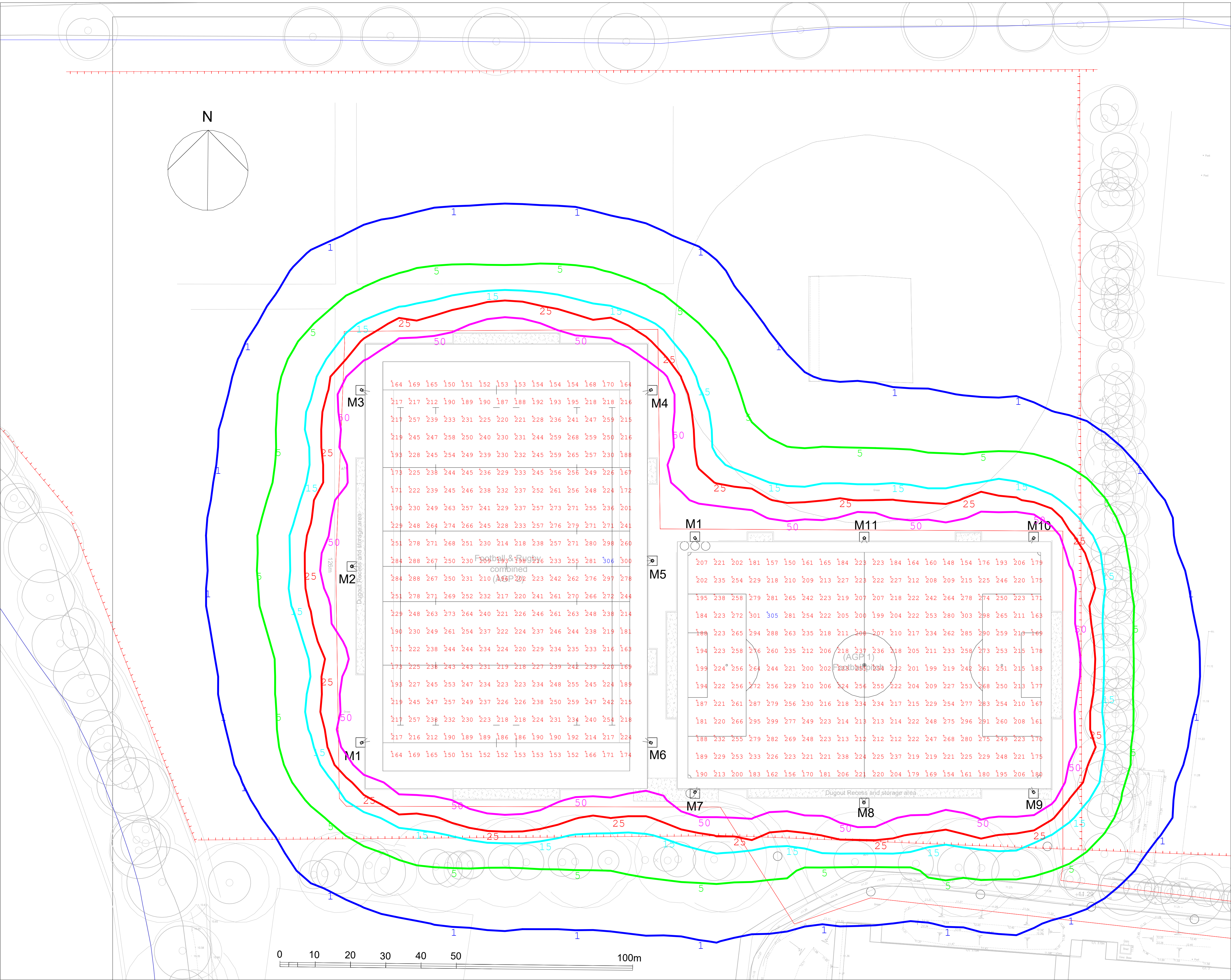




Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M1,M3,M4,M6.....2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux
Uniformity(Min/Ave)=0.66

