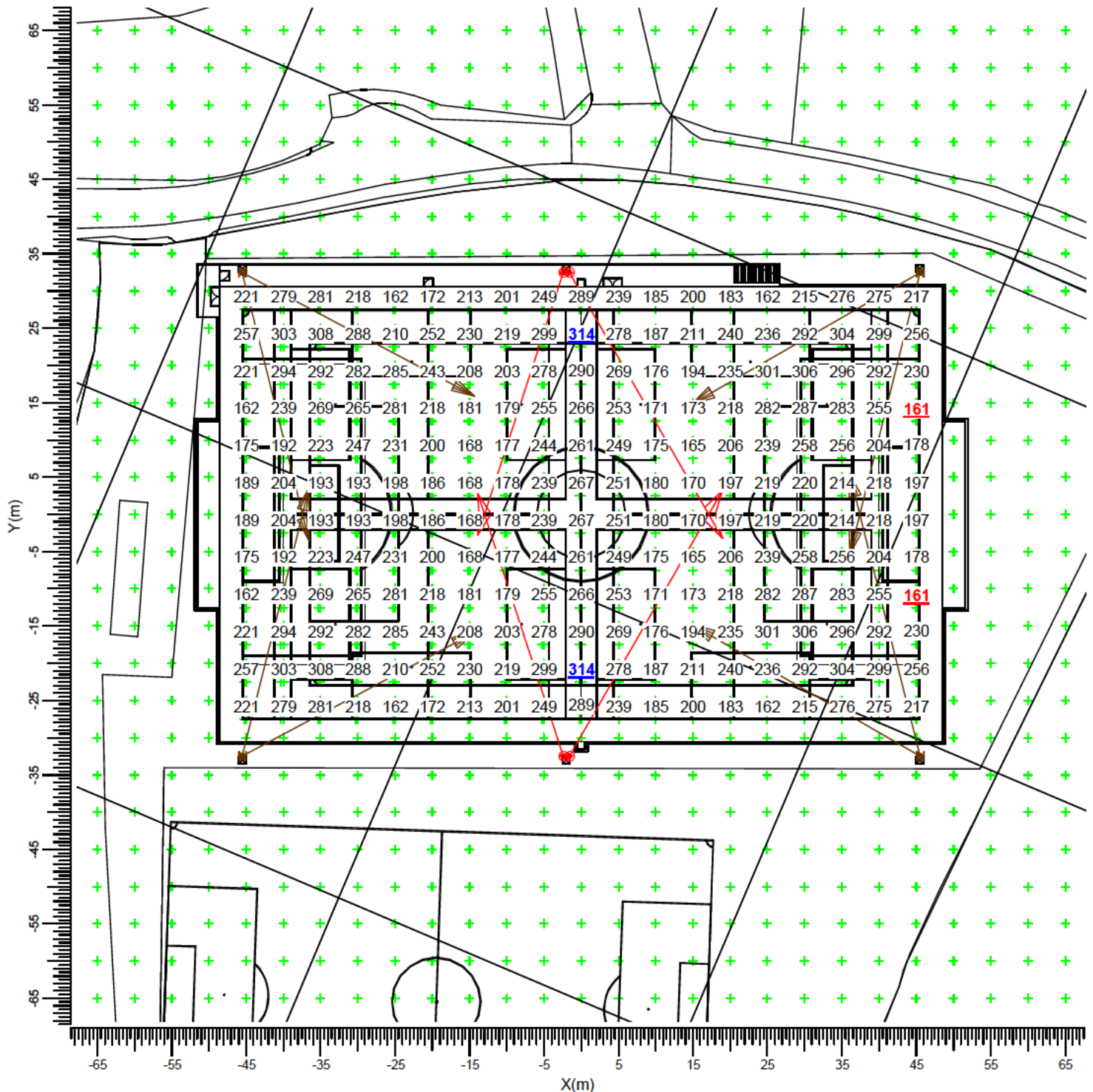
Switching Mode	ULR
1	0.00
2	0.00
3	0.00

3. Calculation Results

3.1 Football: Graphical Table

Main Pitch

Grid : Football at Z = -0.00 m
Calculation : Surface Illuminance (lux)



