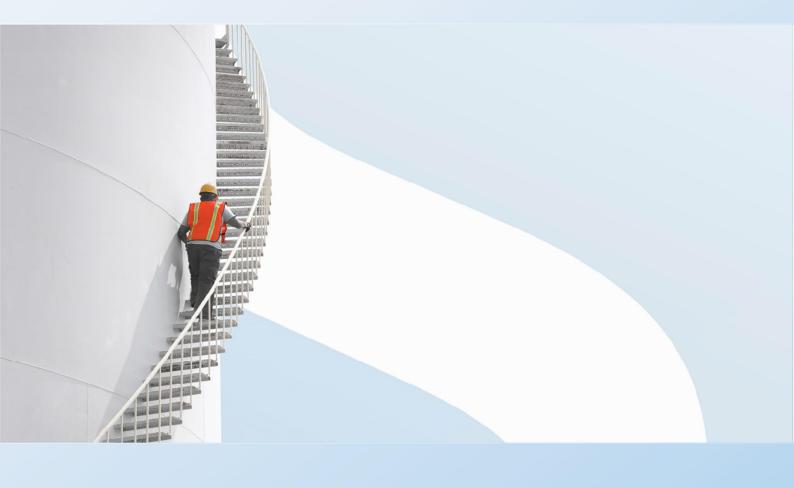


West Sussex County Council

A29 PHASE 1

Lighting Management Scheme



West Sussex County Council

A29 PHASE 1

Lighting Management Scheme

TYPE OF DOCUMENT (VERSION) PUBLIC

PROJECT NO. 70079718 OUR REF. NO. 70079718-WSP-A29-XX-RP-LI-0001

DATE: FEBRUARY 2022

WSP 62-64 Hills Road Cambridge CB2 1LA Phone: +44 1223 558 050 Fax: +44 1223 558 051 WSP.com

QUALITY CONTROL

Issue/revision	First issue	Revision 1	Revision 2	Revision 3
Remarks	First Issue	Updated with revised lighting plans post approval		
Date	29/04/2021	25/02/2022		
Prepared by	Dean Hawkins	Amanda Reece		
Signature				
Checked by	Kimberly Bartlett	Paul Batchelor		
Signature				
Authorised by	Jo North	Jo North		
Signature				
Project number	70079718	70079718		
Report number	70079718-WSP- A29-XX-RP-LI- 0001	70079718-WSP- A29-XX-RP-LI- 0001		
File reference	70079718-WSP- A29-XX-RP-LI- 0001	70079718-WSP- A29-XX-RP-LI- 0001		

CONTENTS

115

1	INTRODUCTION	1
1.1	PURPOSE	1
1.2	BACKGROUND	1
1.3	SENSITIVITIES	1
1.4	LIMITATIONS	1
2	LIGHTING PROPOSALS	4
2.1	DESCRIPTION OF PROPOSED LIGHTING	4
2.2	GENERAL PRINCIPLES	6
3	SPECIFIC MITIGATION	8
3.1	MONITORING REQUIREMENTS	9
3.2	TRAFFIC SAFETY	9
4	REFERENCES	10

TABLES

Table 1-1 – Obtrusive light limitations for E2 zone	2
Table 1-2 – Limits for luminous intensity for E2 zone	2
Table 2-1 – Lighting levels	5
Table 3-1 – Specific bat mitigation	8

APPENDICES

APPENDIX A ECOLOGY LIGHTING GUIDANCE APPENDIX B WSCC/SSE LIGHTING PLANS APPENDIX C TRAFFIC SIGNS SCHEDULE

1

INTRODUCTION

PUBLIC

visp

1 INTRODUCTION

1.1 PURPOSE

This Outline Lighting Management Scheme (LMS) has been prepared in support of the A29 Realignment and the provision of road lighting. This plan details specific environmental sensitivities that will be affected by the road lighting and measures to be implemented to mitigate these effects. This document should be read alongside A29 Phase 1, Lighting Assessment Report, 70079718-WSP-A29-XX-RP-LI-0001 (**Appendix 10.2 of the Revised ES**)

Relevant information pertinent to and appended to this LMS:

- A29 Realignment Ecology lighting guidance is provided in Appendix A of this LMS.
- Street Lighting Layout Drawings, SSE281768-1300-002-I, SSE281768-1300-003-F, SSE281768-1300-004-F, SSE281768-1300-005-F and SSE281768-1300-006-H provided in Appendix B.

In preparing the LMS, reference is made to the Institution of Lighting Professionals (ILP), Guidance Note 01/21 Guidance Notes for the Reduction of Obtrusive Light (GN01) (ILP, 2021), Bat Guidance Note 08/18 Bats and artificial lighting in the UK (ILP, 2018).

The LMS considers that the lighting proposals detailed on drawings SSE281768-1300-002 to SSE281768-1300-006 along with any further requirements of the LMS, are to be fully adopted and that any deviation will require the reassessment of effects from a competent environmental specialist.

1.2 BACKGROUND

An Outline Lighting Management Scheme was submitted as part of the planning application WSCC/052/20. Planning permission for the Scheme was granted on 30th June 2021 and planning condition 13 requires an updated Lighting Management Scheme, be submitted and approved prior to the installation of any lighting. The condition also required, where practicable, that all lighting is set back to avoid potential conflict with users of the shared cycleway/footpath. The revised Street Lighting Layout Drawings which include this relocation of 500mm from the cycleway/footpath is included in Appendix B.

1.3 SENSITIVITIES

The sensitivities identified and covered within the LMS:

- Existing residential properties.
- Public right of way (PRoW) bisecting the Site considered important for foraging and commuting Barbastelle bats, which are particularly sensitive to artificial lighting.
- South Downs National Park.

1.4 LIMITATIONS

The LMS does not cover temporary artificial lighting provided for construction activities.

The limitations imposed on exterior lighting for Environmental Zone E2 (Rural / Low District Brightness) are as follows (from GN01).

Where a curfew is included, this refers to the time after which stricter requirements for the control of obtrusive light will apply, as stipulated by the local planning authority. If not otherwise stated, 23:00 to 05:00 hours are suggested.

Table 1-1 – Obtrusive light limitations for E2 zone

Sky Glow ULR (Max %)	Light intrusion (ir	Light intrusion (into windows) Ev (lux)		
	Pre-curfew	Post-curfew		
2.5	5.0	1.0		

GN01 (ILP, 2020)

<u>Notes</u>

1. Upward Light Ratio (ULR) is the maximum permitted percentage of luminaire flux that goes directly into the sky.

2. Ev = vertical illuminance in lux, measured flat on the glazing at the centre of the window.

Table 1-2 – Limits for luminous intensity for E2 zone

Luminaire projected area Ap in m ²						
	0 <ap≤0.00 2</ap≤0.00 	0.002 <ap≤ 0.01</ap≤ 	0.01 <ap≤0 .03</ap≤0 	0.03 <ap≤0 .13</ap≤0 	0.13 <ap≤0 .5</ap≤0 	Ap>0.5
Pre-curfew (maximum cd)	0.57 d	1.3 d	2.5 d	5.0 d	10 d	7,500
Post-curfew (maximum cd)	0.29 d	0.63 d	1.3 d	2.5 d	5.1 d	500
Aid to gauging Ap	2 to 5cm	5 to 10cm	10 to 20cm	20 to 40cm	40 to 80cm	>80cm
Geometric mean of diameter (cm)	3.2cm	7.1cm	14.1cm	26.3cm	56.6cm	>80cm
Corresponding Ap representative area (m ²)	0.0008	0.004	0.016	0.063	0.251	>0.5

GN01 (ILP, 2020)



Notes

- 1. d is the distance between the observer and the luminaire in metres.
- 2. Ap is the apparent surface of the light source seen from the observer position
- 3. Cd = Candela

The ILP Bat Guidance Note 08/18 Bats and artificial lighting in the UK (ILP, 2018) suggests limitations to the amount of spill light onto sensitive features **being 0.2 lux on the horizontal plane** (e.g. at ground level) and **0.4 lux on the vertical plane** (e.g. along the sides of hedgerow or treelines, calculated at an equivalent bat flying height).

2 LIGHTING PROPOSALS

2.1 DESCRIPTION OF PROPOSED LIGHTING

Lighting proposals have been developed by SSE Enterprise with due consideration to identified sensitivities, in liaison with the scheme's ecologist with mitigation measures incorporated within the lighting design.

Road lighting will be provided at the three new roundabouts on Fontwell Avenue, Barnham Road and New Road / Central Roundabout including lighting to the approaches. The extents of the approach lighting to each roundabout varies between circa. 50m and circa. 80m to account for environmental sensitivities or complex road layouts but aims to meet industry best practice by providing five seconds of lighting at the given road speed (67m at 30mph).

The sections of new road between each roundabout will not be lit, instead the cycleway adjacent to the road will be lit with lower mounting heights and lighting levels appropriate for non-motorised users. The PRoW intersects with the new road and to aid pedestrian movement a crossing, shown in **Figures 3-1** and **3-2**, is provided. To highlight the presence of pedestrians waiting or using the crossing, artificial lighting is proposed.

New road and pedestrian lighting to be designed to standards:

- BS 5489-1:2020 Code of practice for the design of road lighting Part 1: Lighting of roads and public amenity areas (BSI, 2012)
- BS EN 13201 (all parts) Road lighting (BSI, 2014-2015)
- Lighting of Developer Promoted Highway Schemes in West Sussex (West Sussex County Council, 2019)
- Institution of Lighting Professionals Professional Lighting Guide PLG 02, The application of conflict areas on the highway. (PLG 02) (ILP, 2013)

The lighting proposals detailed on drawings SSE281768-1300-002-I, SSE281768-1300-003-F, SSE281768-1300-004-F, SSE281768-1300-005-F and SSE281768-1300-006-H as shown in **Appendix B** and lighting levels detailed in **Table 2-1** will be adopted, in accordance with BS 5489-1:2020, based in-part on anticipated traffic flow figures.

The Traffic Sign Schedule is attached as Appendix C. The vast majority of proposed new signage along the length of the new road will not be lit, with the exception of the following lit signs:

- TS36 D, E, F 600mm wide circular sign on the central roundabout;
- TS20 C 600mm circular sign on the Public Right of Way traffic island crossing;
- TS28 E,F,G,H 600mm Circular signage on the Barnham Road roundabout;
- TS42 a rectangular sign on the Barnham East Approach; and
- TS44 D, E, F 600mm Circular signage on Fontwell Avenue Roundabout.

Approximately 40 lighting columns will be fitted with integral rear louvres to restrict the level of backlight. These are shown with the suffix BL1 in Appendix B. The luminaires to be used on the Scheme vary between the Philips Luma Mini, Micro and Medium variants depending on the area being lit with examples provided in **Figure 2-1** and **2-2** below.

Figure 2-1 Philips Luma Mini

Figure 2-2 Philips Luma Medium



Table 2-1 – Lighting levels

Road	Traffic Flow (AADT) Traffic Flow	Lighting Class	Maximum luminaire mounting heights
Fontwell Avenue	7,000 - 40,000	M4	8m
Fontwell Avenue Roundabout	7,000 - 40,000	C3	8m
New Road	7,000 - 40,000	M4	8m
New Road Roundabout	7,000 - 40,000	C3	8m
New Road Cycleway	Low Usage	P4	6m
PRoW Pedestrian Crossing	Low Usage	P4	5m
Barnham Road	7,000 - 40,000	M3	10m
Barnham Road Roundabout	7,000 - 40,000	C2	10m

Notes

1. Lighting classes to be reduced during the periods shown in Table 1-4 – Dimming Regime.

2. Lighting Classes have been defined by SSE Enterprise as detailed on SSE281768-1300-002-G, SSE281768-1300-003-E,

SSE281768-1300-004-E, SSE281768-1300-005-E and SSE281768-1300-006-F.

3. Associated lighting levels are detailed within A29 Phase 1, Lighting Assessment Report, 70079718-WSP-A29-XX-RP-LI-0001, and BS EN 13201.

The following mitigation measures are intended to formalise the approach to the proposed road and pedestrian lighting and will be adopted as part of the operational requirements of the Scheme.

2.2 GENERAL PRINCIPLES

Each luminaire must be installed at 0° to the horizontal so that no light is emitted directly above the luminaires.

Each luminaire to be specified with a colour temperature of 3000K to minimise the blue-light component of the light source to reduce the impact on fauna populations and contribution to sky glow.

A system of control and operation will be implemented that allows; dimming of lighting to a lower level during periods of low use or switch-off. Each luminaire to be installed with external node and controlled via the Mayflower Central Management System. The system is to allow individual luminaires to be switched or dimmed in line with the requirements set out in the LMS.

While it is not envisaged shield and baffles will be required, where levels of obtrusive light cannot be limited through good design, these should be considered; however their application should be agreed with WSCC and SSE to ensure carriageway lighting levels are not compromised.

Lighting will switch on at dusk (35 lux) and off at dawn (18 Lux); the times at which lighting is operational will vary throughout the year however when switched-on the dimming regime detailed within **Table 2-2** is to apply to all luminaires other than during the periods identified in **Table 3-1**.

vsp

Table 2-2 – Dimming Regime

Dimming Regime	Total lumen output of luminaires dimmed to %								
	Switch- on	20:00	21:30	22:00	00:00	05:00	05:30	06:00	Switch- off
D50 – All night	100%	75%	75%	50%	50%	50%	50%	100%	0%

3 SPECIFIC MITIGATION

To mitigate against the impact to bats foraging and commuting along the ProW crossing the new road, as recommended within the Ecology lighting guidance provided in **Appendix A**, and considering the active bat season is between April and October, the following proposals are to be incorporated within the operational lighting requirements of the Scheme.

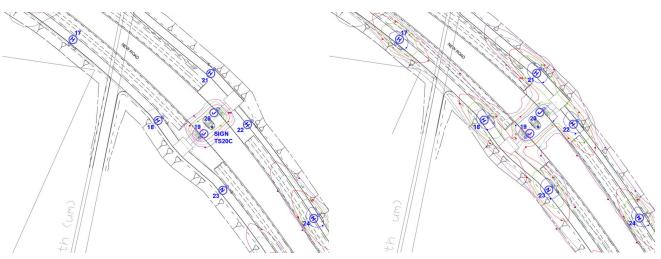
Lighting Column	April to October	November to March
17, 18, 21, 22, 23	Switched-off	Standard operational profile - refer to Table 2-2
19 & 20	Total lumen output of luminaires dimmed to 30%	Standard operational profile - refer to Table 2-2
All other lighting columns	Standard operational profile - refer to Table 2-2	Standard operational profile - refer to Table 2-2

Table 3-1 – Specific bat mitigation

Figures 3-1 and **3-2** provide a visual representation of the effects of utilising the dimming and luminaire switch-off requirements of **Table 3-1**. This mitigation will reduce spill light onto the bat corridor to levels below that recommended within the ILP Bat Guidance Note 08/18 Bats and artificial lighting in the UK (ILP, 2018).







3.1 MONITORING REQUIREMENTS

WSCC will monitor the effectiveness of lighting mitigation measures for the Scheme. Monitoring will consist of surveys that will involve the measurement of artificial lighting levels following the baseline assessment methodology detailed in ILP Professional Lighting Guide 04, Guidance on Undertaking Environmental Lighting Impact Assessments (PLG04) (ILP, 2013) with measurements compared against the limitations set within the LMS. Improvements will be carried out where necessary and practicable to do so, along with periodic maintenance and inspections.

3.2 TRAFFIC SAFETY

The following commentary on traffic safety has been developed alongside and agreed with the Scheme designer's SSE and Jacksons.

Road lighting has been designed so that it is appropriate for the estimated usage of the Scheme. Where significant flows of motorised traffic intersect, i.e. at the roundabouts, road lighting is applied, however due to environmental considerations previously detailed, the carriageways between the roundabouts are predominately unlit with the exception of small sections of carriageway approaching the roundabouts.

The cycleways adjacent to the unlit carriageways are however lit in order to encourage the use of the cycleway. During normal operation, the cycleways are lit in their entirety in accordance with WSCC's specification to ensure that any hazards or obstacles on the route are easily identifiable. Due to the environmental sensitives of the PRoW as a bat commuting / foraging corridor, lighting along the cycleway near to the PRoW will be switched-off during the periods detailed in **Table 3-1** leaving an area of circa. 110m of unlit cycleway. While the cycleway is not lit, the uncontrolled crossing linking the PRoW will be lit and during these periods the lighting is switched off or dimmed will be during a period (April and October) where the sunset times are generally later in the evening coinciding with anticipated lower non-motorised user activity. Although there will be kept low as to provide good forward visibility, it is not anticipated that he unlit section of cycleway will present a significant risk to users.

During the winter months where sunset times are much earlier in the evening and usage is anticipated to be greater, lighting along the cycleway and uncontrolled crossing will be operational but aligned with dimming profile detailed within **Table 2-1**.