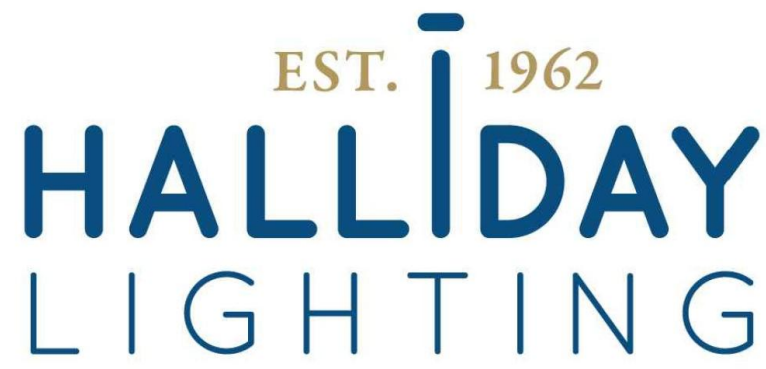
Football Pitch
Initial(100 Hrs)
E(i)225 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux
Uniformity(Min/Ave)=0.66

Grid values in Lux(Initial - MF=1.0)
Grid interval = 5m x 5m.

Contour values in Lux (Initial - Horizontal - MF=1.0).
Contours: 2,5,10,15,25,50 Lux.

Treeline Calculations
Vertical Spill Illuminance(Initial - MF=1.0)
Direct & Indirect Component
Grid Interval = 2m x 2m
Grid Height = 0m to 10m AGL

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%
Upward Light Ratio = 0%



Project
WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON

www.hallidaylighting.co.uk

Drawing Title
Horizontal Plane Illumination
Ground Level
200 Lux Class II - Full Power