N ———> BVP528 OUT T35 A35-NB L O ———> BVP528 OUT T35 A35-NMB L

Average
232

Min/Ave
0.70

Min/Max
0.51

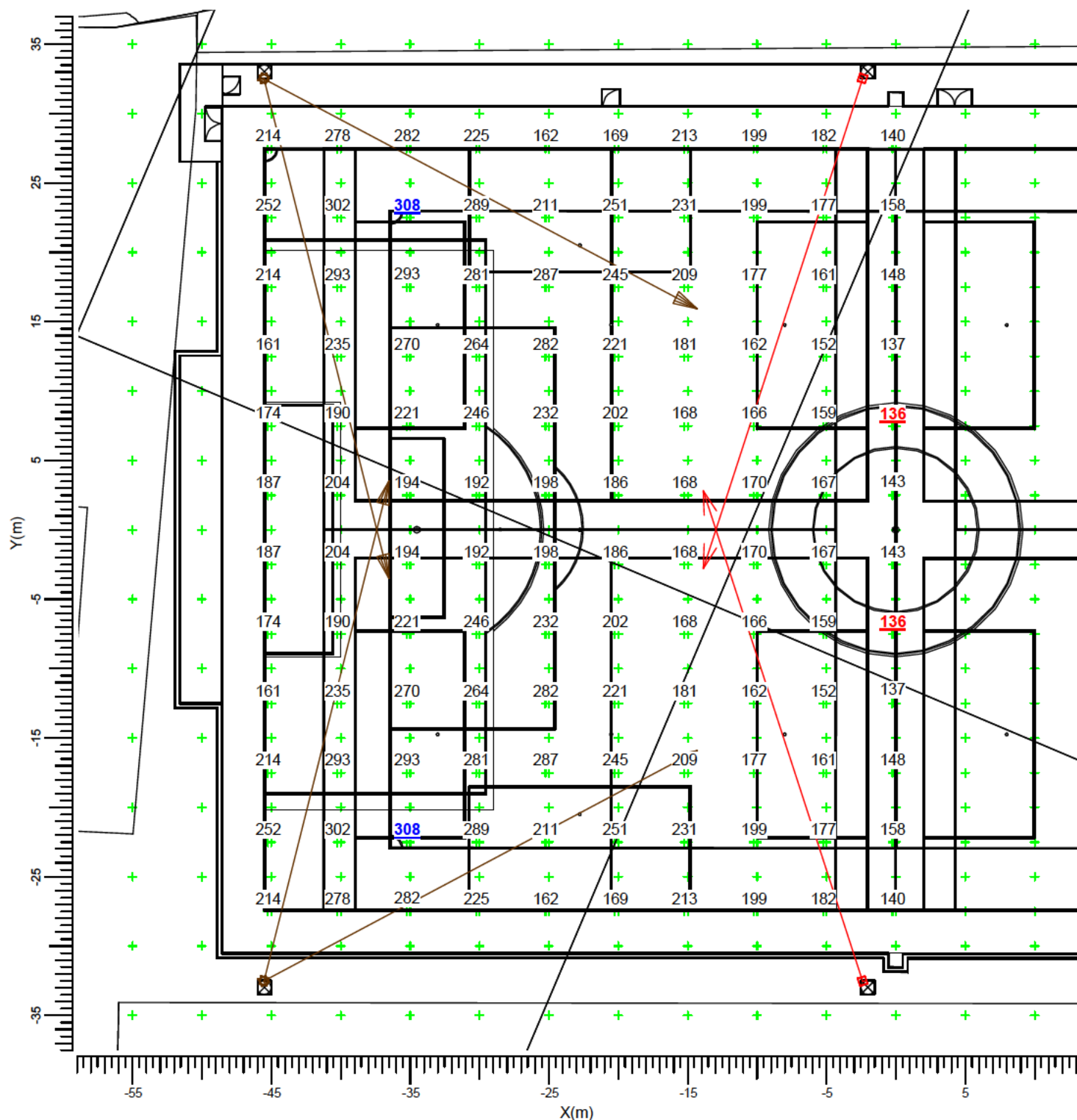
Project maintenance factor
0.90

Scale
1:750

3.2 Half Pitch: Graphical Table

Half Pitch

Grid : Half Pitch at Z = -0.00 m
 Calculation : Surface Illuminance (lux)