The lighting will be controlled by WSCC's Central Management System (CMS), a system that not only controls dimming but reports faults.

It is recommended that the lighting proposals are reviewed as part of the Scheme's full safety audit and further safety features, such as advanced warning signs and routine vegetation clearance, are implemented.

4 **REFERENCES**

The following documents are referenced within the LMS.

- A29 Phase 1, Lighting Assessment Report, 70079718-WSP-A29-XX-RP-LI-0001 P04 (WSP, March 2021)
- A29 Realignment Lighting Guidance Ecology (WSP, March 2021)
- Street Lighting Layout Drawings, SSE281768-1300-002-I, SSE281768-1300-003-F, SSE281768-1300-004-F, SSE281768-1300-005-F and SSE281768-1300-006-H
- Institution of Lighting Professionals, Guidance Note 01/20 Guidance Notes for the Reduction of Obtrusive Light (GN01) (ILP, 2021)
- Institution of Lighting Professionals, Bat Guidance Note 08/18 Bats and artificial lighting in the UK (ILP, 2018).
- BS 5489-1:2020 Code of practice for the design of road lighting Part 1: Lighting of roads and public amenity areas (BSI, 2012)
- BS EN 13201 (all parts) Road lighting (BSI, 2014-2015)
- Lighting of Developer Promoted Highway Schemes in West Sussex (West Sussex County Council, 2019)
- Institution of Lighting Professionals, Professional Lighting Guide PLG 02, The application of conflict areas on the highway. (PLG 02) (ILP, 2013)
- Institution of Lighting Professionals, Professional Lighting Guide 04, Guidance on Undertaking Environmental Lighting Impact Assessments (PLG04) (ILP, 2013)

Appendix A

ECOLOGY LIGHTING GUIDANCE

TECHNICAL NOTE 1

DATE:	06 January 2022	CONFIDENTIALITY:	Public
SUBJECT:	A29 Realignment – Ecology Lighting guid	lance	
PROJECT:	70079718	AUTHOR:	Verity Dickie
CHECKED:	Owen Peat	APPROVED:	Jo North

BACKGROUND

WSP undertook a suite of ecological surveys in 2019 to support the Ecology and Nature Conservation Chapter of the Environmental Statement (ES) and planning application for the A29 (Phase 1) realignment project. Surveys undertaken included bat activity surveys whereby four static bat detectors were deployed on a monthly basis from April – October at specific locations across the Site.

The surveys identified at least eight species across the Site, with common and soprano pipistrelle *Pipistrellus pipistrellus and Pipistrellus pygmaeus* which are widespread and common bat species^{1,2} accounting for over 75% of all bat activity recorded. The remaining recordings were made by a range of species, including the rarer greater horseshoe bat *Rhinolophus ferrumequinum*, Barbastelle bat *Barbastella barbastellus* and Leisler's bat *Nyctalus leisleri*. Other species recorded included noctule *Nyctalus noctule*, serotine *Eptesicus serotinus* and Nathusius' pipistrelle *Pipistrellus nathusii*. other genus, that could not be identified to species level included *Plecotus* sp. and *Myotis* sp.

One detector was located along the public right of way (PRoW) that bisects the Site and was considered to be an important foraging / commuting passage for Barbastelle bats, a species which are particularly sensitive to artificial lighting and are considered to be up to district level importance. As such through liaison with SSE who prepared the lighting design, as well as WSP lighting specialists who prepared the lighting strategy to support the ES, lighting was reduced as much as possible through careful design along the route of this PRoW.

Adaptations that were made at the detailed design stage to ensure that reduced lighting levels could be incorporated into the lighting design included moving the central roundabout 100m west to avoid light spill along the PRoW. Additionally, designs were also adapted to move a pedestrian crossing (which must be lit for safety purposes) by 21m to the east to avoid light spill onto the PRoW and therefore there will be a dark corridor, 15m either side of the PRoW. Whilst this corridor will be as dark as possible, it is noted in the lighting strategy that it is not always possible to completely remove levels of spill light onto nearby sensitive features near to artificial lighting installations as low levels of spill light can be present at significant distances from the installation.

The ES set out that an appropriate lighting strategy will be created for the Scheme, informed by current best practice guidance with regards to bats and lighting (ILP, 2018³). In particular, the lighting strategy will require that new permanent lighting is the minimum required and will avoid light spill directly onto retained and newly created ecological features (e.g. hedgerows and woodland) within the Scheme. Warm white LEDs will be used, and hoods and louvres will be used to prevent backwards, upwards or other light spill. The lighting strategy will also detail the careful timing of when the lighting will be operational to reduce the

¹ Bat Conservation Trust (2017a). National Bat Monitoring Programme Population Trends | The state of the UK's bats 2017.

² Bat Conservation Trust (2017b). National Bat Monitoring | Annual report 2017.

³ Institute of Lighting Professionals (2018) Guidance Note 08/18: Bats and artificial lighting in the UK. Bat Conservation Trust, London.

TECHNICAL NOTE 1

DATE:	06 January 2022	CONFIDENTIALITY:	Public
SUBJECT:	A29 Realignment – Ecology Lighting guid	lance	
PROJECT:	70079718	AUTHOR:	Verity Dickie
CHECKED:	Owen Peat	APPROVED:	Jo North

light spill further. This will be achieved through the use of Mayflower lighting in which it is possible to establish a site-specific switching regime, whereby each lighting unit fitted with a Mayflower external node can be controlled individually and set to dim at any time of day during operation. By using this control, it will be possible to reduce the lighting at the times when bats are active.

Following receipt of a Regulation 25 request, further information has been provided on the mechanism that will be put in place to ensure that the lighting is dimmed / turned-off at appropriate times to meet commitments made within the ES chapter. This technical note provides further information on the lighting reductions in the most ecologically sensitive areas and forms an appendix to the Outline Lighting Management Scheme.

GUIDANCE ON LIGHTING REDUCTION

Following a review of the static bat data that was collected between April to October 2019, the timing in which barbastelle calls were recorded in relation to sunset / sunrise times was analysed, with a breakdown of each month provided in Table 1 below.

Month	Approximate Sunset / Sunrise range	Earliest barbastelle bat call	Latest barbastelle bat call
April	19:35 – 20:20 / 06:35 – 05:35	21:28pm	02:56am
Мау	20:20 - 21:05 / 05:35 - 04:55	22:07pm	03:20am
June	21:05 - 21:20 / 04:50 - 04:55	22:23pm	02:49am
July	21:20 - 20:50 / 04:55 - 05:30	22:39pm	00:44am
August	20:45 – 19:50 / 05:30 – 06:15	21:21pm	04:24am
September	19:45 – 18:40 / 06:15 – 07:00	21:03pm	01:59am
October	18:40 – 17:40 / 07:05 – 07:50	19:31pm	19:31pm

In all months, with the exception of August and October, all barbastelle calls were at least one hour after the latest sunset time in the month. In all months, the latest calls recorded were all at least one hour prior the earliest sunrise time in each month.

For August, the earliest call at 21:21pm was on the 19th August, when sunset is approximately 20:15pm, as such this call was approximately an hour after sunset. Similarly, in October, the single call recorded at 19:31pm was on the 11th October, when sunset is approximately 18:20pm, and therefore this call was over an hour after sunset.

vsp

TECHNICAL NOTE 1

DATE:	06 January 2022	CONFIDENTIALITY:	Public
SUBJECT:	A29 Realignment – Ecology Lighting guid	lance	
PROJECT:	70079718	AUTHOR:	Verity Dickie
CHECKED:	Owen Peat	APPROVED:	Jo North

Barbastelle are typically later emerging species (Table 3.3 - Collins (ed.) 2016) with the data collected during the bat activity surveys correlating with this. In general, bats are typically active from April until October. Between November and March, they are either in a state of torpor or hibernating, although in March, they will start to feed on warmer nights (Figure 3.1 Collins (ed.) 2016).

As shown in Appendix B, the lighting design (inset drawing ref SSE281768-1300-004) details that in the immediate vicinity of the footpath, lighting columns 17, 18, 21, 22 and 23 will be set to 0% lumen output and lighting units 19 and 20 will be set to 30% lumen output significantly reducing the light spill in the location of the existing footpath. This reduction should be in place during the bat active season (April to October), but during the winter, these lights can be turned on if required for safety reasons.

As standard on WSCC schemes, lighting is dimmed by 40% on all 'all night' lighting from midnight which will benefit a range of protected nocturnal species including bats and badgers. For the A29 scheme, it is understood that this dimming regime will be increased and extended, with lighting dimmed to 75% at 20:00, and then to 50% from 22:00 until 06:00 therefore providing additional benefit to protected species.

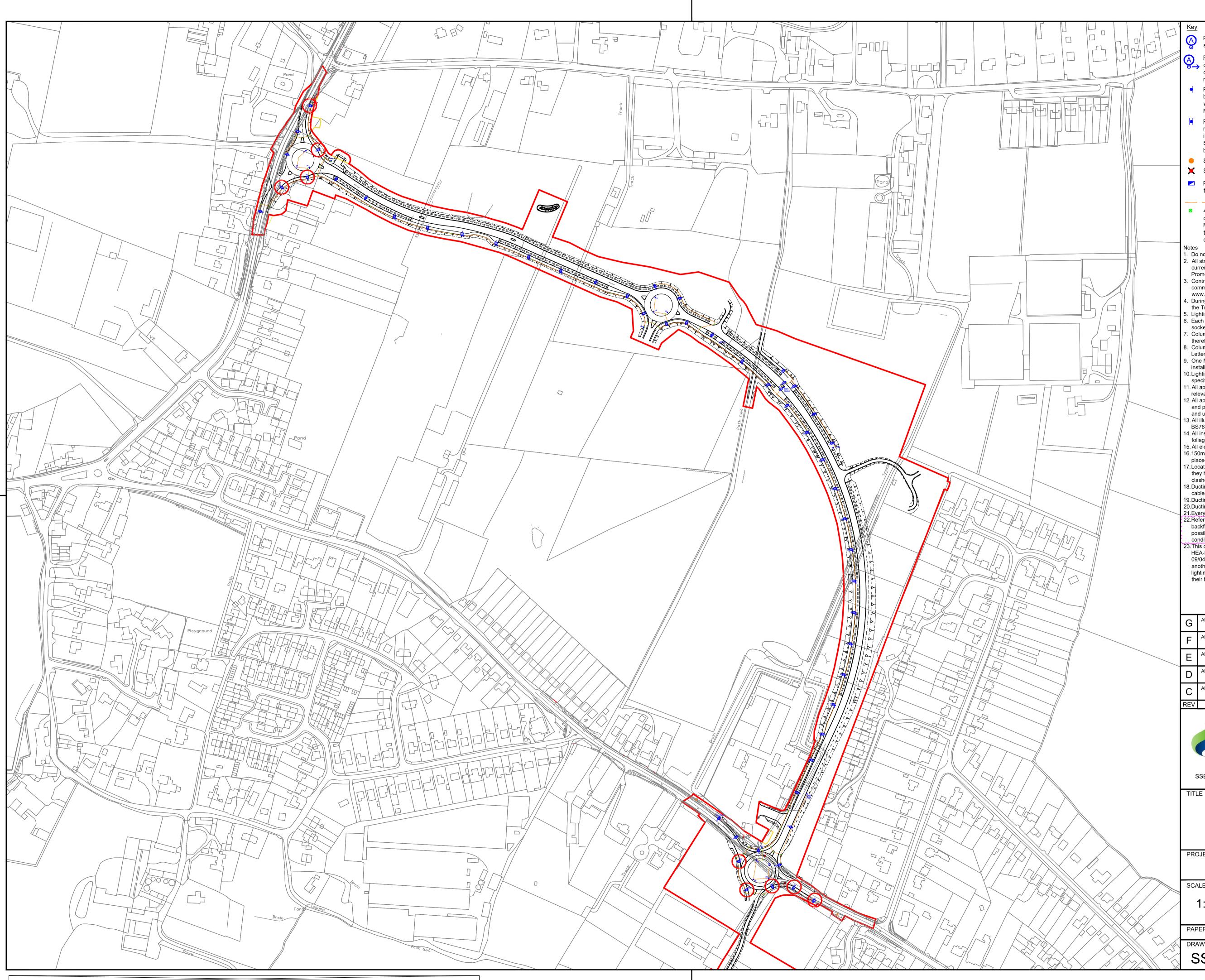
CONCLUSION

Providing the guidance set out above is adhered to, as set out in the ES, overall there is anticipated to be a negligible adverse effect on foraging and commuting bats during the operational phase of the Scheme. This is due to the measures that have been taken to reduce the lighting levels in the most sensitive areas for bats, whilst also recognising that overall there will be a permanent increase in the levels of artificial lighting across the Scheme.

Appendix B

WSCC/SSE LIGHTING PLANS

)



Proposed street lighting column (Unit Type ID displayed ins symbol. Unit reference number displayed outside symbol).	-	-	<u>_</u>
sympol. Unit reference number displayed outside sympol.			

- Proposed raise and lower street lighting column (Unit Type ID displayed inside symbol. Unit reference number displayed outside symbol). Arrow indicated direction of lowering mechanism.
- Proposed illuminated sign consisting of galvanised steel wide base post. Signs to be lit by Simmonsigns LUA LED sign light with low voltage HF electronic ballast. Sign light controlled by Mayflower Internal node.
- Proposed illuminated centre island post consisting of 4.7 metre mid hinged galvanised steel post, 2 no. internally illuminated Simmonsigns Invinca Keep Left signs and Simmonsigns white LED beacon. Equipment to be supplied by 24v supply.
- Street lighting column to be retained.
- X Street lighting column to be removed.
- Proposed feeder pillar with 230v single phase supply installed to WSCC specification.
- Indicative cable route.
- 450mm x 450mm polyproylene preformed twin wall modular duct access chamber similar to NAL Limited STAKKAbox Modula duct chamber. Chamber, concrete infill and cover are to be rated to B125. Depth of chamber to allow for a 600mm deep duct run (see note 20).
- 1. Do not scale from drawing if not printed at original paper size.
- All street lighting equipment and works to be carried out in accordance with current West Sussex County Council's specification 'Lighting of Develop Promoted Highway Schemes in West Sussex'.
- Contractor to confirm position of statutory undertakers plant before commencement of the works. For statutory undertaker's information visit www.linesearchbeforeudig.co.uk
- 4. During works all traffic management to be in accordance with Chapter 8 of the Traffics Signs Manual.
 5. Lighting columns to be fed by DNO supply unless otherwise shown.
 6. Each lumination to be fitted with Manflewer Complete Lighting control \$2000.
- Each luminaire to be fitted with Mayflower Complete Lighting control S6000 socket (NEMA).
 Column maintenance numbers have been agreed with WSCC and
- Column maintenance numbers have been agreed with woods and therefore numbering on-site should be as per the lighting drawings.
 Columns to be numbered using adhesive labels suitable for exterior use.
- Columns to be numbered using adhesive labels suitable for exterior use. Letters and numerals shall be 50mm high black on a white background.
 One Maufleuer Complete Lighting central DAL sub-master upit to be
- 9. One Mayflower Complete Lighting control DALI sub-master unit to be installed to control nodes and link central management system.
- 10. Lighting columns are to be planted directly into the ground as per WSCC's specification referred to as "Road Lighting column erection details".11. All apparatus are to be new at the time of installation and be supported by relevant manufacturer's guarantees.
- 12. All apparatus shall be sited so as to minimise, in so far as is reasonable and practical, nuisance, danger and obstruction to all residents, businesses and users of the highway.
- 13. All illuminated apparatus must be installed and tested in compliance with BS7671 at the time of adoption.
- 14. All installations must be installed in such a way that trees or any other foliage on the site does not interfere with the level of lighting.
- 15. All electrical cables to be XLPE/SWA/PVC and laid in ducting.
- 16.150mm wide yellow heavy gauge PVC tape marked "Street Lighting Cable" placed over private electricity ducts / cables
 17.Locations of duct chambers shown on the drawing are indicative (albeit
- they have been cross referenced against other highway disciplines to avoid clashes). Final locations shall be confirmed on site. 18.Ducting to be 100mm dia PVC ducts coloured orange. Maximum number of

cables per duct is 3. One spare duct is to be installed at each road crossing. 19. Ducting below footways to be 450mm below finished level. 20. Ducting below carriageways to be 600mm below finished level.

21.Every duct to be installed with draw cords.
22.Refer to drawing WSCC-SD1-0500-042 for details regarding bedding and backfill installation. Standard installation type should be used where possible however appropriate installation type is subject to on site conditions.

23. This detailed design has been prepared in accordance with the HEA-HEMSA guidance note - CDM2015 regulations, issue 1.1, dated 09/04/15 Procedure 3: information has been supplied by the client or another designer or the principal designer which forms the basis of this lighting scheme design and includes the hazards identified by others on their hazard elimination and management list.