Drawn By (print)
Neil Johnson

Date
08/03/2024

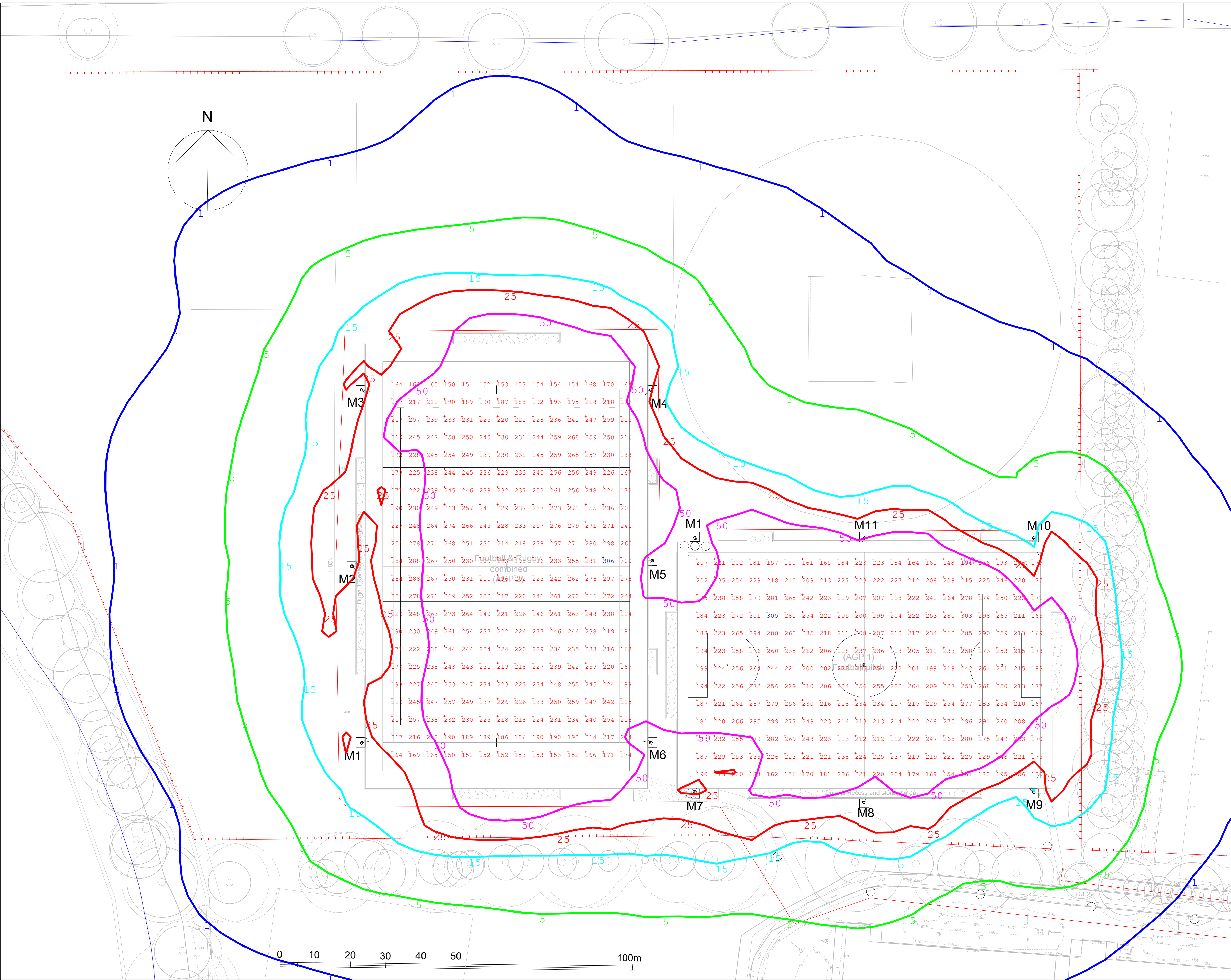
Project No
HLS6400 Rev 2

Scale
A1 1:500

Drawing No
E01

Status
Proposal

Calculation Summary - Initial Values (MF=1.0)							
Label	CalcType	Units	Avg	Max	Min	Min/Avg	Min/Max
Rugby	Horizontal Illuminance	Lux	228.54	306	150	0.66	0.49
Football	Horizontal Illuminance	Lux	225.43	305	148	0.66	0.49
North Treeline	Vertical Illuminance	Lux	0.33	0.84	0.10	0.30	0.12
East Treeline	Vertical Illuminance	Lux	8.87	22.14	0.42	0.05	0.02
South Treeline - 1	Vertical Illuminance	Lux	10.86	29.22	0.23	0.02	0.01
South treeline - 2	Vertical Illuminance	Lux	8.80	25.75	0.05	0.01	0.00
West 1 Treeline - 1	Vertical Illuminance	Lux	0.77	1.04	0.49	0.64	0.47
West 2 Treeline - 2	Vertical Illuminance	Lux	0.15	0.52	0.03	0.20	0.06



Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M1,M3,M4,M6.....2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux

Uniformity(Min/Ave)=0.66

Football Pitch
Initial(100 Hrs)
E(i)225 Lux

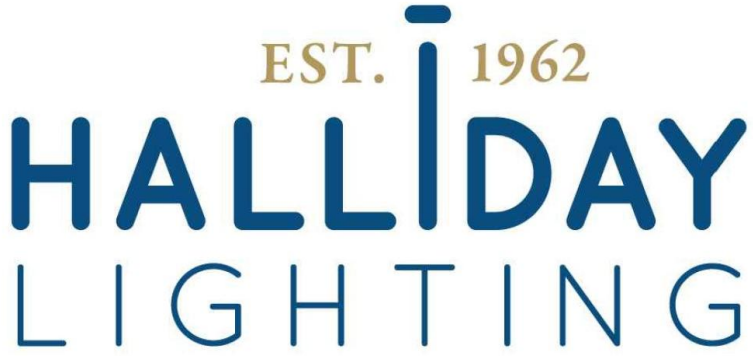
Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux

Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 0m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%

Upward Light Ratio = 0%



Project
**WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON**

www.hallidaylighting.co.uk

Drawing Title
**Vertical Spill at 0m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)**

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M1,M3,M4,M6...2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux

Uniformity(Min/Ave)=0.66

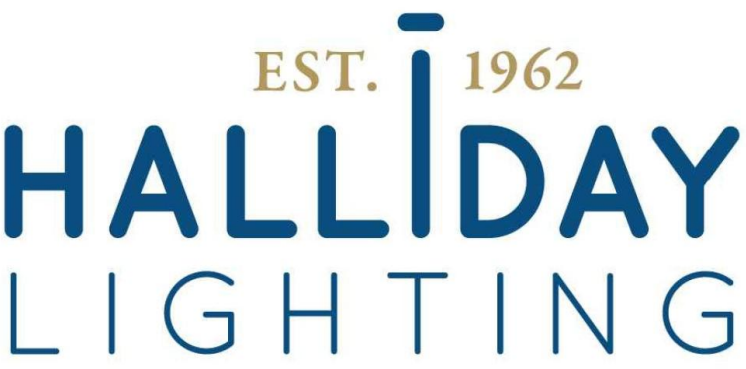
Football Pitch
Initial(100 Hrs)
E(i)225 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux

Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 2m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%
Upward Light Ratio = 0%



Project
**WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON**

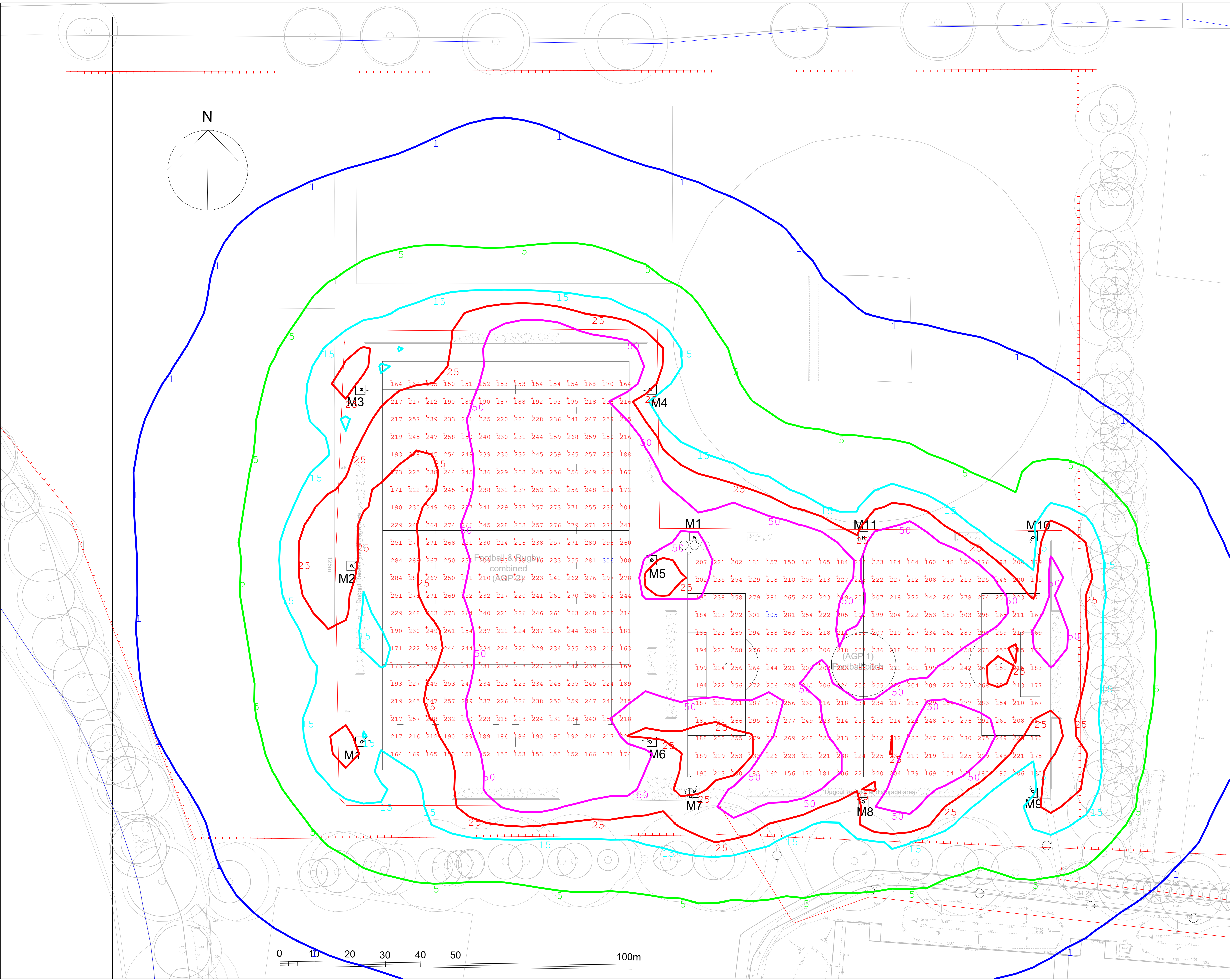
www.hallidaylighting.co.uk

Drawing Title
**Vertical Spill at 2m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)**

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M1,M3,M4,M6...2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux

Uniformity(Min/Ave)=0.66

Football Pitch
Initial(100 Hrs)
E(i)225 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux

Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 4m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%
Upward Light Ratio = 0%