Average
209

Min/Ave
0.65

Min/Max
0.44

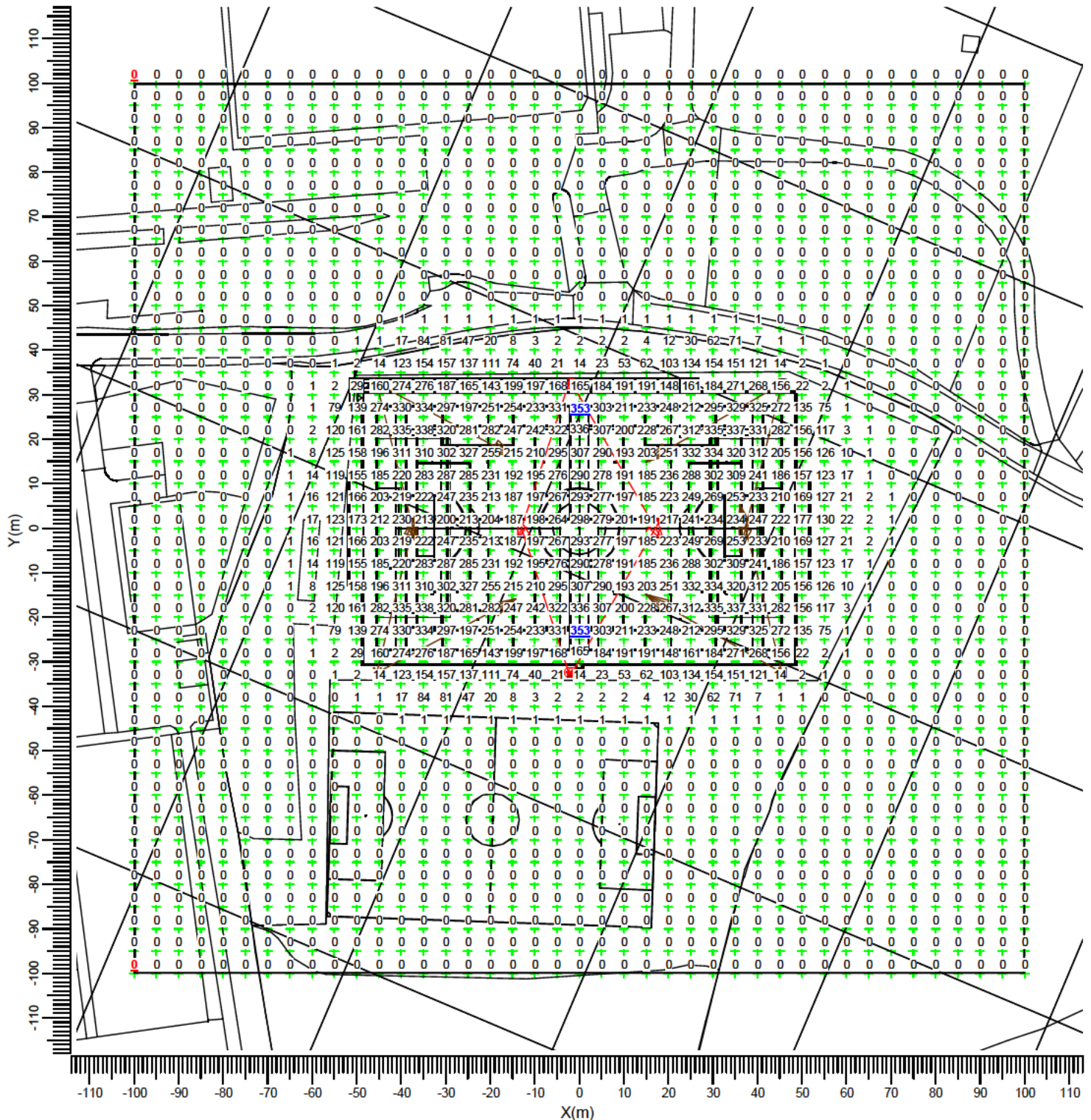
Project maintenance factor
0.90

Scale
1:400

3.3 Spillage: Graphical Table

All ON

Grid : Spillage at Z = -0.00 m
Calculation : Surface Illuminance (lux)



