

DATE: 14 June 2019
DESIGNER: CT
PROJECT No: C85850
PROJECT NAME: Bartons Road, Havant



S38 Street Lighting Design to BS EN 13201:2015

Rev D

Standard - Class P6 with S/P Ratio 1.43
Eav = 1.29 - 1.93
Emin = 0.40

This report is to be read in conjunction with drawing no. C85850-D116 and D118

Column types B and E are shown for reference only.

C85850-C111 D S38 Street Lighting

PREPARED BY: JNP Group
3rd Floor
Marlborough House
48 Holly Walk
Leamington Spa
CV32 4XP

e-mail: midlands@jnpgroup.co.uk
website: www.jnpgroup.co.uk

Layout Report

General Data

Dimensions in Metres Angles in Degrees

Calculation Grids

ID	Grid Name	X	Y	X' Length	Y' Length	X' Spacing	Y' Spacing
1	Grid 1	473369.83	107784.54	66.47	231.16	1.48	1.50
2	Grid 2	473105.46	107781.46	273.27	78.99	1.49	1.49
3	Grid 3	473040.00	107696.15	84.19	170.75	1.48	1.50
4	Grid 4 - Pedestrian Crossi...	473394.00	107841.00	11.75	5.00	1.47	1.25
5	Grid 5 - Pedestrian Crossi...	473407.00	107835.00	6.00	18.00	1.50	1.50
6	Grid 6 - Pedestrian Crossi...	473273.60	107809.18	17.93	5.00	1.49	1.25
7	Grid 7 - Pedestrian Crossi...	473164.71	107818.61	18.12	4.00	1.39	1.33

Luminaires

Luminaire A Data



Supplier	Philips
Type	BGP615 DW50 BL1
Lamp(s)	LED-HB 5.1S
Lamp Flux (klm)	1.20
File Name	Luma Micro_BGP615_DW50 BL1_1200_6LED_5.1S_CLO_L90_NW.ies
Maintenance Factor	0.85
Imax70,80,90(cd/klm)	602.5, 31.2, 0.0
Lamp S/P Ratio	1.61
No. in Project	15

Luminaire B Data



Supplier	Philips
Type	SGS253 FG OR P3
Lamp(s)	SON-TTP150W
LampFlux(klm)/Colour	17.50 -/-
File Name	SGS253 FG 1xSON-TTP150W OR P3.Idt
Maintenance Factor	0.85
Imax70,80,90(cd/klm)	306.5, 10.0, 0.0
Lamp S/P Ratio	0.00
No. in Project	2

Luminaire C Data



Supplier	Philips
Type	BGP615 DN50 BL1
Lamp(s)	LED-HB 5.1S
Lamp Flux (klm)	0.80
File Name	Luma Micro_BGP615_DN50 BL1_800_6LED_5.1S_CLO_L90_NW.ies
Maintenance Factor	0.85
Imax70,80,90(cd/klm)	781.2, 25.7, 0.0
Lamp S/P Ratio	1.61
No. in Project	5

Luminaire D Data



Supplier	Philips
Type	BGP615 DW50 BL1
Lamp(s)	LED-HB 5.1S
Lamp Flux (klm)	5.40
File Name	Luma Micro_BGP615_DW50 BL1_5400_20LED_5.1S_CLO_L90_NW.ies
Maintenance Factor	0.85
Imax70,80,90(cd/klm)	602.5, 31.2, 0.0
Lamp S/P Ratio	1.61
No. in Project	1