Project
**WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON**

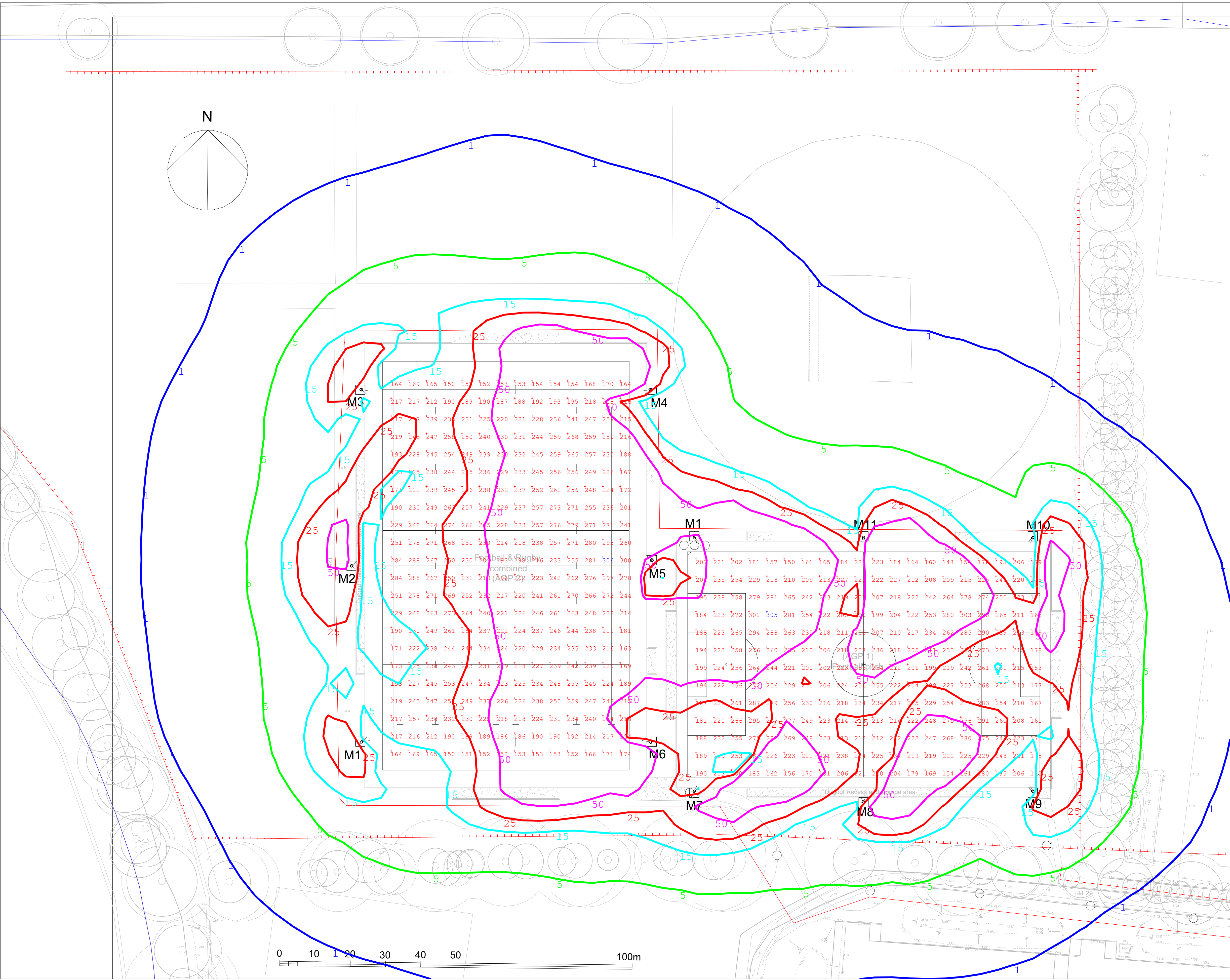
www.hallidaylighting.co.uk

Drawing Title
**Vertical Spill at 4m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)**

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M1,M3,M4,M6...2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux
Uniformity(Min/Ave)=0.66

Football Pitch
Initial(100 Hrs)
E(i)225 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux
Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 6m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%
Upward Light Ratio = 0%