G	AMENDED COLUMN LOCATIONS	05/11/21	MWG
F	AMENDED FOLLOWING JCE COMMENTS	29/04/21	MWG
Е	AMENDED FOLLOWING JCE COMMENTS	19/04/21	MWG
D	AMENDED FOLLOWING JCE COMMENTS	04/03/21	MWG
С	AMENDED FOLLOWING JCE COMMENTS	26/01/21	MWG
REV	DESCRIPTION	DATE	BY

sse Enterprise Lighting

SSE Enterprise - Lighting, 1st Floor, Solent Park, Walton Road, Portsmouth, PO6 1UJ

STREET LIGHTING LAYOUT DRAWING

SHEET 1 OF 8

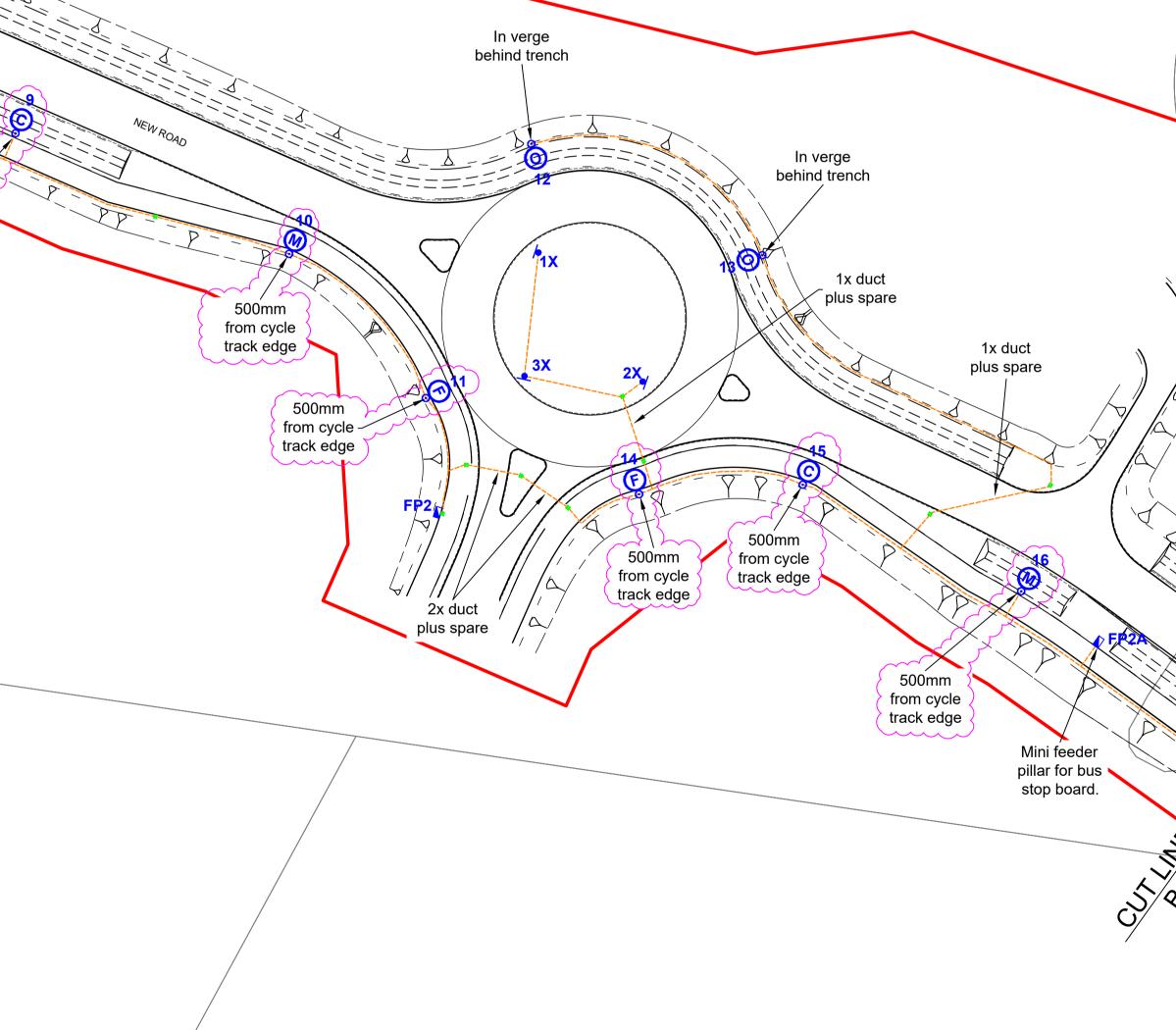
-	LIGNMENT SUSSEX	
SCALE	DATE	15/09/20
1:500 @ A1	DRAWN	MWG
	CHECKED	RHJ
PAPER SIZE A1	APPROVED	SAB
DRAWING NUMBER		REVISION
SSE281768-	G	

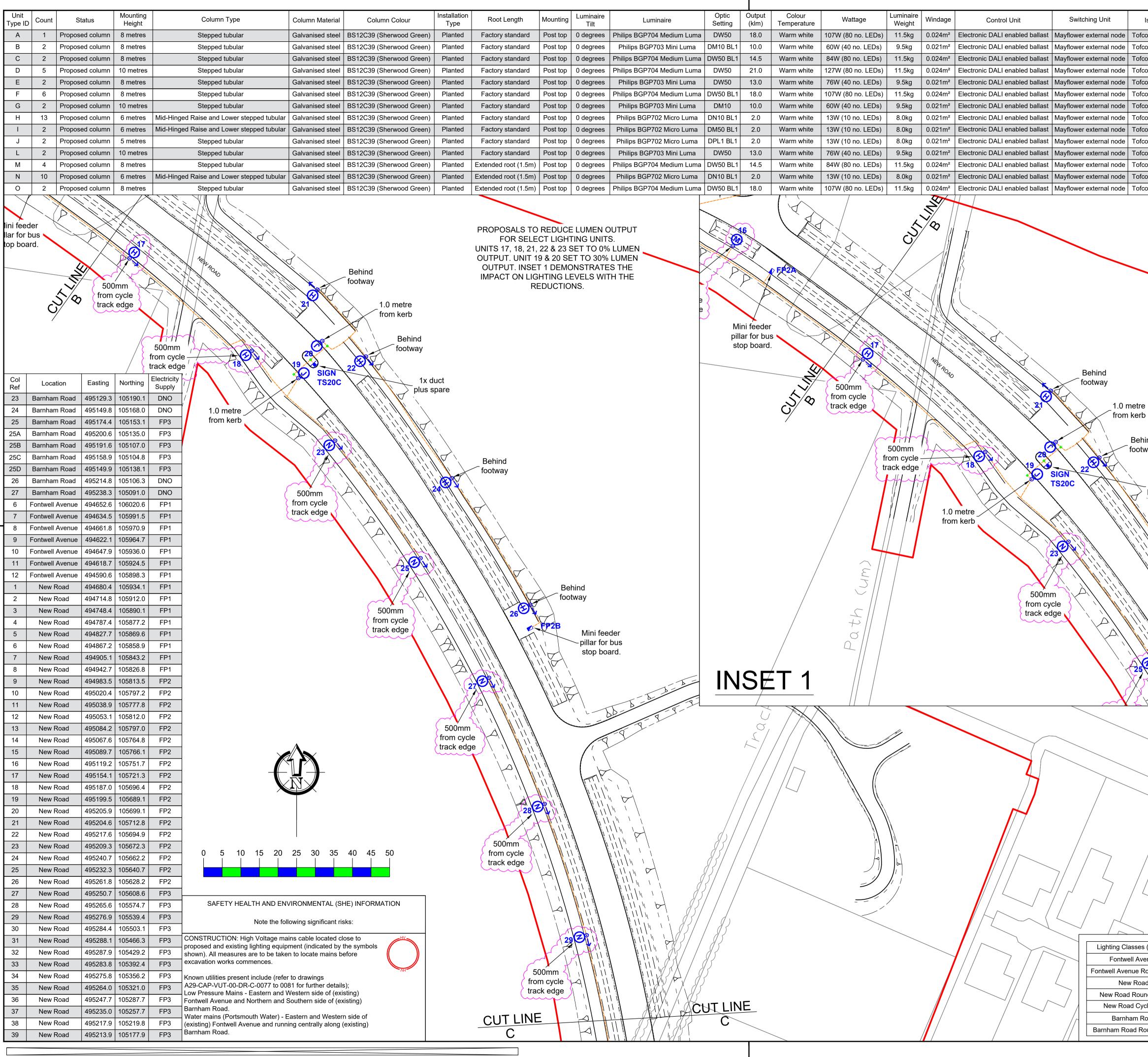
Unit Type ID Count Status Mountir Height		Column Material	Column Colour	stallation Type Root Len	gth Mounting Lumi Τ	inaire It Luminaire	Optic Outp Setting (klm		Wattage	Luminaire Weight	ge Control Unit	Switching Unit	Isolator	Luminaire Elexon Code	\sim	Key
A 1 Proposed column 8 metre	S Stepped tubular		3S12C39 (Sherwood Green)	Planted Factory sta			uma DW50 18.0		107W (80 no. LEDs)	11.5kg 0.024r	n ² Electronic DALI enabled ballast	-		e 42 0107 0000 100		Proposed street lighting column (Unit Type ID displayed inside symbol. Unit reference number displayed outside symbol).
B2Proposed column8 metreC2Proposed column8 metre			3S12C39 (Sherwood Green) 3S12C39 (Sherwood Green)	Planted Factory sta Planted Factory sta		grees Philips BGP703 Mini Lur grees Philips BGP704 Medium L		0Warm white5Warm white	60W (40 no. LEDs) 84W (80 no. LEDs)	9.5kg 0.021r 11.5kg 0.024r	 n² Electronic DALI enabled ballast n² Electronic DALI enabled ballast 	-			7	Proposed raise and lower street lighting column (Unit Type ID displayed inside symbol. Unit reference number displayed
D 5 Proposed column 10 metro			3S12C39 (Sherwood Green) 3S12C39 (Sherwood Green)					0 Warm white	127W (80 no. LEDs)	_	n ² Electronic DALI enabled ballast n ² Electronic DALI enabled ballast	-	_			outside symbol). Arrow indicated direction of lowering mechanism.
E2Proposed column8 metreF6Proposed column8 metre			3S12C39 (Sherwood Green)	-		-			76W (40 no. LEDs) 107W (80 no. LEDs)	9.5kg 0.0211 11.5kg 0.024r		-	-			 Proposed illuminated sign consisting of galvanised steel wide base post. Signs to be lit by Simmonsigns LUA LED sign light with low voltage HF electronic ballast. Sign light controlled by
G2Proposed column10 metroH13Proposed column6 metro			3S12C39 (Sherwood Green) 3S12C39 (Sherwood Green)			-		0 Warm white 0 Warm white	60W (40 no. LEDs) 13W (10 no. LEDs)	9.5kg 0.021r 8.0kg 0.021r	 n² Electronic DALI enabled ballast n² Electronic DALI enabled ballast 	-				Mayflower Internal node.
I 2 Proposed column 6 metre			3S12C39 (Sherwood Green)						13W (10 no. LEDs)		 n² Electronic DALI enabled ballast 					Proposed illuminated centre island post consisting of 4.7 metre mid hinged galvanised steel post, 2 no. internally illuminated Simmonsigns Invinca Keep Left signs and
J 2 Proposed column 5 metre L 2 Proposed column 10 metre			3S12C39 (Sherwood Green) 3S12C39 (Sherwood Green)		· _ `			Warm whiteWarm white	13W (10 no. LEDs) 76W (40 no. LEDs)		 n² Electronic DALI enabled ballast n² Electronic DALI enabled ballast 	-				Simmonsigns white LED beacon. Equipment to be supplied by 24v supply.
M 4 Proposed column 8 metre	S Stepped tubular	Galvanised steel	3S12C39 (Sherwood Green)	Planted Extended roo	(1.5m) Post top 0 deg	grees Philips BGP704 Medium L	uma DW50 BL1 14.5	5 Warm white	84W (80 no. LEDs)	11.5kg 0.024r	n ² Electronic DALI enabled ballast	Mayflower external node	e Tofco DPI range	42 0084 0000 100		 Street lighting column to be retained. X Street lighting column to be removed.
N 10 Proposed column 6 metre O 2 Proposed column 8 metre	Mid-Hinged Raise and Lower stepped Stepped tubular		3S12C39 (Sherwood Green) 3S12C39 (Sherwood Green)		(1.5m) Post top 0 deg (1.5m) Post top 0 deg	grees Philips BGP702 Micro Lu grees Philips BGP704 Medium L			13W (10 no. LEDs) 107W (80 no. LEDs)		 n² Electronic DALI enabled ballast n² Electronic DALI enabled ballast 	-				 Proposed feeder pillar with 230v single phase supply installed to WSCC specification.
Col Ref Location Easting Northing 23 Barnham Road 495129.3 105190. 24 Barnham Road 495149.8 105168. 25 Barnham Road 495174.4 105153. 25A Barnham Road 495200.6 105135. 25B Barnham Road 495191.6 105107. 25C Barnham Road 495158.9 105104. 25D Barnham Road 495149.8 105108. 26 Barnham Road 495149.9 105138. 26 Barnham Road 495238.3 105091. 6 Fontwell Avenue 494652.6 106020. 7 Fontwell Avenue 494634.5 105991.	Supply DNO DNO FP3		Pond 35 40 45 50													 Indicative cable route. 450mm x 450mm polyproylene preformed twin wall modular duct access chamber similar to NAL Limited STAKKAbox Modula duct chamber. Chamber, concrete infill and cover are to be rated to B125. Depth of chamber to allow for a 600mm deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in accordance with current West Sussex County Council's specification 'Lighting of Develop Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant before commencement of the works. For statutory undertaker's information visit www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with Chapter 8 of the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise shown. Each luminaire to be fitted with Mayflower Complete Lighting control S6000
7 Fontwell Avenue 494634.5 105991. 8 Fontwell Avenue 494661.8 105970. 9 Fontwell Avenue 494622.1 105964. 10 Fontwell Avenue 494647.9 105936. 11 Fontwell Avenue 494618.7 105924. 12 Fontwell Avenue 494590.6 105898. 1 New Road 494714.8 105912. 3 New Road 4947748.4 105890. 4 New Road 494787.4 105877. 5 New Road 494867.2 105858. 7 New Road 494905.1 105843. 8 New Road 494942.7 105826.	FP1		Behind footway		500mm from cycle track edge											 Each luminaire to be fitted with Mayflower Complete Lighting control S6000 socket (NEMA). Column maintenance numbers have been agreed with WSCC and therefore numbering on-site should be as per the lighting drawings. Columns to be numbered using adhesive labels suitable for exterior use. Letters and numerals shall be 50mm high black on a white background. One Mayflower Complete Lighting control DALI sub-master unit to be installed to control nodes and link central management system. Lighting columns are to be planted directly into the ground as per WSCC's specification referred to as "Road Lighting column erection details". All apparatus are to be new at the time of installation and be supported by relevant manufacturer's guarantees. All apparatus shall be sited so as to minimise, in so far as is reasonable and practical, nuisance, danger and obstruction to all residents, businesses and users of the highway. All illuminated apparatus must be installed and tested in compliance with BS7671 at the time of adoption. All electrical cables to be XLPE/SWA/PVC and laid in ducting. All electrical cables to be XLPE/SWA/PVC and laid in ducting. All electrical cables to be XLPE/SWA/PVC and laid in ducting.
9 New Road 494983.5 105813. 10 New Road 495020.4 105797. 11 New Road 495038.9 105777. 12 New Road 495053.1 105812. 13 New Road 495084.2 105797. 14 New Road 495067.6 105764. 15 New Road 495089.7 105766. 16 New Road 495119.2 105751. 17 New Road 495187.0 105696. 19 New Road 495199.5 105689. 20 New Road 495205.9 105699. 21 New Road 495204.6 105712. 22 New Road 495217.6 105694.	FP2 FP2		1x duct us spare 9 1F	ZF 8 3F	blus spare 500mm from cycle track edge										//	 they have been cross referenced against other highway disciplines to avoid clashes). Final locations shall be confirmed on site. 18. Ducting to be 100mm dia PVC ducts coloured orange. Maximum number of cables per duct is 3. One spare duct is to be installed at each road crossing. 19. Ducting below footways to be 450mm below finished level. 20. Ducting below carriageways to be 600mm below finished level. 21. Every duct to be installed with draw cords. 22. Refer to drawing WSCC-SD1-0500-042 for details regarding bedding and backfill installation. Standard installation type should be used where possible however appropriate installation type is subject to on site conditions. 23. This detailed design has been prepared in accordance with the HEA-HEMSA guidance note - CDM2015 regulations, issue 1.1, dated 09/04/15 Procedure 3: information has been supplied by the client or another designer or the principal designer which forms the basis of this lighting scheme design and includes the hazards identified by others on their hazard elimination and management list.
23 New Road 495209.3 105672. 24 New Road 495240.7 105662. 25 New Road 495232.3 105640. 26 New Road 495261.8 105628. 27 New Road 495250.7 105608. 28 New Road 495265.6 105574. 29 New Road 495284.4 105503. 30 New Road 495288.1 105466. 32 New Road 495283.8 105429. 33 New Road 495283.8 105392. 34 New Road 495275.8 105356.	 FP2 FP2 FP2 FP3 FP3 FP3 FP3 Unit close to Gas Low Presure main 		HV 11 500mm from cycle track edge	10 F AH 500mm from cycle track edge	500mm from cycle track edge										INE	Image: Hold of the second s
35 New Road 495264.0 105321. 36 New Road 495247.7 105287. 37 New Road 495235.0 105257. 38 New Road 495217.9 105219. 39 New Road 495213.9 105177. SAFETY HEALTH AND ENVIRONMEN Note the following sign	FP3 FP3 FP3 FP3 FP3 FP3 TAL (SHE) INFORMATION		Unit close to BT main Between 1.0-1.4 hetres from kerb			fron	0mm n cycle k edge	f	500mm from cycle track edge				5			SSE Enterprise - Lighting, 1st Floor, Solent Park, Walton Road, Portsmouth, PO6 1UJ TITLE STREET LIGHTING LAYOUT DRAWING SHEET 2 OF 8
CONSTRUCTION: High Voltage mains cable lo proposed and existing lighting equipment (indic shown). All measures are to be taken to locate excavation works commences. Known utilities present include (refer to drawing A29-CAP-VUT-00-DR-C-0077 to 0081 for furth- Low Pressure Mains - Eastern and Western sid	cated close to ted by the symbols nains before r details);	Lighting Classes (BS5489-1:: Fontwell Avenue ntwell Avenue Roundabout New Road New Road	2013) M4 C3 M4 C3								500mm from cycle track edge	fron	0mm n cycle k edge	EN INCOMENTAL OF		A29 REALIGNMENT WEST SUSSEX SCALE DATE 15/09/20 1:500 @ A1 DRAWN MWG CHECKED RHJ
Fontwell Avenue and Northern and Southern si Barnham Road.	e of (existing)	New Road Cycleway	P4							/			1		500m from c	PAPER SIZE A1 APPROVED SAB
Water mains (Portsmouth Water) - Eastern and (existing) Fontwell Avenue and running central Barnham Boad	along (existing)	Barnham Road arnham Road Roundabout	M3 C2							/			2		track e	DRAWING NUMBER REVISION SSE281768-1300-002
Barnham Road.									/					1		