Luminaires



Luminaire E Data

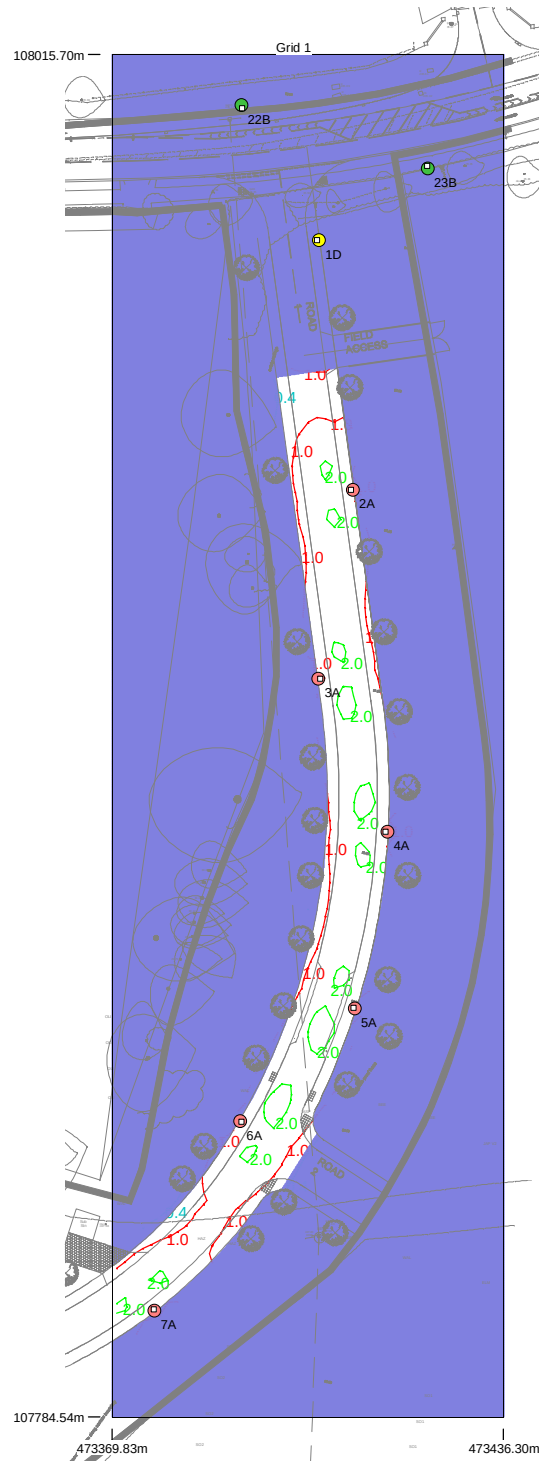
Supplier	_Historic Lanterns
Type	2566 PNN L4
Lamp(s)	1 FSD 36 2900 4000 2G11
LampFlux(klm)/Colour	2.90 6500 / 82
File Name	Libra 2566 PNN L4 1 FSD 36 2900 4000 2G11.kdt
Maintenance Factor	0.85
Imax70,80,90(cd/klm)	166.0, 84.0, 6.0
Lamp S/P Ratio	0.00
No. in Project	1

Layout

ID	Type	X	Y	Height	Angle	Tilt	Cant	Out-reach	Target X	Target Y	Target Z
1	D	473404.86	107984.25	6.00	188.00	0.00	0.00	0.30			
2	A	473410.64	107941.90	6.00	188.00	0.00	0.00	0.30			
3	A	473404.84	107909.80	6.00	8.00	0.00	0.00	0.30			
4	A	473416.51	107883.88	6.00	177.00	0.00	0.00	0.30			
5	A	473411.03	107853.90	6.00	160.00	0.00	0.00	0.30			
6	A	473391.55	107834.86	6.00	330.00	0.00	0.00	0.30			
7	A	473377.03	107802.67	6.00	126.00	0.00	0.00	0.30			
8	A	473344.72	107800.03	6.00	267.00	0.00	0.00	0.30			
9	A	473309.06	107799.89	6.00	72.00	0.00	0.00	0.30			
10	A	473282.15	107819.02	6.00	252.00	0.00	0.00	0.30			
11	A	473246.10	107819.83	6.00	72.00	0.00	0.00	0.30			
12	A	473211.58	107836.34	6.00	273.00	0.00	0.00	0.30			
13	A	473176.24	107831.80	6.00	278.00	0.00	0.00	0.30			
14	A	473155.13	107828.99	6.00	278.00	0.00	0.00	0.30			
15	A	473125.74	107820.25	6.00	8.00	0.00	0.00	0.30			
16	A	473120.12	107850.63	6.00	278.00	0.00	0.00	0.30			
17	C	473079.44	107845.19	6.00	278.00	0.00	0.00	0.30			
18	C	473061.98	107818.31	6.00	177.00	0.00	0.00	0.30			
19	C	473061.12	107779.70	6.00	176.00	0.00	0.00	0.30			
20	C	473059.05	107748.04	6.00	15.00	0.00	0.00	0.30			
21	C	473058.99	107721.61	6.00	318.00	0.00	0.00	0.30			
22	B	473391.80	108007.07	10.00	277.00	5.00	0.00	0.50			
23	B	473423.35	107996.37	10.00	101.00	5.00	0.00	0.50			
24	E	473042.81	107700.48	5.00	2.00	0.00	0.00	0.75			

Horizontal Illuminance (lux)