Project
WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON

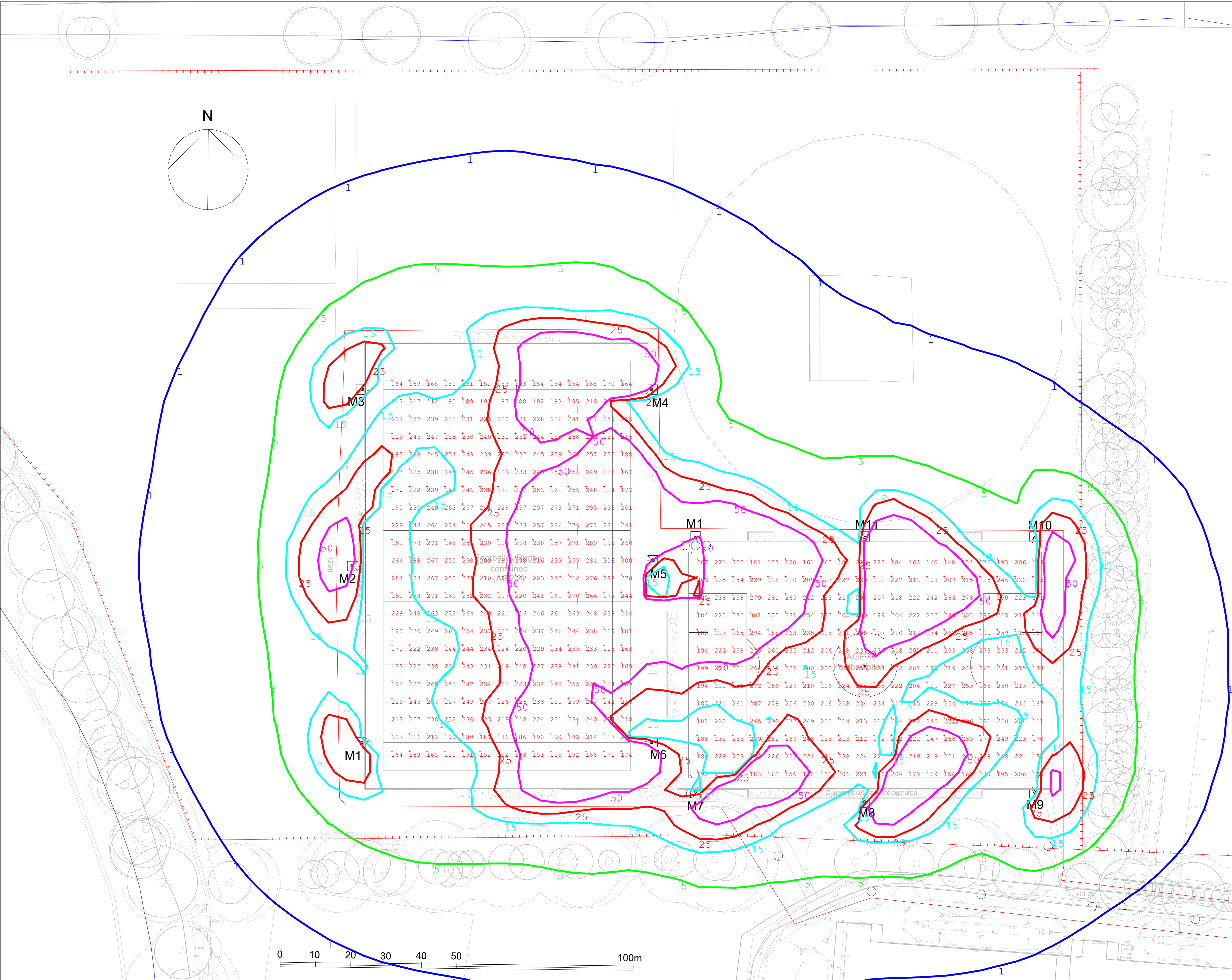
www.hallidaylighting.co.uk

Drawing Title
Vertical Spill at 6m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M1,M3,M4,M6...2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-
M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

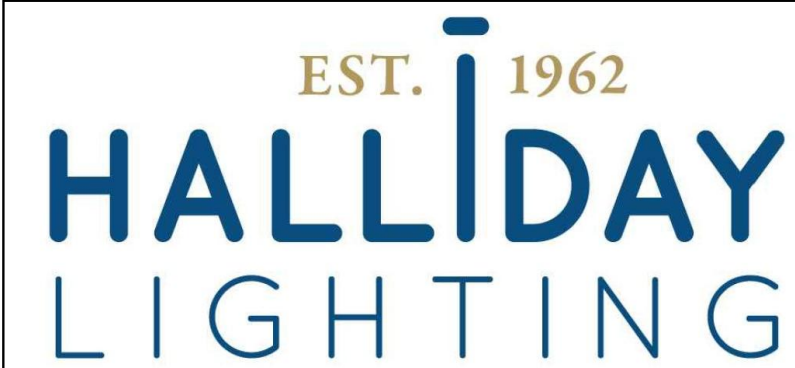
LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux
Uniformity(Min/Ave)=0.66

Football Pitch
Initial(100 Hrs)
E(i)225 Lux
Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux
Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 8m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%
Upward Light Ratio = 0%