C:\Users\mg23330\Enerveo\Lighting Design Hub - Documents\02 Projects\281768 - A29, West Sussex\2_Design\SSE281768-1300-001-008-M.dwg



Unit	t Otatua	Mounting	Column Type Column Materia	Installa			tic Output Colour	Wattage Luminair		Switching Unit Isolator	Luminaire Elexon	Key
Type ID Cour A 1	t Status Proposed column	Height 8 metres		Column Colour Typ	e Root Length Mounting Tilt	Luminaire Set	ting (klm) Temperature /50 18.0 Warm white	vveight		last Mayflower external node Tofco DPI rar	Code	Proposed street lighting column (Unit Type ID displayed inside symbol. Unit reference number displayed outside symbol).
B 2 C 2	Proposed column Proposed column			BS12C39 (Sherwood Green) Plant BS12C39 (Sherwood Green) Plant			O BL110.0Warm whiteO BL114.5Warm white		g 0.021m ² Electronic DALI enabled bal	last Mayflower external node Tofco DPI rar last Mayflower external node Tofco DPI rar	<u> </u>	Proposed raise and lower street lighting column (Unit Type ID displayed inside symbol. Unit reference number displayed
D 5	Proposed column			BS12C39 (Sherwood Green) Plant		•		. , ,	-	last Mayflower external node Tofco DPI rar	÷	outside symbol). Arrow indicated direction of lowering mechanism.
E 2 E 6	Proposed column Proposed column			BS12C39 (Sherwood Green) Plant BS12C39 (Sherwood Green) Plant			/50 13.0 Warm white 0 BL1 18.0 Warm white			lastMayflower external nodeTofco DPI rarlastMayflower external nodeTofco DPI rar		 Proposed illuminated sign consisting of galvanised steel wide base post. Signs to be lit by Simmonsigns LUA LED sign light
G 2	Proposed column	10 metres	Stepped tubular Galvanised stee	BS12C39 (Sherwood Green) Plant	ed Factory standard Post top 0 degree	es Philips BGP703 Mini Luma DM	110 10.0 Warm white	60W (40 no. LEDs) 9.5kg	g 0.021m ² Electronic DALI enabled bal	last Mayflower external node Tofco DPI rar	ge 42 0060 0000 100	with low voltage HF electronic ballast. Sign light controlled by Mayflower Internal node.
H 13	Proposed column Proposed column		Mid-Hinged Raise and Lower stepped tubularGalvanised steeMid-Hinged Raise and Lower stepped tubularGalvanised stee	BS12C39 (Sherwood Green) Plant BS12C39 (Sherwood Green) Plant			D BL12.0Warm whiteD BL12.0Warm white			lastMayflower external nodeTofco DPI rarlastMayflower external nodeTofco DPI rar		Proposed illuminated centre island post consisting of 4.7 metre mid hinged galvanised steel post, 2 no. internally
J 2	Proposed column		Stepped tubular Galvanised stee	BS12C39 (Sherwood Green) Plant	ed Factory standard Post top 0 degree	es Philips BGP702 Micro Luma DPL	BL1 2.0 Warm white	13W (10 no. LEDs) 8.0kg	g 0.021m ² Electronic DALI enabled bal	last Mayflower external node Tofco DPI rar	ge 42 0013 0000 100	illuminated Simmonsigns Invinca Keep Left signs and Simmonsigns white LED beacon. Equipment to be supplied by 24v supply.
L 2 M 4	Proposed column Proposed column			I BS12C39 (Sherwood Green) Plant I BS12C39 (Sherwood Green) Plant			/50 13.0 Warm white 0 BL1 14.5 Warm white	· · · · ·	0.021m² Electronic DALI enabled bal g 0.024m² Electronic DALI enabled bal	lastMayflower external nodeTofco DPI rarlastMayflower external nodeTofco DPI rar		Street lighting column to be retained.
N 10 O 2	Proposed column Proposed column		Mid-Hinged Raise and Lower stepped tubular Galvanised stee Stepped tubular Galvanised stee	· · · ·	tedExtended root (1.5m)Post top0 degreetedExtended root (1.5m)Post top0 degree					lastMayflower external nodeTofco DPI rarlastMayflower external nodeTofco DPI rar	-	 Street lighting column to be removed. Proposed feeder pillar with 230v single phase supply installed
	2 /							107W (80 H0. LEDS) 11.5Kg				to WSCC specification.
		-1-										 450mm x 450mm polyproylene preformed twin wall modular duct access chamber similar to NAL Limited STAKKAbox
												Modula duct chamber. Chamber, concrete infill and cover are to be rated to B125. Depth of chamber to allow for a 600mm
												deep duct run (see note 20). Notes
- P												 Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in accordance with current West Sussex County Council's specification 'Lighting of Develop
	/ <i>E</i> , j	6										Promoted Highway Schemes in West Sussex'.3. Contractor to confirm position of statutory undertakers plant before commencement of the works. For statutory undertaker's information visit
		No.										www.linesearchbeforeudig.co.uk 4. During works all traffic management to be in accordance with Chapter 8 of
												the Traffics Signs Manual.5. Lighting columns to be fed by DNO supply unless otherwise shown.6. Each luminaire to be fitted with Mayflower Complete Lighting control S6000
154	fror	00mm m cycle	P									socket (NEMA). 7. Column maintenance numbers have been agreed with WSCC and
Ŭ		ck edge								/	/	therefore numbering on-site should be as per the lighting drawings.8. Columns to be numbered using adhesive labels suitable for exterior use. Letters and numerals shall be 50mm high black on a white background.
Ret	ation Easting	Northing	Electricity Supply									 One Mayflower Complete Lighting control DALI sub-master unit to be installed to control nodes and link central management system. Lighting columns are to be planted directly into the ground as per WSCC's
	am Road 495129.3 am Road 495149.8		DNO from cycle									specification referred to as "Road Lighting column erection details". 11. All apparatus are to be new at the time of installation and be supported by
25 Barnh	am Road 495174.4	105153.1	FP3 track edge	N - C			la i	Vordo				relevant manufacturer's guarantees. 12. All apparatus shall be sited so as to minimise, in so far as is reasonable and practical, nuisance, danger and obstruction to all residents, businesses
	am Road 495200.6 am Road 495191.6		FP3 FP3				behin	verge d trench				and users of the highway. 13. All illuminated apparatus must be installed and tested in compliance with
	am Road 495158.9		FP3	500mm from cycle								BS7671 at the time of adoption.14. All installations must be installed in such a way that trees or any other foliage on the site does not interfere with the level of lighting.
	am Road 495149.9 am Road 495214.8		FP3 DNO	track edge		NEW ROAD						15. All electrical cables to be XLPE/SWA/PVC and laid in ducting. 16.150mm wide yellow heavy gauge PVC tape marked "Street Lighting Cable"
	am Road 495238.3 Il Avenue 494652.6		DNO FP1	/				0	In verge behind trench			 placed over private electricity ducts / cables 17. Locations of duct chambers shown on the drawing are indicative (albeit they have been cross referenced against other highway disciplines to avoid
7 Fontwe	Il Avenue 494634.5	5 105991.5	FP1		500mm							clashes). Final locations shall be confirmed on site.18. Ducting to be 100mm dia PVC ducts coloured orange. Maximum number of cables per duct is 3. One spare duct is to be installed at each road crossing.
	Il Avenue 494661.8 Il Avenue 494622.1		FP1 FP1		from cycle track edge	P =	\searrow	No.				19. Ducting below footways to be 450mm below finished level. 20.Ducting below carriageways to be 600mm below finished level.
	Il Avenue 494647.9		FP1			8			1x duct	\mathbf{i}		21.Every duct to be installed with draw cords. 22.Refer to drawing WSCC-SD1-0500-042 for details regarding bedding and backfill installation. Standard installation type should be used where
	Il Avenue 494618.7 Il Avenue 494590.6		FP1 FP1			from cycle			plus spare			possible however appropriate installation type is subject to on site conditions.
	Road 494680.4 Road 494714.8	105934.1 105912.0	FP1			track edge		3X av		1x duct		23. This detailed design has been prepared in accordance with the HEA-HEMSA guidance note - CDM2015 regulations, issue 1.1, dated 09/04/15 Procedure 3: information has been supplied by the client or
		105890.1	FP1			500n						another designer or the principal designer which forms the basis of this lighting scheme design and includes the hazards identified by others on their hazard elimination and management list.
		105877.2 105869.6	FP1 FP1			from c	ycle					
6 Nev	Road 494867.2	2 105858.9	FP1			tracke		14				
		105843.2 105826.8	FP1 FP1				FP2/		YY			UMNEDCATIONS COMMENTS 05/11/21 MWG
		5 105813.5 105707.2						500mm	500mm		\int	E AMENDED FOLLOWING JCE COMMENTS 29/04/21 MWG
		105797.2 105777.8					Ĺ Ĺ	from cycle track edge	from cycle track edge		$\langle \rangle \langle \rangle$	D AMENDED FOLLOWING JCE COMMENTS 04/03/21 MWG
		105812.0 105797.0				4	2x duct / plus spare			ALI - H		C AMENDED FOLLOWING JCE COMMENTS 26/01/21 MWG
14 Nev	Road 495067.6	6 105764.8	FP2				Pres share			FR2A		B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10/20 MWG
		105766.1 105751.7	FP2 FP2					\checkmark	500mm from cycle			REV DESCRIPTION DATE BY
		105721.3					7		track edge	\sim \checkmark \checkmark \checkmark \checkmark		sse Lighting
		105696.4 105689.1	FP2 FP2	/						Mini feeder pillar for bus		Enterprise Lighting
		0 105699.1 6 105712.8	FP2 FP2			/	/			stop board.		
22 Nev	Road 495217.6	6 105694.9	FP2							July 1		SSE Enterprise - Lighting, 1st Floor, Solent Park, Walton Road, Portsmouth, PO6 1UJ
		3 105672.3 7 105662.2		5 40 45 50 							500mm	
25 Nev	Road 495232.3	3 105640.7	FP2								rack edge	LAYOUT DRAWING
		3 105628.2 7 105608.6										SHEET 3 OF 8
		6 105574.7 9 105539.4	ED3								500mm	PROJECT
30 Nev	Road 495284.4	105503.1	FP3								<pre>/ from cycle // // // // // // // // // // // // //</pre>	A29 REALIGNMENT WEST SUSSEX
		105466.3 105429.2	FP3 CONSTRUCTION: High Voltage mains cable located proposed and existing lighting equipment (indicated by shown). All measures are to be taken to locate mains	/ the symbols	ting Classes (BS5489-1:2013)							SCALE DATE 15/09/20
33 Nev	Road 495283.8	3 105392.4	FP3 excavation works commences.		Fontwell AvenueM4ell Avenue RoundaboutC3							1:500 @ A1 DRAWN MWG
		3 105356.2 0 105321.0	FP3 Known utilities present include (refer to drawings FP3 A29-CAP-VUT-00-DR-C-0077 to 0081 for further deta Low Pressure Mains - Eastern and Western side of (e	ils);	New Road M4						/ // ///	CHECKED RHJ
		105287.7 105257.7	FP3 Fontwell Avenue and Northern and Southern side of (existing)	w Road Roundabout C3 ew Road Cycleway P4					/		PAPER SIZE A1 APPROVED SAB
	Road 495217.9	105257.7 105219.8	FP3 Water mains (Portsmouth Water) - Eastern and Wester FP3 (existing) Fontwell Avenue and running centrally along	(existing)	Barnham Road M3 am Road Roundabout C2							DRAWING NUMBER REVISION SSE281768-1300-003 F
39 Nev	Road 495213.9	0 105177.9	FP3 Barnham Road.		am Road Roundabout C2						E	