Grid 1



Results

Eav	1.45
Emin	0.48
Emax	2.37
Emin/Emax	0.20
Emin/Eav	0.33

Horizontal Illuminance (lux)

Grid 1

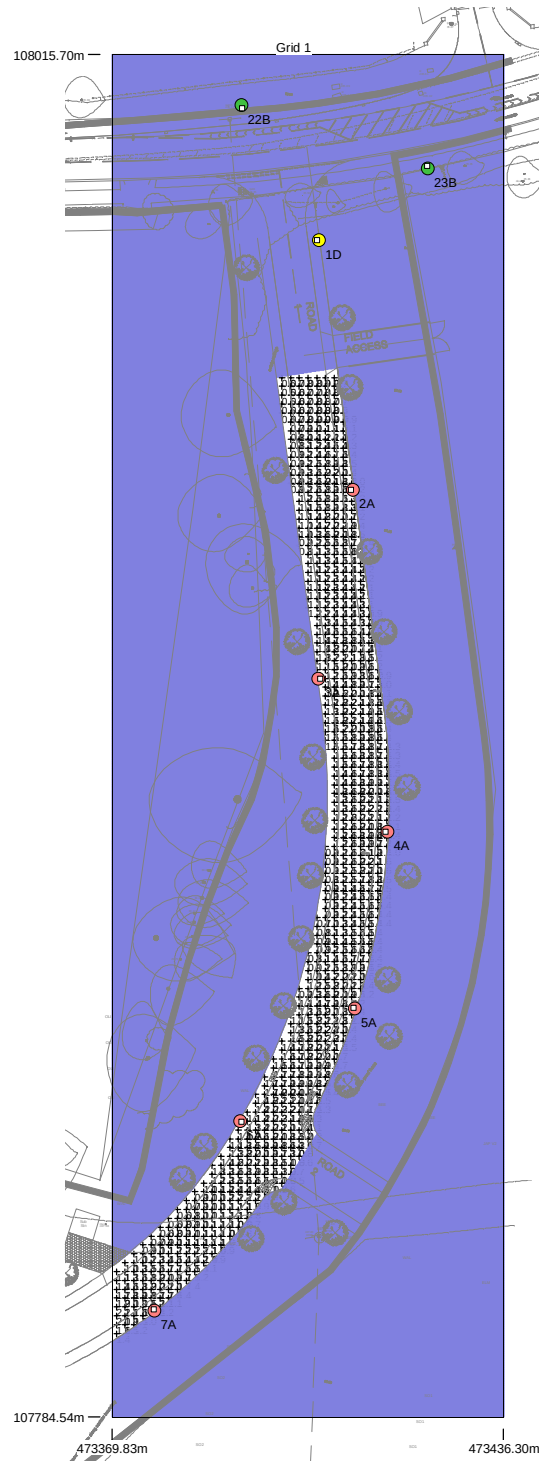


Results

Eav	1.45
Emin	0.48
Emax	2.37
Emin/Emax	0.20
Emin/Eav	0.33

Horizontal Illuminance (lux)

Grid 1



Results

Eav	1.45
Emin	0.48
Emax	2.37
Emin/Emax	0.20
Emin/Eav	0.33

Horizontal Illuminance (lux)