Project
WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON

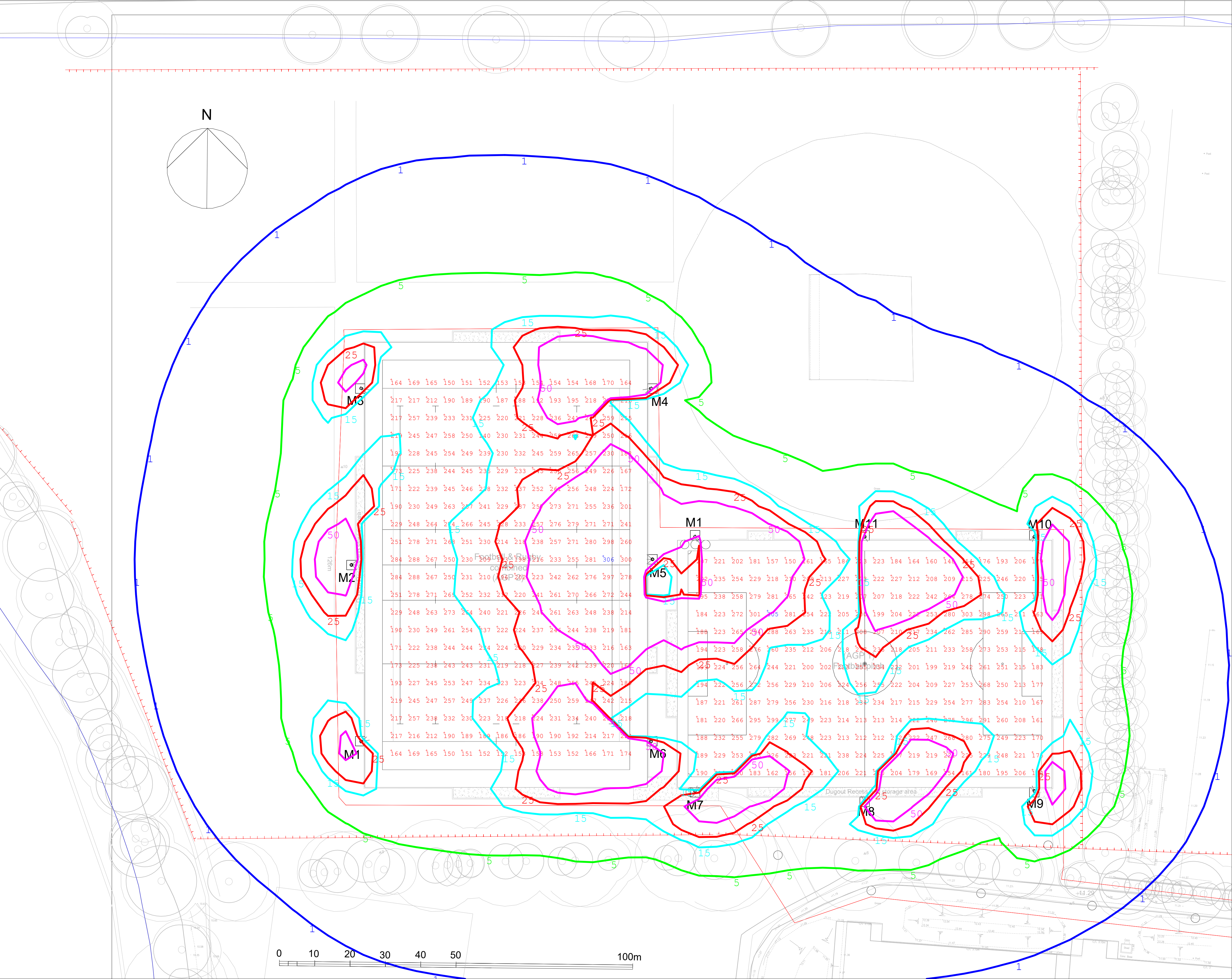
www.hallidaylighting.co.uk

Drawing Title
Vertical Spill at 8m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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Rugby Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M1,M3,M4,M6...2 x FL11 Maxi Pro PL33T + FS3K Shields
M2,M5.....3 x FL11 Maxi Pro PL33T + FS3K Shields

Football Pitch
6 x 18m Masts
Each carrying the following Siteco FL11 LED Floodlights :-

M7-M12.....2 x FL11 Maxi Pro PL33T + FS3K Shields

LED Performance
FL11 Maxi Pro PL33T(3 Brick)
Lumen Output - 172141 Lm
Connected Load - 1539W
Colour Temperature - 3000K
CRI - 70

Illuminance Levels(Full Power)
Rugby Pitch
Initial(100 Hrs)
E(i)228 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=205 Lux

Uniformity(Min/Ave)=0.66

Football Pitch
Initial(100 Hrs)
E(i)225 Lux

Maintained(50000 Hrs) - (MF=0.90)
E(m)=203 Lux

Uniformity(Min/Ave)=0.66

Contour values in Lux (Initial - Vertical - MF=1.0).
Direct & Indirect Component
Grid at 10m AGL
Contours: 2.5,10,15,25,50 Lux.

Pitch Reflectance - 28%
Surrounding Grass Reflectance - 20%

Upward Light Ratio = 0%



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Project
WIDE LANE SPORTS FIELD
UNIVERSITY OF SOUTHAMPTON

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Drawing Title
Vertical Spill at 10m AGL
Direct & Indirect Component
(200 Lux on Horizontal Plane)

Drawn By (print) Neil Johnson	Date 08/03/2024
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Project No HLS6400 Rev 2	Scale A1 1:500
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Drawing No E01	Status Proposal
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