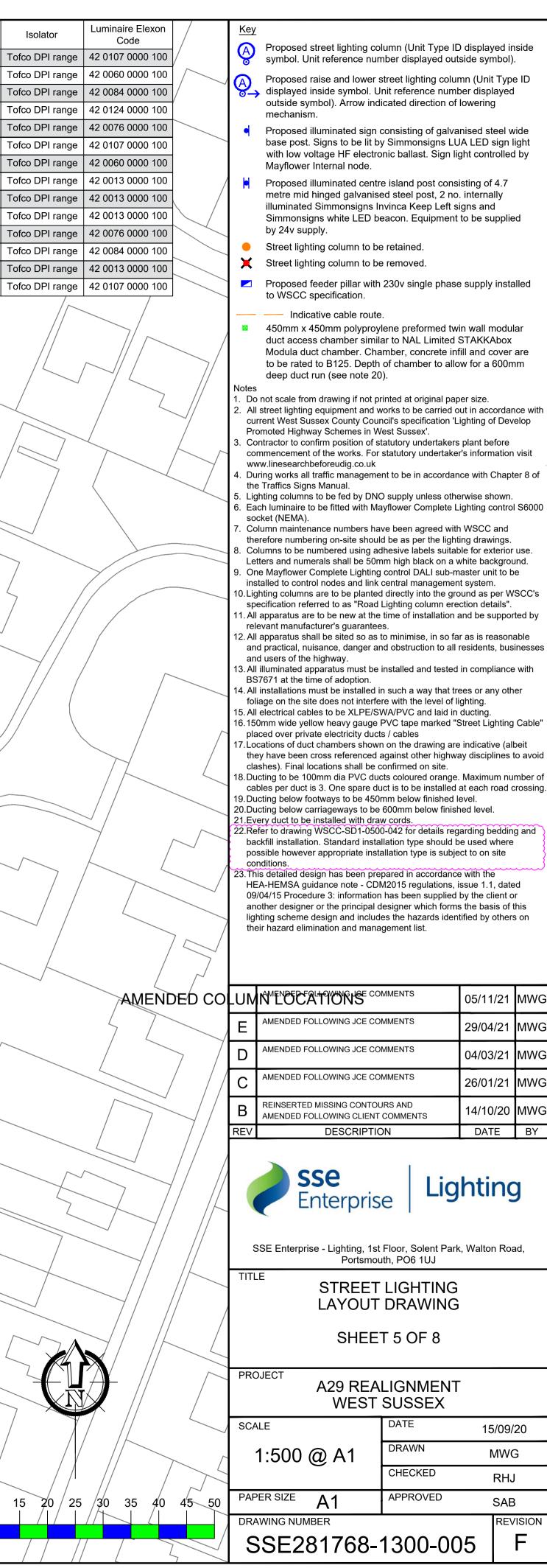




Isolator Luminaire Elexon Code fco DPI range 42 0107 0000 100 fco DPI range 42 0060 0000 100 fco DPI range 42 0084 0000 100 fco DPI range 42 0084 0000 100 fco DPI range 42 0076 0000 100 fco DPI range 42 0076 0000 100 fco DPI range 42 0013 0000 100 fco DPI range 42 0010 000 100 fco DPI range 42 0010 000 100 fco DPI range 42 0010 000 100 fco DPI range 42 0013 0000 100 fco DPI range 42 0010 000 100 fco DPI range	mbol). it Type olayed og steel w of ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally od supplie y insta cover a 600m of Deve pefore mation	e ID vide light d by ed alled lar are nm
for DPI range 42 0107 0000 100 for DPI range 42 0080 0000 100 for DPI range 42 0084 0000 100 for DPI range 42 017 0000 100 for DPI range 42 017 0000 100 for DPI range 42 0107 0000 100 for DPI range 42 0107 0000 100 for DPI range 42 0101 0000 100 for DPI range 42 0013 0000 100 for DPI range 42 0013 0000 100 for DPI range 42 0013 0000 100 for DPI range 42 0006 0000 100 for DPI range 42 00076 0000 100 for DPI range 42 0013 0000 100 for DPI range 42 0017 0000 100 for DPI range 42 0107 0000 100 for DPI rang	mbol). it Type olayed og steel w of ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally of 4.7 ally od supplie y insta cover a 600m of Deve pefore mation	e ID vide light d by ed alled lar are nm
 For DPI range 42 0084 0000 100 for DPI range 42 0172 0000 100 for DPI range 42 0076 0000 100 for DPI range 42 0013 0000 100 for DPI range 42 00	olayed of a sign line of 4.7 ally of 4.7 ally of ally of a supplie y insta (Abox cover a 600m of Deve before mation	vide light d by ed alled lar are nm
 into DPI range 42 0124 0000 100 ifco DPI range 42 0000 000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 013 0000 100 ifco DPI range 42 017 0000 100 ifco DPI range 42 010	steel w sign li atrolled of 4.7 ally ad supplie y insta (Abox cover a 600m cordan of Deve pefore mation	light d by ed alled lar are nm
ifco DPI range 42 0107 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0017 0000 100	o sign li atrolled of 4.7 ally ad supplie y insta (Abox cover : a 600m cordan of Deve before mation	light d by ed alled lar are nm
 Alter and the second state of the	mtrolled of 4.7 ally d supplie y insta (Abox cover : a 600m ccordan of Deve before mation	d by ed alled lar are nm
fico DPI range 42 0013 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0076 0000 100 ifco DPI range 42 0076 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0013 0000 100 ifco DPI range 42 0107 0000 100 ifco DPI range 12 0107 0000 100	ally ad supplie y insta (Abox cover : a 600m	alled lar are nm
 Internating 12 0013 0000 100 Internation DPT range 12 0013 0000 100 Infoo D	y insta modul (Abox cover : a 600m	alled lar are nm
 Bernard Street lighting column to be retained. Street lighting column to be removed. Street lighting column to be removed. Street lighting column to be removed. Proposed feeder pillar with 230v single phase supply to WSCC specification. Indicative cable route. 450mm x 450mm polyproylene preformed twin wall duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting upromocement of the works. For statutory undertakers plant b commencement of the works. For statutory undertakers inform www.linesearcheforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be field with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCC 	y insta modul (Abox cover a 600m cordan of Deve pefore mation	alled lar are nm
 Street lighting column to be retained. Street lighting column to be removed. Street lighting column to be removed. Street lighting column to be removed. Proposed feeder pillar with 230v single phase supply to WSCC specification. Indicative cable route. 450mm x 450mm polyproylene preformed twin wall duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertakers inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fetd by DNO supply unless otherwises s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCC 	modul (Abox cover a 600m cordan of Deve pefore mation	lar are າm າce with
 Proposed feeder pillar with 230v single phase supply to WSCC specification. Indicative cable route. 450mm x 450mm polyproylene preformed twin wall duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwises s 6. Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCC 	modul (Abox cover a 600m cordan of Deve pefore mation	lar are າm າce with
 to WSCC specification. Indicative cable route. 450mm x 450mm polyproylene preformed twin wall duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting - Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwises s 6. Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCC 	modul (Abox cover a 600m cordan of Deve pefore mation	lar are າm າce with
 450mm x 450mm polyproylene preformed twin wall duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO 	(Abox cover : a 600m cordan of Deve pefore mation	are nm nce with
 duct access chamber similar to NAL Limited STAKK Modula duct chamber. Chamber, concrete infill and to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's infor www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO 	(Abox cover : a 600m cordan of Deve pefore mation	are nm nce with
 to be rated to B125. Depth of chamber to allow for a deep duct run (see note 20). Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting' Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwises s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO 	a 600m ccordan of Deve pefore mation	nm nce with
 Notes Do not scale from drawing if not printed at original paper size. All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO. 	cordan of Deve pefore mation	
 All street lighting equipment and works to be carried out in ac current West Sussex County Council's specification 'Lighting' Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant b commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO. 	cordan of Deve pefore mation	
 Promoted Highway Schemes in West Sussex'. Contractor to confirm position of statutory undertakers plant be commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). Column maintenance numbers have been agreed with WSCO 	efore mation	elop
 commencement of the works. For statutory undertaker's inform www.linesearchbeforeudig.co.uk During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). UNITS 17, 18, 21, 22 	mation	
 During works all traffic management to be in accordance with the Traffics Signs Manual. Lighting columns to be fed by DNO supply unless otherwise s Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). UNITS 17, 18, 21, 22 Column maintenance numbers have been agreed with WSCC 	Chapte	visit
 5. Lighting columns to be fed by DNO supply unless otherwise s 6. Each luminaire to be fitted with Mayflower Complete Lighting socket (NEMA). UNITS 17, 18, 21, 22 7. Column maintenance numbers have been agreed with WSCC 		er 8 of
FOR SELEC socket (NEMA). UNITS 17, 18, 21, 22 7. Column maintenance numbers have been agreed with WSCC		
	C and	
OLITELIT INSET 8. Columns to be numbered using adhesive labels suitable for e	wings. exterior	
IMPACT ON LIGH 9. One Mayflower Complete Lighting control DALI sub-master un	nit to b	
RED installed to control nodes and link central management system 10. Lighting columns are to be planted directly into the ground as	per W	SCC's
re specification referred to as "Road Lighting column erection de 11. All apparatus are to be new at the time of installation and be s		ted by
rbrelevant manufacturer's guarantees.12. All apparatus shall be sited so as to minimise, in so far as is r and practical, nuisance, danger and obstruction to all resident		
ehind 13. All illuminated apparatus must be installed and tested in comp		
btway BS7671 at the time of adoption. 14. All installations must be installed in such a way that trees or a		
foliage on the site does not interfere with the level of lighting. 15. All electrical cables to be XLPE/SWA/PVC and laid in ducting	-	
1x duct 16.150mm wide yellow heavy gauge PVC tape marked "Street Li		Cable"
 plus spare 17.Locations of duct chambers shown on the drawing are indicat they have been cross referenced against other highway discipation 		
clashes). Final locations shall be confirmed on site. 18. Ducting to be 100mm dia PVC ducts coloured orange. Maxim	um nur	mber of
cables per duct is 3. One spare duct is to be installed at each 19. Ducting below footways to be 450mm below finished level.		rossing.
20.Ducting below carriageways to be 600mm below finished leve 21.Every duct to be installed with draw cords.		~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~
22.Refer to drawing WSCC-SD1-0500-042 for details regarding to backfill installation. Standard installation type should be used	where	
footway 23. This detailed design has been prepared in accordance with the		~~~·}
HEA-HEMSA guidance note - CDM2015 regulations, issue 1. 09/04/15 Procedure 3: information has been supplied by the c	1, date	
another designer or the principal designer which forms the ba lighting scheme design and includes the hazards identified by		
their hazard elimination and management list.		
	1/21	MWG
E AMENDED FOLLOWING JCE COMMENTS 29/04	4/21	MWG
	3/21	MWG
D AMENDED FOLLOWING JCE COMMENTS 04/03		_
	1/21	MWG
C AMENDED FOLLOWING JCE COMMENTS 26/0		MWG
C AMENDED FOLLOWING JCE COMMENTS 26/01 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10	0/20	MWG
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND 14/10	0/20	
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DATE	0/20 .TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DATE	0/20 .TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA	0/20 .TE	MWG BY
Image: Constraint of the second se	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V DESCRIPTION DA SSE Enterprise Lighti SSE Enterprise Lighti SSE Enterprise Lighti	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V DESCRIPTION DA SSE Enterprise Lighti SSE Enterprise - Lighting, 1st Floor, Solent Park, Walton	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V SSE Enterprise Lighti SSE Enterprise - Lighting, 1st Floor, Solent Park, Walto Portsmouth, PO6 1UJ SSE Enterprise - Lighting, 1st Floor, Solent Park, Walto	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V DESCRIPTION DA V DESCRIPTION DA V SSE Enterprise Lighti SSE Enterprise Lighti TITLE STREET LIGHTING LAYOUT DRAWING	0/20 TE	MWG BY
Image: Constraint of the second state of the second sta	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/11 REV DESCRIPTION DA Image: Control of the state	0/20 TE	MWG BY
D 04/0. C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V DESCRIPTION DA V DESCRIPTION DA V SSE Enterprise Lighti SSE Enterprise - Lighting, 1st Floor, Solent Park, Walto Portsmouth, PO6 1UJ TITLE STREET LIGHTING LAYOUT DRAWING SHEET 4 OF 8 SHEET 4 OF 8 SHEET 4 OF 8 SHEET 4 OF 8	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V DESCRIPTION DA SSE Enterprise Lighti SSE Enterprise Lighti TITLE STREET LIGHTING LAYOUT DRAWING SHEET 4 OF 8 PROJECT PROJECT A29 REALIGNMENT WEST SUSSEX PROJECT A29 REALIGNMENT WEST SUSSEX	0/20 TE	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/10 REV DESCRIPTION DA V SEE Enterprise - Lighting, 1st Floor, Solent Park, Walter Portsmouth, PO6 1UJ TITLE STREET LIGHTING LAYOUT DRAWING SHEET 4 OF 8 PROJECT A29 REALIGNMENT WEST SUSSEX SCALE DATE 1	0/20 TE Inc on Roa	MWG BY
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/11 REV DESCRIPTION DA V DESCRIPTISE Lighting, 1st Floor, Solent Park, Walter Portsmouth, PO6 1UJ TITLE STREET LIGHTING LAYOUT DRAWING SHEET 4 OF 8 PROJECT A29 REALIGNMENT V V DATE 1 V DESCRIPTION DATE V DESCRIPTION DATE	0/20 TE inc on Roa 5/09/2 MWG	MWG BY
Image: Construction of the system Image: C	0/20 TE inc on Roa 5/09/2 MWC RHJ	MWG BY ad, 20 G
Image: Constraint of the second se	0/20 TE inc on Roa 5/09/2 MWC RHJ SAB	MWG BY ad, 20 G
C AMENDED FOLLOWING JCE COMMENTS 26/0 B REINSERTED MISSING CONTOURS AND AMENDED FOLLOWING CLIENT COMMENTS 14/11 REV DESCRIPTION DA Image: Comparison of the state of	0/20 TE Inc on Roa 5/09/2 MWC RHJ SAB REV	MWG BY ad, 20 G

Unit Type IE	Count	Status	Mounting Height	Column Type	Column Materia	Column Colour	Installation Type	Root Length	Mounting	Luminaire Tilt	Luminaire	Optic Setting	Output (klm)	Colour Temperature	Wattage	Luminaire Weight	Windage	Control Unit	Switching Unit	Isc
A	1	Proposed colum		Stepped tubular	Galvanised stee	BS12C39 (Sherwood Green)	Planted	Factory standard	Post top	0 degrees	s Philips BGP704 Medium Luma		18.0	Warm white	107W (80 no. LEDs)	11.5kg	0.024m ² Electr	onic DALI enabled ball	last Mayflower external nod	de Tofco
В	2	Proposed colum	n 8 metres	Stepped tubular	Galvanised stee	BS12C39 (Sherwood Green)	Planted	Factory standard	Post top	0 degrees	s Philips BGP703 Mini Luma	DM10 BL1	10.0	Warm white	60W (40 no. LEDs)	9.5kg	0.021m ² Electr	onic DALI enabled ball	ast Mayflower external nod	le Tofco
С	2	Proposed colum		Stepped tubular		BS12C39 (Sherwood Green)	Planted	Factory standard		-			14.5	Warm white	84W (80 no. LEDs)	11.5kg		onic DALI enabled ball	-	
D	2	Proposed colum Proposed colum		Stepped tubular Stepped tubular		BS12C39 (Sherwood Green)BS12C39 (Sherwood Green)	Planted Planted	Factory standard	Post top Post top	0 degrees		a DW50 DW50	21.0 13.0	Warm white Warm white	127W (80 no. LEDs) 76W (40 no. LEDs)	11.5kg 9.5kg		onic DALI enabled ball	last Mayflower external nod	
F	6	Proposed colum		Stepped tubular		BS12C39 (Sherwood Green)	Planted	Factory standard		0 degrees	•		18.0	Warm white	107W (80 no. LEDs)	11.5kg			last Mayflower external nod	
G	2	Proposed colum	n 10 metres	Stepped tubular	Galvanised stee	BS12C39 (Sherwood Green)	Planted	Factory standard	Post top	0 degrees	s Philips BGP703 Mini Luma	DM10	10.0	Warm white	60W (40 no. LEDs)	9.5kg	0.021m ² Electr	onic DALI enabled ball	last Mayflower external nod	le Tofco
н	13	Proposed colum		Mid-Hinged Raise and Lower steppe		BS12C39 (Sherwood Green)	Planted	Factory standard		0 degrees		DN10 BL1	2.0	Warm white	13W (10 no. LEDs)	8.0kg			ast Mayflower external nod	
J	2	Proposed colum Proposed colum		Mid-Hinged Raise and Lower steppe Stepped tubular		BS12C39 (Sherwood Green)BS12C39 (Sherwood Green)	Planted Planted	Factory standard Factory standard	Post top Post top	0 degrees		DM50 BL1 DPL1 BL1	2.0 2.0	Warm white Warm white	13W (10 no. LEDs) 13W (10 no. LEDs)	8.0kg 8.0kg		onic DALI enabled ball	last Mayflower external nod	
L	2	Proposed colum				I BS12C39 (Sherwood Green)	Planted	Factory standard		0 degrees	· ·	DW50	13.0	Warm white	76W (40 no. LEDs)	9.5kg			last Mayflower external nod	
М	4	Proposed colum		Stepped tubular		BS12C39 (Sherwood Green)	Planted	Extended root (1.5m	· ·	0 degrees	-		14.5	Warm white	84W (80 no. LEDs)	11.5kg		onic DALI enabled ball	-	
N O	10	Proposed colum Proposed colum		Mid-Hinged Raise and Lower steppe Stepped tubular		BS12C39 (Sherwood Green)BS12C39 (Sherwood Green)	Planted Planted	Extended root (1.5m Extended root (1.5m	, .	0 degrees 0 degrees		DN10 BL1 DW50 BL1	2.0 18.0	Warm white Warm white	13W (10 no. LEDs) 107W (80 no. LEDs)	8.0kg 11.5kg			last Mayflower external nod last Mayflower external nod	
Col	2			Electricity	Galvaniseu siee		Flanted	Extended foot (1.5m		-				<u> </u>	•	TT.5Kg				
Ref			Northing	Supply							C A		X / \downarrow							
23 24			.3 105190.1 .8 105168.0	DNO DNO									/ / /							
25	Barnha	am Road 495174	_	FP3								R	S/N	i \						/
25A			.6 105135.0	FP3							30									
25B 25C		am Road 495191 am Road 495158	.6 105107.0 9 105104.8								A A	PV V	15 1	$\left \right\rangle$						
250 25D		am Road 495149	_								500mm	XXIII	43							
26	Barnha	am Road 495214	.8 105106.3	DNO							from cycle	K/ K	\$							
27			.3 105091.0								h						,			
6 7		Il Avenue 494652 Il Avenue 494634	.6 106020.6 .5 105991.5	FP1 FP1							{}}	VRI		4 I]			/	/		/
8		Il Avenue 494661		FP1							51 \$ K	ANT								
9		Il Avenue 494622	.1 105964.7	FP1							×/3 / +								~ ~	
10		II Avenue 494647	_	FP1										1 1						
		Il Avenue 494618 Il Avenue 494590	.7 105924.5 .6 105898.3	FP1 FP1							STAR / J	312								4
1		Road 494680	_								from cycle									/
2			.8 105912.0	FP1							track edge						7 //			\checkmark
3 4		Road 494748 Road 494787	.4 105890.1 .4 105877.2	FP1 FP1							<i>{}} </i>	\triangleleft							. 7	
5			.7 105869.6	FP1							87 8					/			$\int \zeta$	/
6	New	Road 494867	.2 105858.9	FP1							<i>{}</i>									
7		Road 494905										\sim								
8			.7 105826.8 .5 105813.5	FP1 FP2							<i>§3</i> <i>8</i>							/ 4		
10		Road 495020															/			
11			.9 105777.8							8	\$1 Jam 15	32 20								
12			.1 105812.0 .2 105797.0							\$	500mm			4 1					\rightarrow	
10		Road 495067		FP2						\$3	from cycle	~			7	/				
15	New		.7 105766.1							<i>{}} </i>	/ from							7/ -		$ \ \ \ \ \ \ \ \ \ \ \ \ \ $
16			.2 105751.7						(8										
17			.1 105721.3 .0 105696.4	FP2 FP2					Ĵ	\$ {	{}					/				
19	New	Road 495199	.5 105689.1	FP2					\$\$							/		7		
20		Road 495205		FP2					\$3	{}				\sim	A					
21 22			.6 105712.8 .6 105694.9						<i>§</i>]						8					
23			.3 105672.3						81	\$ <u>}</u>	500mm		/ /		8			_ /		
24			.7 105662.2	FP2				/	$\left \left \right \right $	<i>{}}</i>	from cycle		$\int \frac{\pi}{h}$	$\left \begin{array}{c} \\ \\ \\ \\ \end{array} \right $			\square	7		
25 26		Road 495232 Road 495261	.3 105640.7 .8 105628.2	FP2 FP2				, in the second s	3	\$	track edge					/	\mathcal{M}			
20			.7 105608.6	FP3	\backslash		\			\checkmark			[" r	<u> </u>		\mathbb{Z}			/	/
28	New	Road 495265	.6 105574.7	FP3	~	1 / / -		\searrow β	\$ }								/ //			
29 30		Road 495276 Road 495284	.9 105539.4 .4 105503.1	FP3 FP3				1-61	1 <i>3</i> B	\rangle		'/ /		{		$\int \int$				
31			.1 105466.3						Υ				" (> 4 ,		< /	$^{\prime}$			L	
32	New	Road 495287	.9 105429.2	FP3			- Charles	~ //	\bigwedge				4 ,	}	\land					
33			.8 105392.4					\mathcal{T}			00mm			$i \in M$		$\zeta =$		1		
34			.8 105356.2 .0 105321.0	FP3 FP3				32//		> fron	m cycle		, /	{	/ 71 1	L				
36			.7 105287.7	FP3			7 / ~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	717			k edge		b'	E []	$// \langle \rangle$		/			
37			.0 105257.7	FP3	/ / // /		_/ /	<u> </u>					- 7			\Box			$ \downarrow \uparrow$	
38 39			.9 105219.8 .9 105177.9	FP3 FP3	1 1/2					/			\checkmark (- /		-4			4	
		100210	100111.9				/						\neg		T					
				8 // //	\mathbb{N}_{\sim}		/)	// //		1 1 1 1	/	\sim \sim						
	01							/)	// /	////	3/ 1/ 1	///	/		71					
	SAFET			AL (SHE) INFORMATION									\wedge	_ /	3/	//				\sim
		Note the fo	llowing signific	ant risks:				///	500m	Y /	35		/	4	\sim / //	/				
		N: High Voltage m xisting lighting equi			Lighting Classes (BS5489				/ (from cy track e		24 F ."	/ / p /	$ \land $	17						$\overline{}$
shown)	All mea	sures are to be tak sores are to be tak s commences.			Fontwell Avenue	M4		/ / / /			۲///////////	$\sim/$		\prec	7 7					/
			or to drawing		Fontwell Avenue Roundabo			/ / / /				/ /			\bigwedge				~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	_/
A29-C/	P-VUT-	oresent include (refe 00-DR-C-0077 to 00	081 for further		New Road	M4		/ / / /				/ /	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~							~
Fontwe	l Avenue	lains - Eastern and e and Northern and			New Road Roundabout New Road Cycleway	C3 P4		/ / / /	// //	(R)			\sim						0/ 5 1	10 15
	nains (P	ortsmouth Water) -			Barnham Road	M3			'/ / / -+		́// / е́у́т і		/	~~~//	/ //					
(existing Barnha		ell Avenue and run	ning centrally a	along (existing)	Barnham Road Roundabou					_//_//_			L		//					/
							/							,]]	/ /					/
L													1							