Grid 2

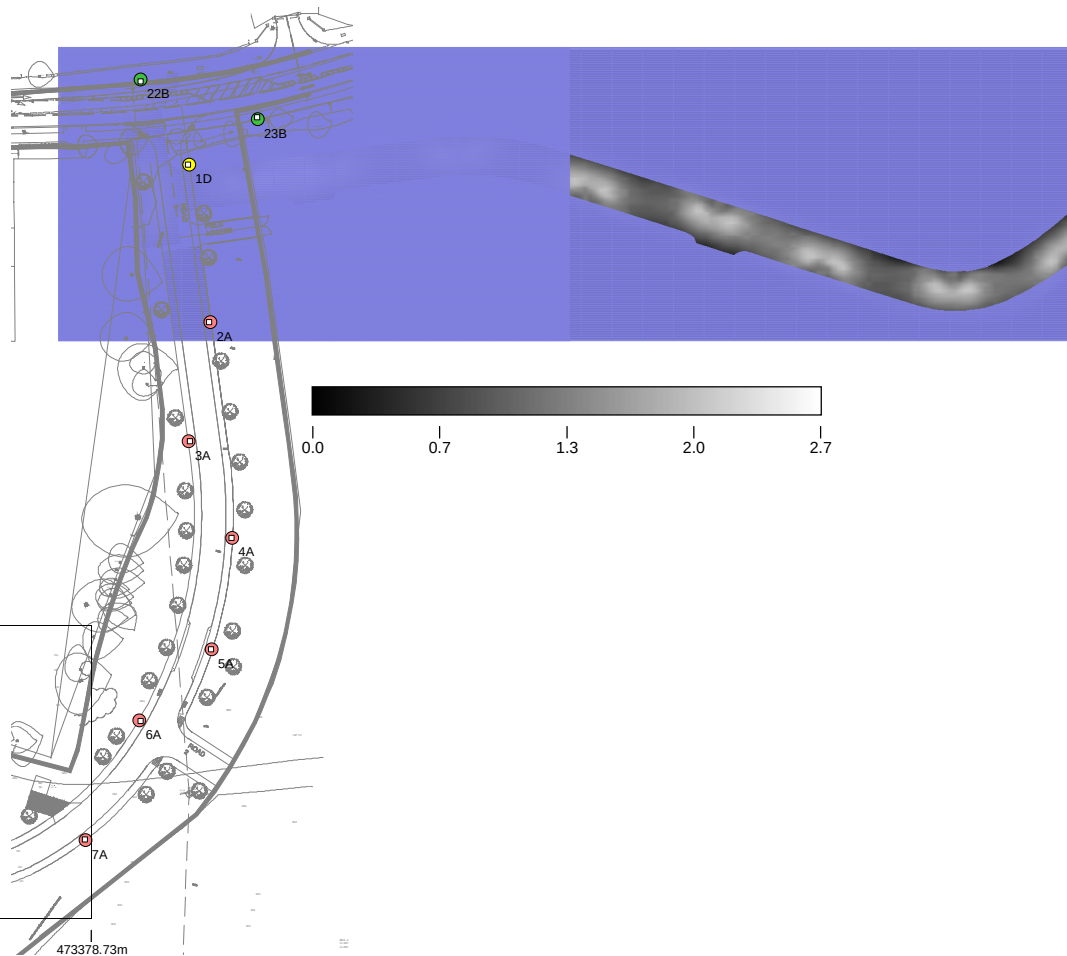


Results

Eav	1.31
Emin	0.40
Emax	2.70
Emin/Emax	0.15
Emin/Eav	0.30

Horizontal Illuminance (lux)

Grid 2



Results

Eav	1.31
Emin	0.40
Emax	2.70
Emin/Emax	0.15
Emin/Eav	0.30

Horizontal Illuminance (lux)