N



BVP528 OUT T35 A35-NB LO

O

BVP528 OUT T35 A35-NMB L

Average
43.1

Min/Ave
0.00

Min/Max
0.00

Project maintenance factor
1.00

Scale
1:1250

3.4 Spillage: Iso Contour

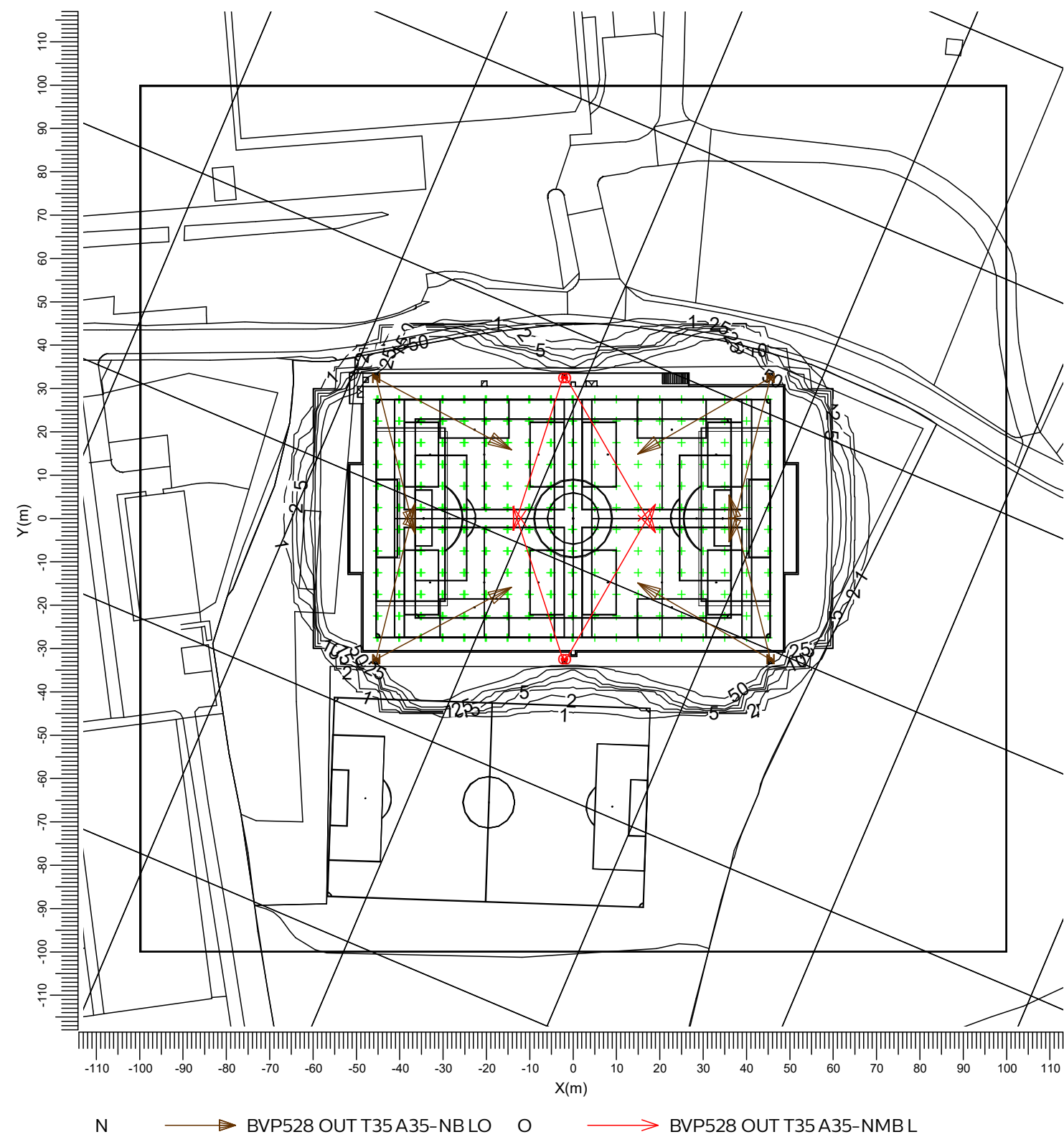
All ON

Grid

Calculation

: Spillage at Z = -0.00 m

: Surface Illuminance (lux)