Lighting Classes (BS5489-1:2	2013)
Fontwell Avenue	M4
Fontwell Avenue Roundabout	C3
New Road	M4
New Road Roundabout	C3
New Road Cycleway	P4
Barnham Road	M3
Barnham Road Roundabout	C2



MWG

RHJ

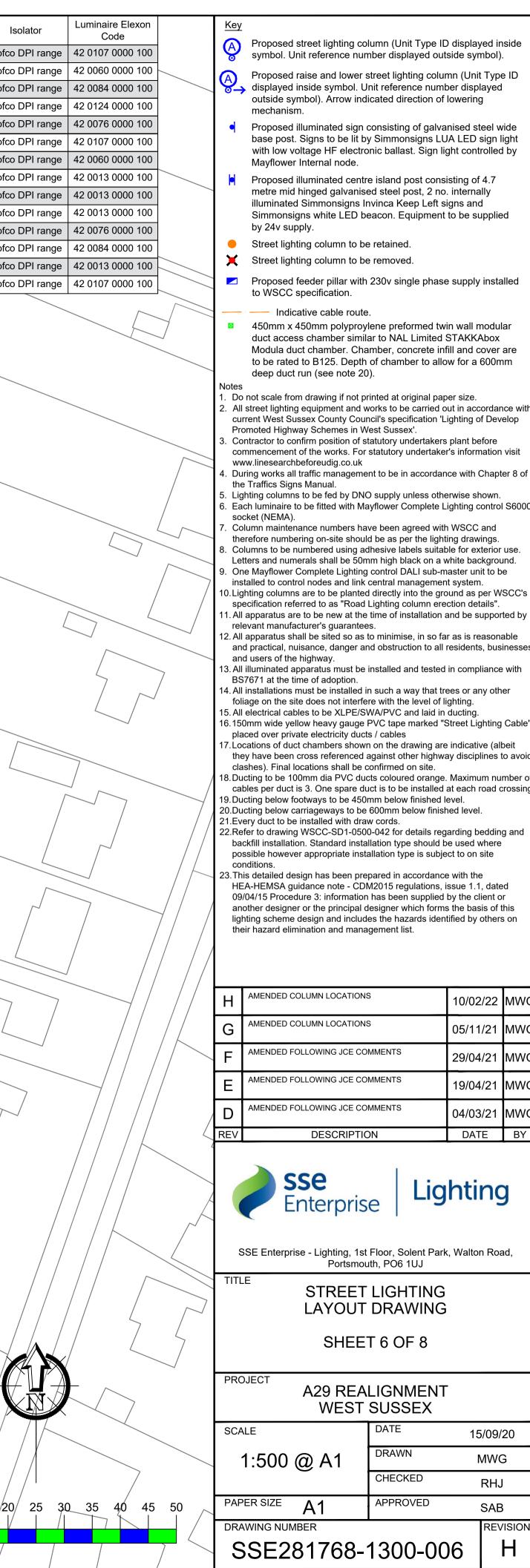
SAB

REVISION

F

Unit Type ID	Count	Status	Mounting Height	Column Type	e Col	lumn Material	Column Colour	Installation Type	Root Length	Mounting Luminaire	Luminaire	Optic Setting	Output (klm)	Colour Temperature	Wattage	Luminaire Weight	Windage	Control Unit	Switching Unit	Isola
A	1 P	roposed column	Ű	Stepped tubula	ar Gal	Ivanised steel	BS12C39 (Sherwood Green)	Planted	Factory standard	Post top 0 degrees	Philips BGP704 Medium Lum		18.0	Warm white	107W (80 no. LEDs)	11.5kg	0.024m ² Electron	nic DALI enabled ballas	t Mayflower external node	Tofco DF
В		roposed column		Stepped tubula			BS12C39 (Sherwood Green)	Planted	Factory standard	Post top 0 degrees	Philips BGP703 Mini Luma		10.0	Warm white	60W (40 no. LEDs)	9.5kg			t Mayflower external node	
C D		roposed column roposed column		Stepped tubula Stepped tubula			BS12C39 (Sherwood Green) BS12C39 (Sherwood Green)	Planted Planted	Factory standard Factory standard		Philips BGP704 Medium Lum Philips BGP704 Medium Lum		14.5 21.0	Warm white Warm white	84W (80 no. LEDs) 127W (80 no. LEDs)	11.5kg 11.5kg			t Mayflower external node Mayflower external node	
E		roposed column		Stepped tubula			BS12C39 (Sherwood Green)	Planted	Factory standard	Post top 0 degrees	Philips BGP703 Mini Luma		13.0	Warm white	76W (40 no. LEDs)	9.5kg			t Mayflower external node	
F		roposed column roposed column		Stepped tubula Stepped tubula			BS12C39 (Sherwood Green) BS12C39 (Sherwood Green)	Planted Planted	Factory standard Factory standard	Post top 0 degrees Post top 0 degrees	Philips BGP704 Medium Lum Philips BGP703 Mini Luma		18.0 10.0	Warm white Warm white	107W (80 no. LEDs) 60W (40 no. LEDs)	11.5kg 9.5kg			t Mayflower external node	
H		roposed column		Mid-Hinged Raise and Lower			BS12C39 (Sherwood Green)	Planted	Factory standard	Post top 0 degrees Post top 0 degrees	Philips BGP702 Micro Luma		2.0	Warm white	13W (10 no. LEDs)	8.0kg			t Mayflower external node	
1		roposed column		Mid-Hinged Raise and Lower			BS12C39 (Sherwood Green)	Planted	Factory standard	Post top 0 degrees	Philips BGP702 Micro Luma		2.0	Warm white	13W (10 no. LEDs)	8.0kg			Mayflower external node	
L		roposed column roposed column		Stepped tubula Stepped tubula			BS12C39 (Sherwood Green) BS12C39 (Sherwood Green)	Planted Planted	Factory standard Factory standard	Post top 0 degrees Post top 0 degrees	Philips BGP702 Micro Luma Philips BGP703 Mini Luma	DPL1 BL1	2.0 13.0	Warm white Warm white	13W (10 no. LEDs) 76W (40 no. LEDs)	8.0kg 9.5kg			t Mayflower external node Mayflower external node	
М		roposed column		Stepped tubula			BS12C39 (Sherwood Green)	Planted	Extended root (1.5m)	, ,	Philips BGP704 Medium Lum		14.5	Warm white	84W (80 no. LEDs)	11.5kg			t Mayflower external node	
N O		roposed column roposed column		Mid-Hinged Raise and Lower Stepped tubula			BS12C39 (Sherwood Green) BS12C39 (Sherwood Green)	Planted Planted	· · · · · ·	Post top 0 degrees	Philips BGP702 Micro Luma Philips BGP704 Medium Lum		2.0 18.0	Warm white Warm white	13W (10 no. LEDs) 107W (80 no. LEDs)	8.0kg 11.5kg			t Mayflower external node Mayflower external node	
Col	Locatior		цт	Electricity												-				
Ref 23	Barnham R		Ű	Supply DNO								/ /D/	500r	// / /		, ", ', ', ', ', ', ', ', ', ', ', ', ', ',)) //	
	Barnham R			DNO			5						/ from o	cycle 🚽 🔁	36	"" <u>\</u>		+		
	Barnham R Barnham R			FP3 FP3		C	σ		/	/ /		/ ///	track (/ / /	edge						
	Barnham R			FP3		$\langle \rangle$						/ {	// <	DD		Δ				
	Barnham R	aoad 495158.9 aoad 495149.9		FP3 FP3		//									NEWR	/				
		ad 495149.9		DNO				/	\sim					1941	and " A		7			
		toad 495238.3		DNO					7			√ / 500mm				/				
		enue 494652.6 enue 494634.5		FP1 FP1							/ /	from cycle track edge							/	
8 F	ontwell Ave	enue 494661.8	105970.9	FP1					\sum			liack edge		1 9 377 //						
		enue 494622.1 enue 494647.9		FP1 FP1	/					/ /					11 \$ 1 ~ 1					
		enue 494618.7		FP1										//////		/				
12 F		enue 494590.6		FP1											A_{j}					
2	New Roa		105934.1 105912.0	FP1									////		/					
3	New Roa		105890.1	FP1					7					"}4						
4	New Roa		105877.2 105869.6	FP1 FP1							$\langle \langle \rangle \rangle$	~ ///////								
6	New Roa	ad 494867.2	105858.9	FP1							500mm from cycle		/ //	115 14						
7	New Roa		105843.2 105826.8	FP1							track edge									
9	New Roa		105813.5	FP2		\searrow							/srg							
10	New Roa		105797.2 105777.8	FP2	22					_										
12	New Roa			FP2 FP2			500mm from cycle track edge.	e /					BI L	,			/5 //			
13	New Roa		105797.0	FP2			Requires new DN supply service.	\rightarrow												
14 15	New Roa		105764.8 105766.1	FP2 FP2				Uni	it close to		T-L P	Shop "				\rightarrow				
16	New Roa		105751.7				SignT,542		-V main					/		\rightarrow				
17	New Roa		105721.3 105696.4	FP2 FP2					······					[,
19	New Roa			FP2			N S WW	1	m from cycle								7/			/
20	New Roa			FP2		nated sign				FP3 incl. duct	/ X / 39@		motros	/		//	14			
21 22	New Roa		105712.8 105694.9	FP2 FP2		ached to olumn	All Amark			to LV main			metres n kerb							
23	New Roa	ad 495209.3	105672.3	FP2			E M E	<u>IIX</u>	24		/ // // // // // // // // // // // // /			/			/			
24 25	New Roa		105662.2 105640.7	FP2 FP2			XX (24		mm 1x duct cycle plus spare				/		/				4
26	New Roa	ad 495261.8	105628.2	FP2			As I	N III		edge			/							
27	New Roa			FP3 FP3			1x duct	13M	110 Des	FP3		duct	/		/					<u> </u>
29	New Roa			FP3 FP3			plus spare		LA CAR			s spare	/		/	/				
30	New Roa			FP3	/			THU		25 25	1-7-1/		1.		/	/		/		\checkmark
31 32	New Roa			FP3 FP3				AF 1				~~				\bigwedge				
33	New Roa	ad 495283.8	105392.4	FP3			500mm		$\left[\right] \times \left[\right]$		500m	าท		7 //]					7
34 35	New Roa			FP3 FP3			<pre>{ from cycle { track edge {</pre>				track e	dge	L		-/ /					
36	New Roa	ad 495247.7	105287.7	FP3	X				TH -	The second secon				~ / /					/ /	
37 38	New Roa		105257.7 105219.8	FP3 FP3					HH	and the second sec	*IMI A R			12		<u> </u>	/			
39	New Roa		105219.8	FP3			Duct chamber ar units close BT, LV	and A	$\uparrow \setminus \downarrow$	3B			2			′ →	/			1
							low gas pressure r	\ \		В		PHV /		/	/ /	_ /		/		/
								~~~_ \ ~~~ \	ATT	25	26	26			/		2	7/ /		~ / .
S	AFETY HE	ALTH AND ENVI	IRONMENTA	L (SHE) INFORMATION			50	0mm 1 cycle	250			Ø H	) /		/	/		//		
		Note the follo	wing significa	ant risks:			trac	k edge	THE A					AN AN		1				
		ligh Voltage main								ATAX	500mm	<b>NH</b>				/<		5		$/ \aleph$
shown).	All measure	s are to be taken		d by the symbols	Lighting Clas	sses (BS5489-1:	2013) M4			/   / '// \/	from cycle track edge			27	SAD.	/	~ /	2	$\sim$	/ /
	n works co		to drawing a	AH	Fontwell Avenu		C3				500mm from cy track edge.	. ,	- M	L'A	ARAHAM ROAD		$\sim$ /		/~/	
A29-CAF	-VUT-00-D	ent include (refer t R-C-0077 to 008 - Eastern and We	1 for further d		New I		M4			duct close to BT	bers (Requires new D			AH					/ /	' / /
	Avenue and	d Northern and Wo			New Road F New Road		C3 P4		plus s	CIOSE IO D I	main supply servic	🧹 🤇 500m	nm from c	· / \						5 /20/ 2
Water ma	ains (Portsn	nouth Water) - Ea venue and runnin			Barnhar	m Road	M3						ack edge ires new	K	$\setminus$	28				
Barnham			a constany al	······································	Barnham Road	d Roundabout	C2						oply servi	<pre>{</pre>						/ /
	a\ma0222	20\[			Projects\201760	20 Maat Sug	sex\2 Design\SSE28176	<u>9 1200 00</u>	1 009 M dwg											