Grid 2

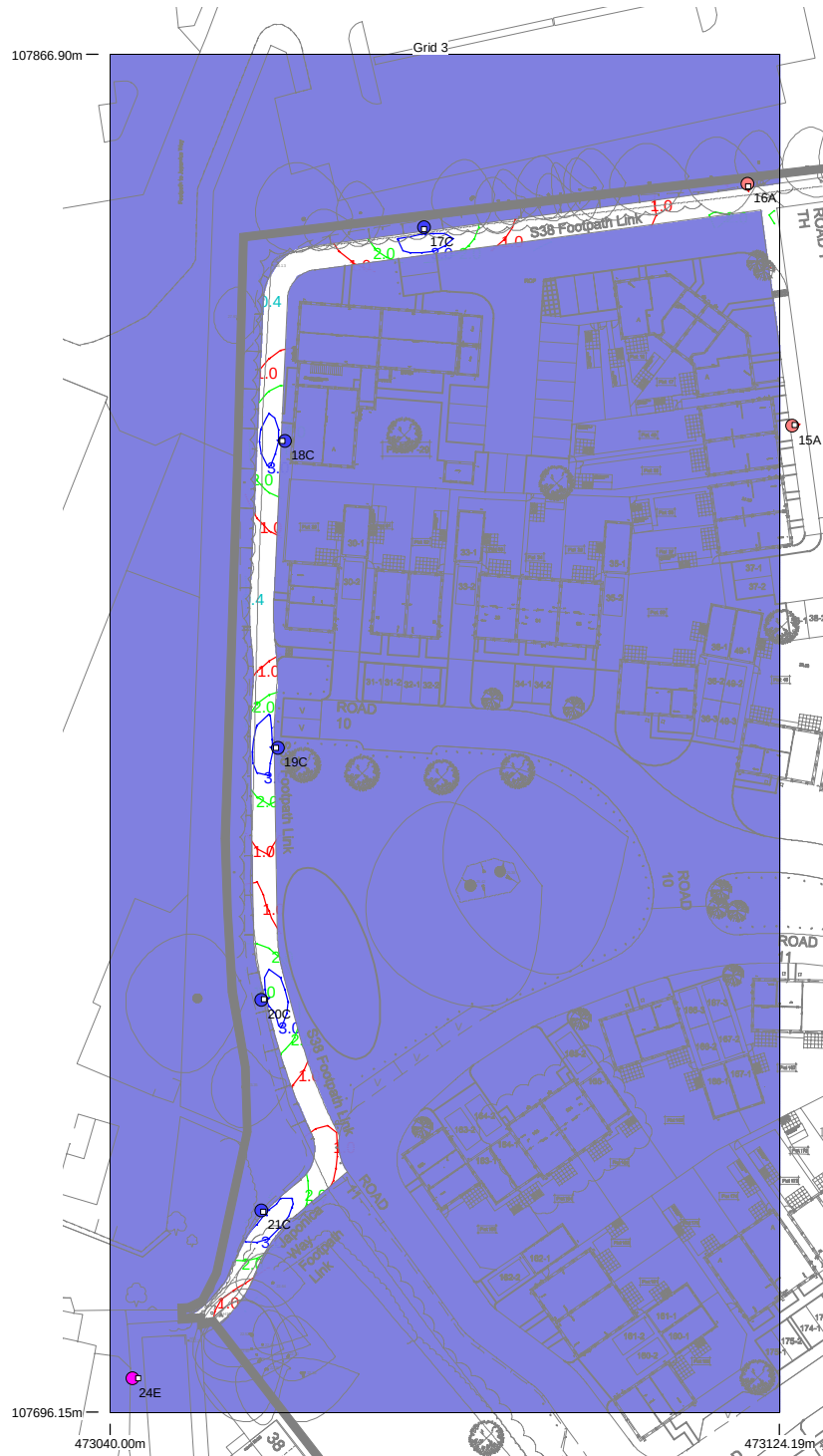


Results

Eav	1.31
Emin	0.40
Emax	2.70
Emin/Emax	0.15
Emin/Eav	0.30

Horizontal Illuminance (lux)

Grid 3



Results

Eav	1.62
Emin	0.45
Emax	3.63
Emin/Emax	0.13
Emin/Eav	0.28

Horizontal Illuminance (lux)