Average
43.1

Min/Ave
0.00

Min/Max
0.00

Project maintenance factor
1.00

Scale
1:1250

3.5 Spillage: Filled Iso Contour

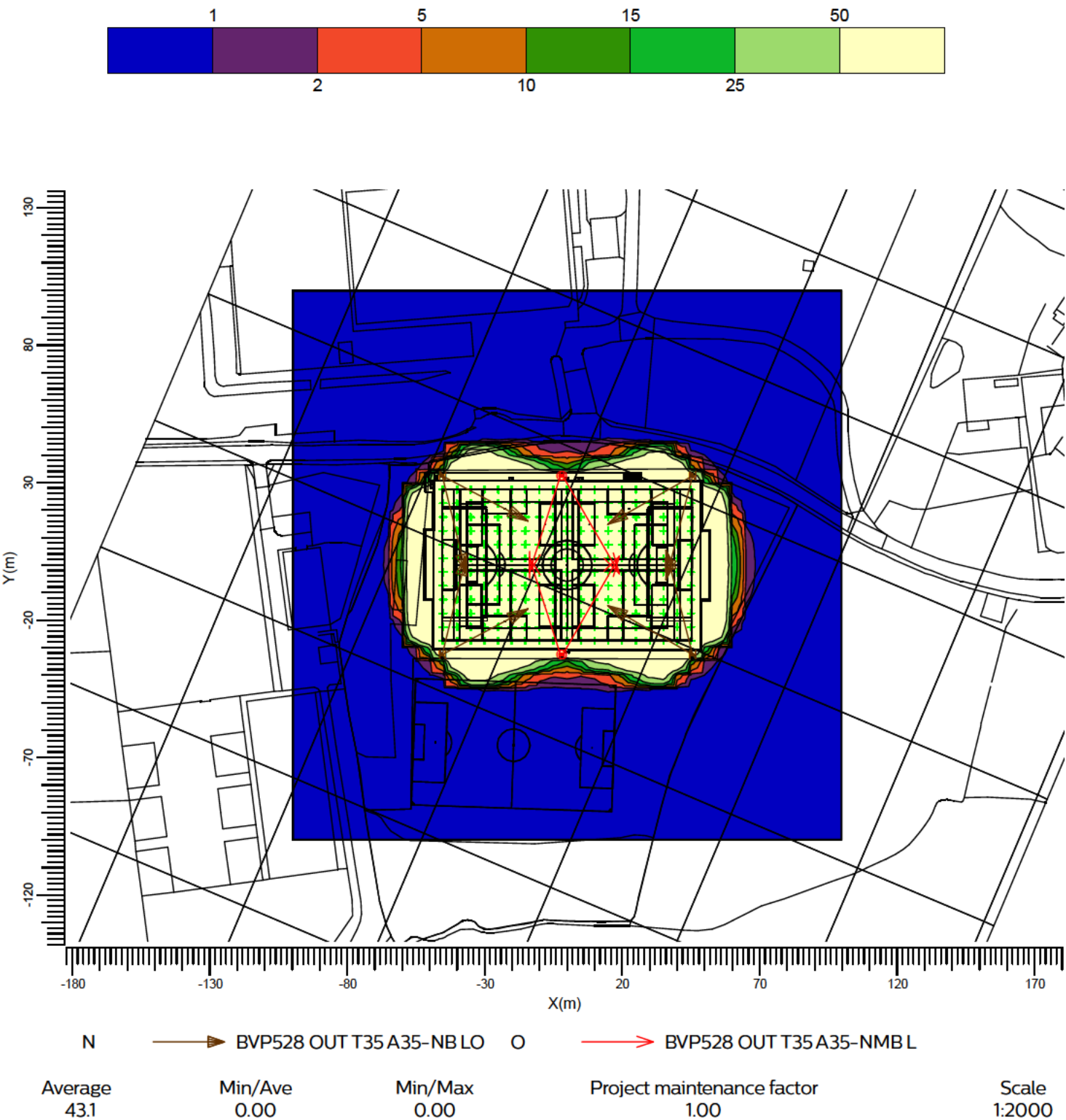
All ON

Grid

Calculation

: Spillage at Z = -0.00 m

: Surface Illuminance (lux)



4. Luminaire Details

4.1 Project Luminaires

OptiVision LED gen3.5 2022

BVP528 OUT T35 1xLED2590-4S/757/757 E3/D4I A35-NB LO

Light output ratios

DLOR : 0.59

ULOR : 0.00

TLOR : 0.59