C:\Users\mg23330\Enerveo\Lighting Design Hub - Documents\02 Projects\281768 - A29, West Sussex\2_Design\SSE281768-1300-001-008-M.dwg



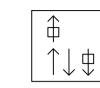
Notes	<b>D</b>							
	o not scale from drawing if not pr I street lighting equipment and w			nce with				
	rrent West Sussex County Cour omoted Highway Schemes in W		ighting of Dev	elop				
3. Co co	ontractor to confirm position of signature of the works. For	tatutory undertakers		visit				
4. Du th	ww.linesearchbeforeudig.co.uk uring works all traffic manageme e Traffics Signs Manual.			er 8 of				
6. Ea	ghting columns to be fed by DNC ach luminaire to be fitted with Ma ocket (NEMA).			S6000				
7. Co	olumn maintenance numbers ha							
	erefore numbering on-site should olumns to be numbered using ac			use.				
	etters and numerals shall be 50m ne Mayflower Complete Lighting							
ins	stalled to control nodes and link	central managemen	it system.					
sp	ghting columns are to be plantec becification referred to as "Road	Lighting column ere	ction details".					
	I apparatus are to be new at the levant manufacturer's guarantee		and be suppor	ted by				
12. Al ar	I apparatus shall be sited so as t nd practical, nuisance, danger ar nd users of the highway.	to minimise, in so fa						
13. Al BS	I illuminated apparatus must be S7671 at the time of adoption.							
	I installations must be installed in liage on the site does not interfe			er				
	l electrical cables to be XLPE/S\ 0mm wide yellow heavy gauge l			Cable"				
pla	aced over private electricity duct	s / cables						
	ey have been cross referenced a ashes). Final locations shall be c		ay disciplines t	to avoid				
18. Di	ucting to be 100mm dia PVC duo	cts coloured orange.						
19. Di	bles per duct is 3. One spare du ucting below footways to be 450	mm below finished l	evel.	rossing.				
	ucting below carriageways to be very duct to be installed with draw		ned level.					
22.Re	efer to drawing WSCC-SD1-050	0-042 for details reg						
рс	backfill installation. Standard installation type should be used where possible however appropriate installation type is subject to on site							
	onditions. his detailed design has been pre	pared in accordance	e with the					
	EA-HEMSA guidance note - CDM 0/04/15 Procedure 3: information							
00	nother designer or the principal d							
ar								
ar lig	hting scheme design and include eir hazard elimination and mana	es the hazards iden						
ar lig	hting scheme design and include	es the hazards iden						
ar lig	hting scheme design and include	es the hazards iden						
ar lig	hting scheme design and include	es the hazards iden gement list.						
ar lig th	hting scheme design and include eir hazard elimination and mana	es the hazards iden gement list. S	tified by others	s on				
ar lig th	hting scheme design and include eir hazard elimination and mana	es the hazards iden gement list.	tified by others	s on				
ar lig th	AMENDED COLUMN LOCATIONS	es the hazards iden gement list. S MMENTS	10/02/22 05/11/21	s on MWG MWG				
ar lig th H G	AMENDED COLUMN LOCATIONS	es the hazards iden gement list. S MMENTS MMENTS	10/02/22 05/11/21 29/04/21	s on MWG MWG				
ar ligh th H G F E	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO	es the hazards iden gement list. S MMENTS MMENTS MMENTS	tified by others 10/02/22 05/11/21 29/04/21 19/04/21	s on MWG MWG MWG				
H G F D	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO	es the hazards iden gement list. S MMENTS MMENTS MMENTS	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21	s on MWG MWG MWG MWG				
H G F D	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC	es the hazards iden gement list. 5 5 MMENTS MMENTS MMENTS DN	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC	es the hazards iden gement list. 5 5 MMENTS MMENTS MMENTS DN	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC	es the hazards iden gement list. 5 5 MMENTS MMENTS MMENTS DN	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21	s on MWG MWG MWG BY				
H G F D	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO	es the hazards iden gement list. 5 5 MMENTS MMENTS MMENTS DN	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC SSE Enterpris	es the hazards iden gement list.	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC SSE Enterprise - Lighting, 1st	es the hazards iden gement list.	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIONS SSE Enterprise - Lighting, 1st Portsmou	es the hazards iden gement list.	tified by others 10/02/22 05/11/21 29/04/21 19/04/21 04/03/21 DATE	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC DESCRIPTIC SSE Enterprise - Lighting, 1st Portsmou LE STREET	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 04/03/21 <b>DATE</b>	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIC DESCRIPTIC SSE Enterprise - Lighting, 1st Portsmou LE STREET	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 04/03/21 <b>DATE</b>	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTION DESCRIPTION SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 04/03/21 <b>DATE</b>	s on MWG MWG MWG BY				
H G F D REV	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTION DESCRIPTION SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 04/03/21 <b>DATE</b>	s on MWG MWG MWG BY				
	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIONS SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT SHEET	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 04/03/21 <b>DATE</b>	s on MWG MWG MWG BY				
	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTION SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT SHEET	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 DATE hting a, Walton Roa	s on MWG MWG MWG BY				
	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTION SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT SHEET	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 DATE hting a, Walton Roa	s on MWG MWG MWG BY				
	AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED COLUMN LOCATIONS AMENDED FOLLOWING JCE CO AMENDED FOLLOWING JCE CO DESCRIPTIONS SSE Enterprise - Lighting, 1st Portsmou LE STREET LAYOUT SHEET DJECT A29 REA WEST	es the hazards iden gement list.	10/02/22 05/11/21 29/04/21 04/03/21 DATE hting a, Walton Roa	s on MWG MWG MWG MWG BY				

- Proposed illuminated sign consisting of galvanised steel wide base post. Signs to be lit by Simmonsigns LUA LED sign light with low voltage HF electronic ballast. Sign light controlled by Mayflower Internal node. Proposed illuminated centre island post consisting of 4.7
- metre mid hinged galvanised steel post, 2 no. internally illuminated Simmonsigns Invinca Keep Left signs and Simmonsigns white LED beacon. Equipment to be supplied by 24v supply.
- Street lighting column to be retained.
- X Street lighting column to be removed.
- Proposed feeder pillar with 230v single phase supply installed to WSCC specification.
- Indicative cable route.
- 450mm x 450mm polyproylene preformed twin wall modular duct access chamber similar to NAL Limited STAKKAbox Modula duct chamber. Chamber, concrete infill and cover are to be rated to B125. Depth of chamber to allow for a 600mm deep duct run (see note 20).

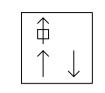
Н	AMENDED COLUMN LOCATIONS	10/02/22	MWG
G	AMENDED COLUMN LOCATIONS	05/11/21	MWG
F	AMENDED FOLLOWING JCE COMMENTS	29/04/21	MWG
Е	AMENDED FOLLOWING JCE COMMENTS	19/04/21	MWG
D	AMENDED FOLLOWING JCE COMMENTS	04/03/21	MWG
REV	DESCRIPTION	DATE	BY

-	LIGNMENT SUSSEX	
SCALE	DATE 1	5/09/20
1:500 @ A1	DRAWN	MWG
	CHECKED	RHJ
PAPER SIZE A1	APPROVED	SAB
DRAWING NUMBER		REVISION
SSE281768-	1300-006	H

### CABLE TERMINATION TYPE T4

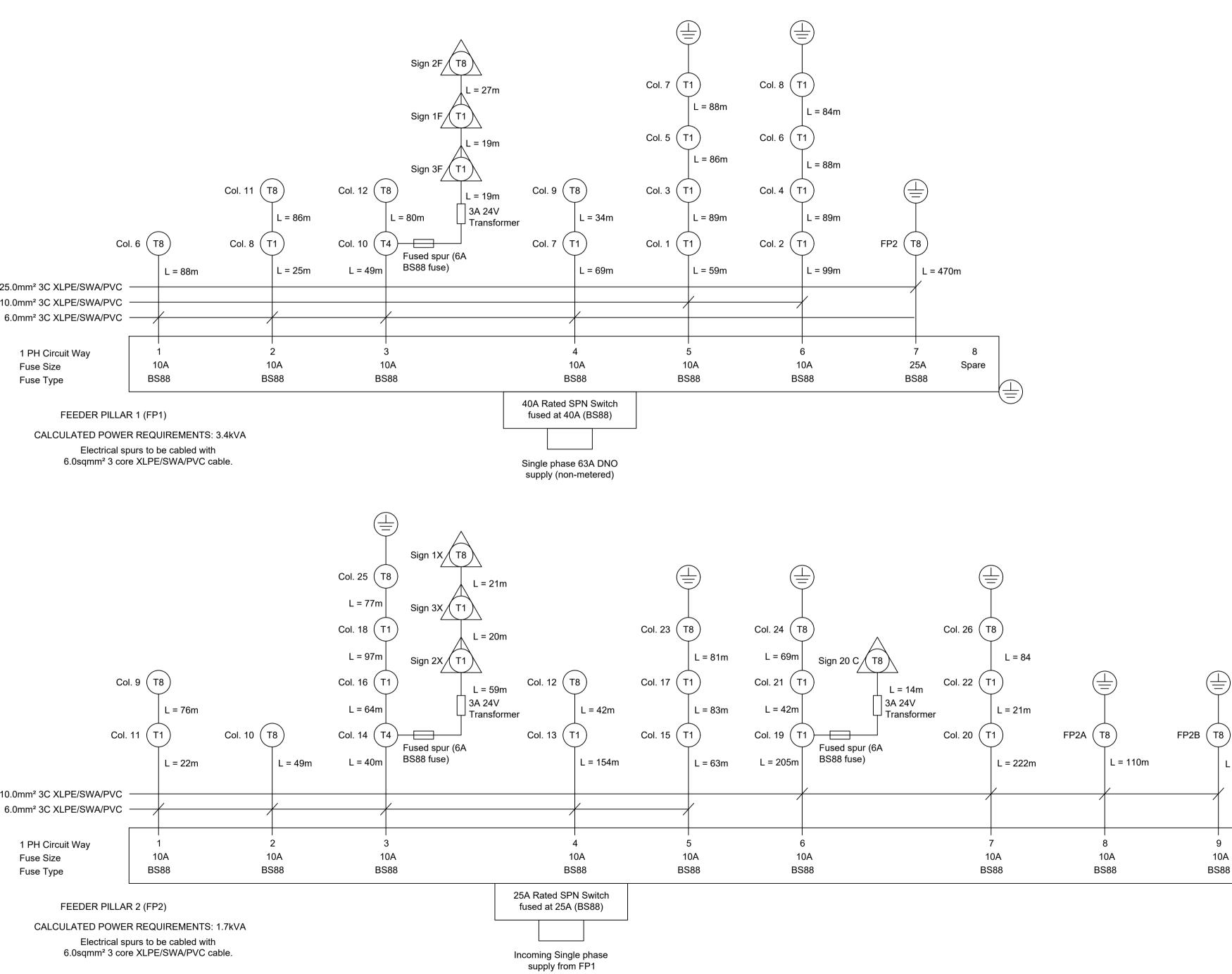


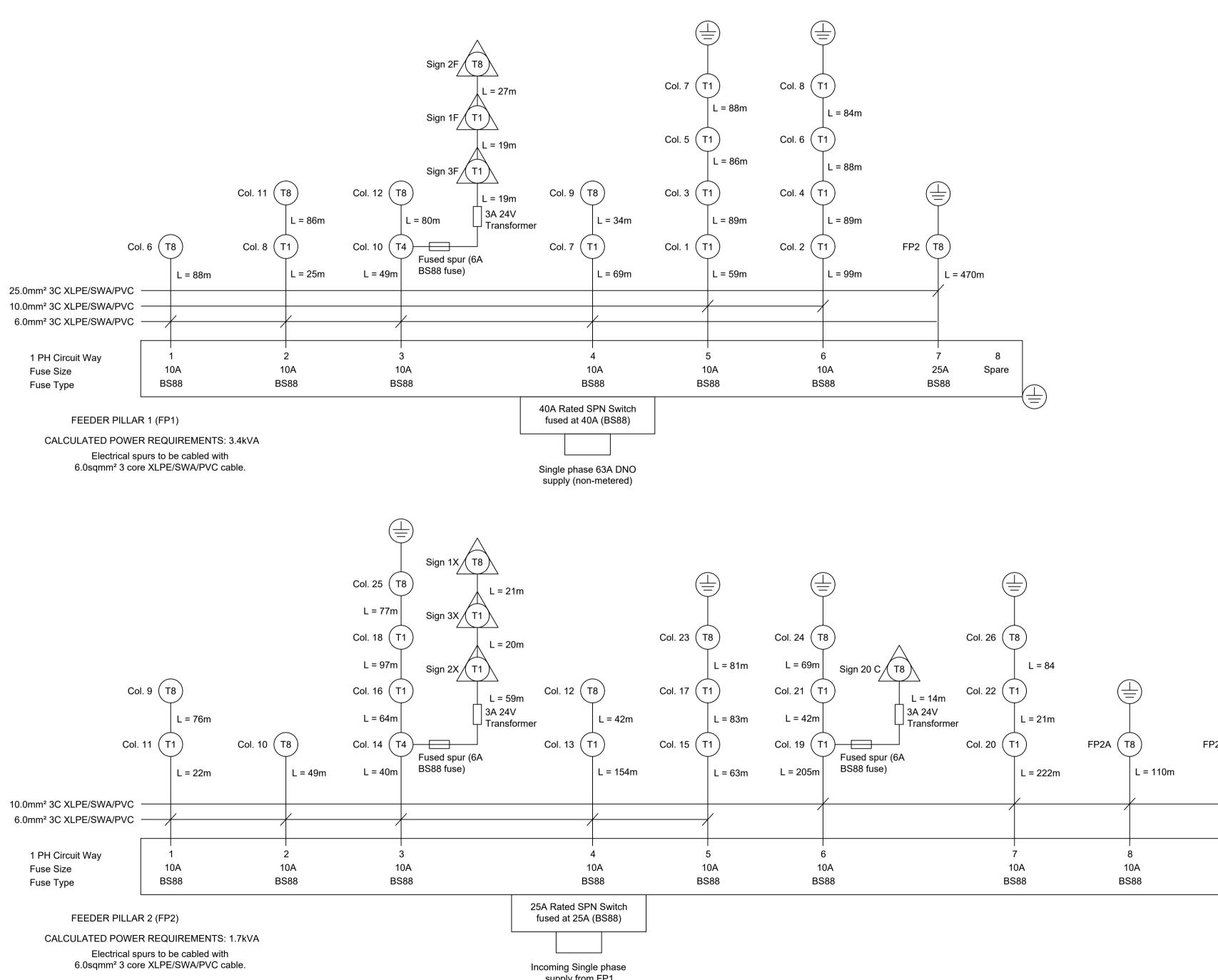
### CABLE TERMINATION TYPE T1



CABLE TERMINATION <u>TYPE T8</u>







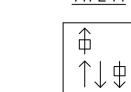
	Key			
	NC16 T1 Illuminated columr	ı		
	Termination ty	pe		
		ber		
	$\triangle$			
	NC16 T1 Illuminated sign/bo	ollard		
	Termination ty	pe		
	[\] Unit reference number			
	(≟) Earth electrode			
	$\bigcirc$			
	Notes			
	1. Do not scale from drawing if no			
	<ol><li>All electrical equipment and wo with current West Sussex Cour</li></ol>	nty Council's speci	fication 'Ligh	
	Develop Promoted Highway Sc 3. Contractor to confirm position c			efore
	commencement of the works. F	or statutory under		
	visit www.linesearchbeforeudig 4. During works all traffic manage	ment to be in acco	ordance with	
	Chapter 8 of the Traffics Signs 5. All apparatus are to be new at t		tion and be	
	supported by relevant manufac	turer's guarantees		alianco
	<ol><li>All illuminated apparatus must with BS7671 at the time of ado</li></ol>	ption.		
	<ol> <li>All electrical cables to be 3 core 100mm dia duct.</li> </ol>	e XLPE/SWA/PVC	and laid in	orange
	8. Road crossing to have one spa			
	<ol> <li>150mm wide yellow heavy gauge Cable" placed over private electronic placed over private electronic placed over private electronic placed over placed</li></ol>	tricity ducts / cable	es	ignting
	10.Ducting below footways to be 4 11.Ducting below carriageways to			
	12. Every duct to be installed with o	draw cords.		
	13. This detailed design has been HEA-HEMSA guidance note - 0	CDM2015 regulation	ons, issue 1.	1,
	dated 09/04/15 Procedure 3: in client or another designer or the			
	basis of this lighting scheme de	sign and includes	the hazards	
	identified by others on their haz	ard elimination an	a managem	ent list.
	C ADDED CABLE LENGTHS		08/02/21	MWG
8		MMENTS		
	B AMENDED FOLLOWING JCE CO		26/01/21	MWG
L = 319m	A ORIGINAL ISSUE		15/09/20	MWG
	REV DESCRIPTIO	N	DATE	BY
9 10	<b>SSE</b> Enterpris	Lia	htip	
0A Spare	Enterpris	e   LIY	hting	9
588				
	SSE Enterprise - Lighting, 1st	Floor Solent Park	Walton Ro	bed
	Portsmou	ith, PO6 1UJ		
	STREET	LIGHTING		
		DRAWING		
	SHEE	T 7 OF 8		
	PROJECT			
	A29 REA	LIGNMENT		
	WEST	SUSSEX		
	SCALE	DATE	15/09	/20
	1:500 @ A1	DRAWN	MW	G
		CHECKED	RH	J
	PAPER SIZE A1	APPROVED	SA	
		L		VISION
	SSE281768-	1200 00		C
	002201700-		//	