Grid 3

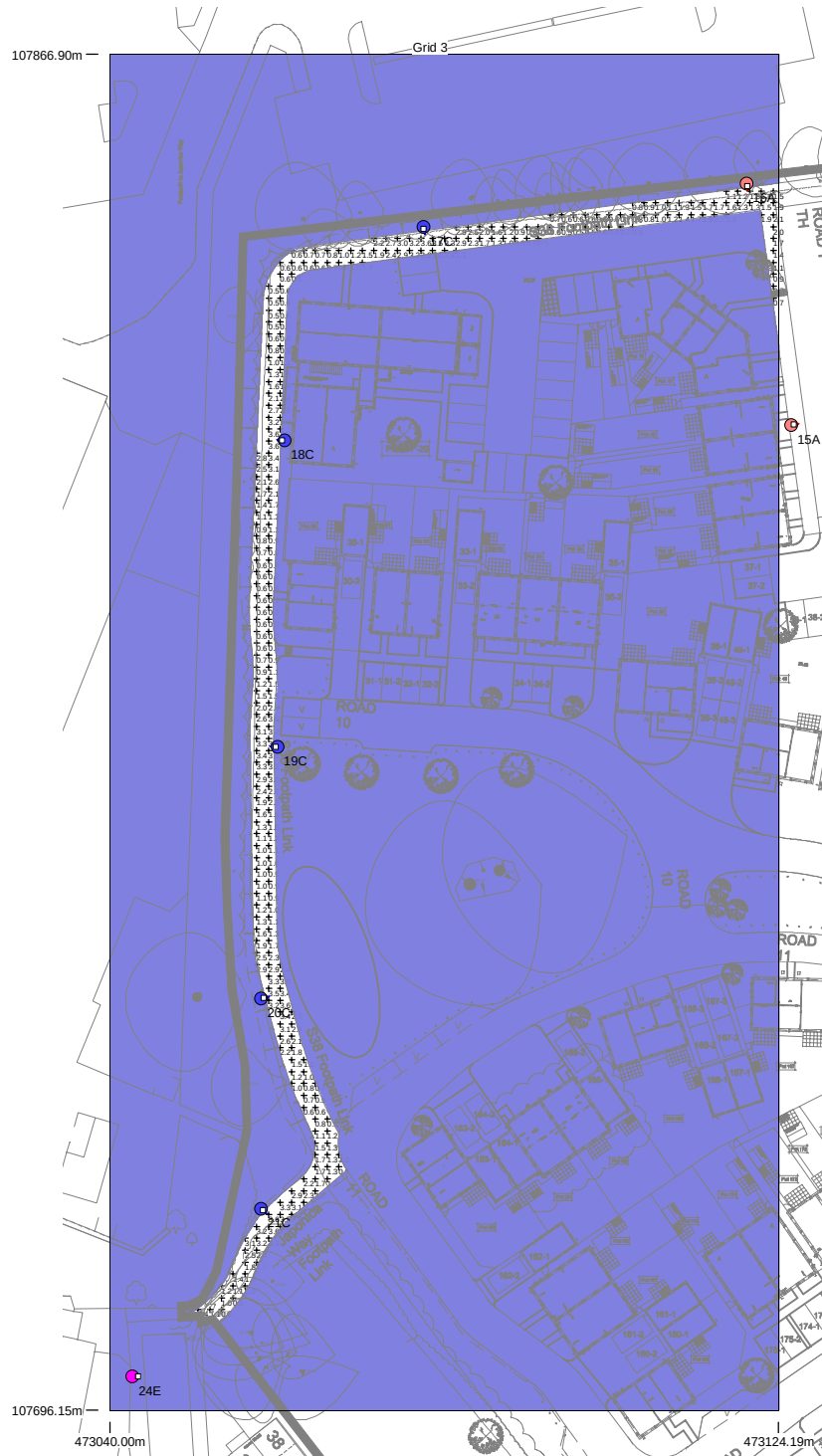


Results

Eav	1.62
Emin	0.45
Emax	3.63
Emin/Emax	0.13
Emin/Eav	0.28

Horizontal Illuminance (lux)

Grid 3



Results

Eav	1.62
Emin	0.45
Emax	3.63
Emin/Emax	0.13
Emin/Eav	0.28



PROJECT NAME:
Bartons Road, Havant

PROJECT No: **C85850**

SCALE: **1:1000** DATE: **14 June 2019**

CALCULATION:
Horizontal Illuminance (lux)

DESIGNER:
CT

S31 Street Lighting Design to BS EN 13035:2015
Rev D
Standard - Class P8 with SGP Ratio 1.43
E_{av} = 1.59, 1.93
E_{min} = 0.40
The report is to be read in conjunction with drawing no. C85850-D116 and D118
Column types B and E are shown for reference only.

CHECKED BY: **KM** PAGE SIZE: **A1**

REVISION:
D

PREPARED BY:
JNP Group
3rd Floor
Marlborough House
48 Holly Walk
Leamington Spa
CV32 4XP
e-mail: midlands@jnpgroup.co.uk
website: www.jnpgroup.co.uk

Results Grid 1	
E _{av}	1.45
E _{min}	0.48
E _{max}	2.37
E _{min} /E _{max}	0.20
E _{min} /E _{av}	0.33
Results Grid 2	
E _{av}	1.31
E _{min}	0.40
E _{max}	2.70
E _{min} /E _{max}	0.15
E _{min} /E _{av}	0.30
Results Grid 3	
E _{av}	1.62
E _{min}	0.45
E _{max}	3.63
E _{min} /E _{max}	0.13
E _{min} /E _{av}	0.28
Results Grid 4 - Pedestrian Crossing	
E _{av}	1.74
E _{min}	1.25
E _{max}	2.09
E _{min} /E _{max}	0.60
E _{min} /E _{av}	0.72
Results Grid 5 - Pedestrian Crossing	
E _{av}	1.10
E _{min}	0.48
E _{max}	1.61
E _{min} /E _{max}	0.30
E _{min} /E _{av}	0.44
Results Grid 6 - Pedestrian Crossing	
E _{av}	1.06
E _{min}	0.60
E _{max}	1.54
E _{min} /E _{max}	0.39
E _{min} /E _{av}	0.56
Results Grid 7 - Pedestrian Crossing	
E _{av}	1.33
E _{min}	0.73
E _{max}	1.80
E _{min} /E _{max}	0.41
E _{min} /E _{av}	0.55