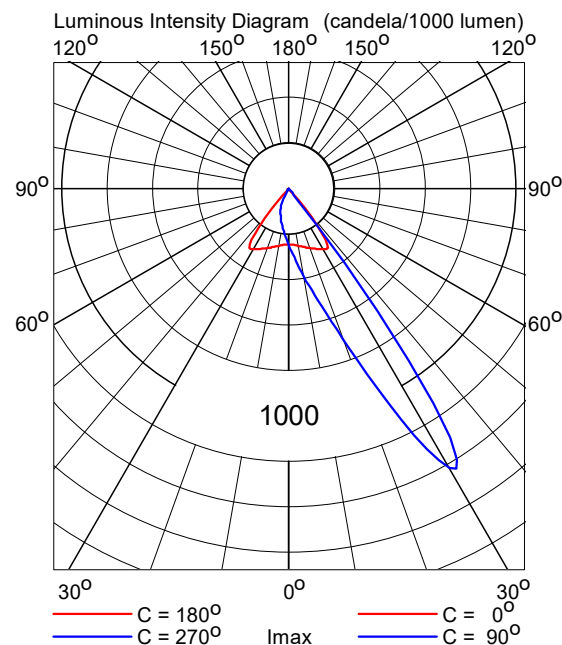
Ballast : E3/D4I

Lamp flux : 259000 lm

Luminaire wattage : 1505.9 W

Measurement code : LVM2047300

Note: Luminaire data not from database.



OptiVision LED gen3.5 2022

BVP528 OUT T35 1xLED2590-4S/757/757 E3/D4I A35-NMB LO

Light output ratios

DLOR : 0.58

ULOR : 0.00

TLOR : 0.58

Ballast : E3/D4I

Lamp flux : 259000 lm

Luminaire wattage : 1505.9 W

Measurement code : LVM2L47600

Note: Luminaire data not from database.