 $\left( \begin{array}{c} \\ \\ \\ \end{array} \right)$ 

10A

BS88

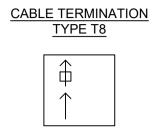
### CABLE TERMINATION TYPE T4

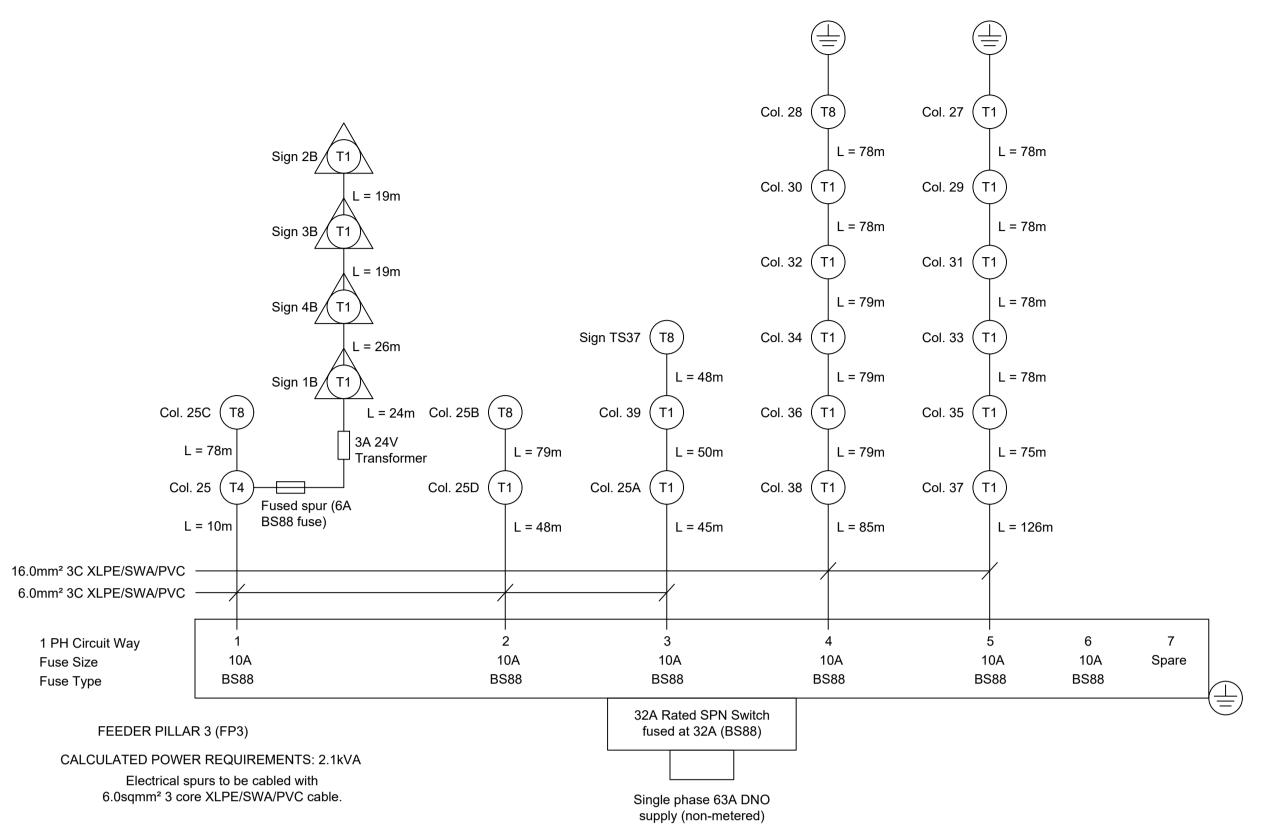


 $\uparrow$  |

CABLE TERMINATION <u>TYPE T1</u>

₽





Кеу				
NC16 T1 Illuminated column	I			
Termination ty	ре			
	er			
NC16 T1 Illuminated sign/bo	llord			
NC16 T1 Illuminated sign/bo				
Unit reference number				
(≟) Earth electrode				
Notes				
<ol> <li>Do not scale from drawing if no</li> <li>All electrical equipment and wo</li> </ol>				nce
with current West Sussex Cour Develop Promoted Highway Sc	ity Council's specif	fication '		
<ol> <li>Contractor to confirm position o commencement of the works. F</li> </ol>	f statutory underta	kers pla		
visit www.linesearchbeforeudig	.co.uk			aton
4. During works all traffic manager Chapter 8 of the Traffics Signs	Manual.			
<ol> <li>All apparatus are to be new at t supported by relevant manufac</li> </ol>	turer's guarantees			
<ol><li>All illuminated apparatus must with BS7671 at the time of ado</li></ol>	otion.		-	
<ol> <li>All electrical cables to be 3 core 100mm dia duct.</li> </ol>	e XLPE/SWA/PVC	and laid	d in o	range
<ol> <li>Road crossing to have one spa</li> <li>150mm wide yellow heavy gauge</li> </ol>		ed "Stre	et Lic	ahtina
Cable" placed over private elec 10.Ducting below footways to be 4	tricity ducts / cable	s		,g
11. Ducting below carriageways to	be 600mm below f			· ·
12. Every duct to be installed with of 13. This detailed design has been p	prepared in accord			
HEA-HEMSA guidance note - C dated 09/04/15 Procedure 3: in	formation has been	n suppli	ed by	the
client or another designer or the basis of this lighting scheme de	sign and includes	the haz	ards	
identified by others on their haz	ard elimination and	d manag	geme	nt list.
ADDED CABLE LENGTHS		0.5		
C ADDED CABLE LENGTHS		08/02	/21	MWG
B AMENDED FOLLOWING JCE CO	MMENTS	26/01	/21	MWG
A ORIGINAL ISSUE		15/09	/20	MWG
REV DESCRIPTIC	)N	DAT	Ē	BY
sse	1 1 1 1	la Li		
Enterpris	_ ∣ Lig	nti	ng	)
		\\/_!'		d
SSE Enterprise - Lighting, 1st Portsmou	Floor, Solent Park th, PO6 1UJ	, vvaltor	1 K08	iu,
TITLE	LIGHTING			
	DRAWING			
SHEE	T 8 OF 8			
PROJECT				
A29 REA				
	SUSSEX			
SCALE	DATE	15	6/09/	20
1:500 @ A1	DRAWN	Ν	NWC	3
-	CHECKED		RHJ	
PAPER SIZE A1	APPROVED		SAB	,
DRAWING NUMBER			REV	ISION
SSE281768-	1300-00	8		C

# **Appendix C**

### TRAFFIC SIGNS SCHEDULE

)

#### A29 Re-alignment Scheme Job Number: CS/099505

Date 09/10/2020

S3-P03

**Jackson** 

## CAPITA

 Document No. A29-CAP-HTS-00-SH-C-069
 Rev

 Prepared By
 D Hubbard
 Checked by
 G Lansell

 Notes:
 Checked by
 D Lansell
 Checked by
 D Lansell

1. All posts over 80mm Dia to be passively safe equivalent

Sign Ref:	TSRGD Diagram Ref:	Sign Width (mm)	Sign Height (mm)	Sign Area (sq.m)	Text 'x' Height (mm)	Sign shape	No. Of Posts	Post Dia (mm) (Or equivalent)	Mounting Height (mm)	Foundations Dimensions (W x L x D)(mm) (See note 1)	Illuminated	Power Supply	Designer Comments
Direction Signs													
Drawing A29-CAP-HTS-00-D	DR-C-0086			1								1 1	
TS01	ADS	680	1260	0.86	75	Rectangle	1	76.1 x 4.0 CHS	2400	1300 x 1300 x 1000	No	No	
TS02	ADS	1325	1540	1.73	75	Rectangle	2	76.1 x 6.3 CHS	2400	1800 x 1700 x 1000	No	No	
TS03	Flag type direction sign	670	290	0.18	62.5	Flag	1	76.1 x 3.2 CHS	2400	1250 x 1250 x 1000	No	No	
TS04	Flag type direction sign	855	255	0.21	62.5	Flag	1	76.1 x 3.2 CHS	2400	650 x 700 x 1000	No	No	
TS05	Flag type direction sign	1240	280	0.42	62.5	Flag	1	76.1 x 6.3 CHS	2400	900 x 900 x 1000	No	No	
TS06	ADS	1430	1295	1.62	75	Rectangle	1	88.9 x 6.3 CHS	2400	1700 x 1650x 1000	No	No	
Drawing A29-CAP-HTS-00-D	DR-C-0087								•				
TS15	ADS	805	1315	0.88	75	Rectangle	1	76.1 x 6.3 CHS	2400	700 x 650 x 1000	No	No	
TS16	Flag type direction sign	925	430	0.94	62.5	Flag	2	76.1 x 6.3 CHS	2400	1200 x 800 x 1000	No	No	
TS17	Flag type direction sign	1025	430	0.21	62.5	Flag	1	76.1 x 6.3 CHS	2400	1000 x 900 x 1000	No	No	
TS18	ADS	930	1830	1.55	75	Rectangle	1	88.9 x 10.0 CHS	2400	1500 x 1500 x 1000	No	No	
Drawing A29-CAP-HTS-00-E	DR-C-0089	-	-						-		-		
TS22	ADS	1155	975	1.11	75	Rectangle	1	76.1 x 5.0 CHS	2400	1400 x 1400 x 1000	No	No	
TS23	Flag type direction sign	1395	730	0.14	62.5	Flag	1	76.1 x 2.9 CHS	2400	1450 x 1100 x 1000	No	No	
TS24	Flag type direction sign	925	430	0.94	62.5	Flag	1	76.1 x 6.3 CHS	2400	1200 x 800 x 1000	No	No	
TS25	ADS	1650	1500	2.5	75	Rectangle	2	88.9 x 4.0 CHS	2400	1900 x 1800 x 1000	No	No	
TS26	Flag type direction sign	1025	430	0.21	62.5	Flag	1	76.1 x 6.3 CHS	2400	1000 x 900 x 1000	No	No	
TS27	ADS	1525	1530	1.05	75	Rectangle	1	76.1 x 6.3 CHS	2400	1950 x 1750 x 1000	No	No	

A29 Re-alignment Scheme Job Number: CS/099505	Regulatory Signs Schedule	Date	09/10/2020

S3-P03

Rev



### CAPITA

Document No. A29-CAP-HTS-00-SH-C-069 Prepared By D Hubbard Checked by G Lansell Notes:

1. All posts over 80mm Dia to be passively safe equivalent

Sign Ref:	TSRGD Diagram Ref:	Re use existing sign	Sign Width (mm)	Sign Height (mm)	Sign Area (sq.m)	Text 'x' Height (mm)	Sign shape	No. Of Posts	Post Dia (mm) (Or equivalent)	Mounting Height (mm)	Foundations Dimensions (W x L x D)(mm) (See note 1)	Illuminated	Power Supply	Designer Comments
Regulatory Signs														
Drawing A29-CAP-HTS-00-	DR-C-0086													
TS07	956 Shared footway/ cycleway	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	2400	600 x 600 x 600	No	No	Mounted back to back with TS08
TS08	966 Cyclists Dismount	Ν	375	150	0.06	40	Rectangle	Same post as TS07	-	2400	-	No	No	Mounted back to back with TS07
TS09	670 30mph repeater	Ν	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No	Mounted back to back with TS48
TS10 A, B	956 Shared footway/ cycleway	Ν	270	270	-	-	Circle	In a bollard	-	-	Manufactors requirements	No	No	Back to back on bollard
TS11	956 Shared footway/ cycleway	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	2400	600 x 600 x 600	No	No	Mounted back to back with TS12
TS12	966 Cyclist rejoin carriageway	Ν	375	150	0.056	40	Rectangle	Same post as TS11	-	2400	-	No	No	Mounted back to back with TS11
TS13 A, B	Bollard with 610 sign aspect	Ν	300	-	-	-	-	-	-	-	Accordance with manufacturer's instructions	No		Traffic signs as per Traffic island Type E2 WSCC Standard Detail WSCC-SD1-1100-075 Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
TS13 C	2 no. 610 mounted back to back	N	600	-	-	-	Circle	1	76.1 x 3.2 CHS	2100	600 x 600 x 600	No	No	Traffic signs as per Traffic island Type E2 WSCC Standard Detail WSCC-SD1-1100-076
TS13 D, E	Bollard with 610 sign aspect	N	300	-	-	-	-	-	-	-	Accordance with manufacturer's instructions	No	No	Traffic signs as per Traffic island Type E2 WSCC Standard Detail WSCC-SD1-1100-075 Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
TS13 F	2 no. Diag 610 signs mounted back to back	N	600	-	-	-	Circle	1	76.1 x 3.2 CHS	2100	600 x 600 x 600	No		Traffic signs as per Traffic island Type E2 WSCC Standard Detail WSCC-SD1-1100-076
TS 44 A, B, C	3No. Chervons 515	N	1800	400	0.72	-	Rectangle	2	76.1 x 3.2 CHS	1000	600 x 600 x 600 each	No	No	
TS 44 D, E, F	606	Ν	600	-	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	Yes	Yes	
TS-45, 46, 47	Bollard with 610 sign aspect	N	300	-	-	-	Circle	Bollards		-	Accordance with manufacturer's instructions	No	No	Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
TS48	670 30mph repeater	Ν	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No	Mounted back to back with TS09

A29 Re-alignment Scheme	Regulatory Signs Schedule	Date	09/10/2020
Job Number: CS/099505			

S3-P03

Rev



### **CAPITA**

Prepared By Checked by G Lansell D Hubbard Notes:

1. All posts over 80mm Dia to be passively safe equivalent

Document No. A29-CAP-HTS-00-SH-C-069

Sign Ref:	TSRGD Diagram Ref:	Re use existing sign	Sign Width (mm)	Sign Height (mm)	Sign Area (sq.m)	Text 'x' Height (mm)	Sign shape	No. Of Posts	Post Dia (mm) (Or equivalent)	Mounting Height (mm)	Foundations Dimensions (W x L x D)(mm) (See note 1)	Illuminated	Power S
Regulatory Signs													
Prawing A29-CAP-HTS-00-DI	R-C-0087		<b> </b>					<u> </u>					-
TS34, 35	Bollard with 610 sign aspect	N	300	-	-	-	Circle	Bollards	-	-	Accordance with manufacturer's instructions	No	No
TS 36 A, B, C	3No. Chervons 515	N	1800	400	0.72	-	Rectangle	2	76.1 x 3.2 CHS	1000	600 x 600 x 600 each	No	No
TS 36 D, E, F	606	N	600	-	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	Yes	Yes
TS43	Bollard with 610 sign aspect	N	300	-	-	-	Circle	Bollard	-	-	Accordance with manufacturer's instructions	No	No
TS49	670 30mph repeater	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS50	670 30mph repeater	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS56	956	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS57	956	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS58	956	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS14 A, B	956 Shared footway/ cycleway	N	270	270	-	-	Circle	In a bollard	-	-	Manufactors requirements	No	Nc
rawing A29-CAP-HTS-00-DI	R-C-0088		1										-
TS19 A, B	956 Shared footway/ cycleway	Ν	270	270	-	-	Circle	In a bollard	-	-	Manufactors requirements	No	No
TS20 A, B	Bollard with 610 sign aspect	N	300	-	-	-	-	-	-	-	Accordance with manufacturer's instructions	No	No
TS20 C	2 no. 610 mounted back to back	N	600	-	-	-	Circle	1	76.1 x 3.2 CHS	2100	600 x 600 x 600	Yes	Yes
TS51	670 30mph repeater	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS52	670 30mph repeater	N	300	300	-	-	Circle	Sme post as TS51	-	1500	-	No	No
TS53	670 30mph repeater	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS54	670 30mph repeater	N	300	300	-	-	Circle	Same post as TS53	-	1500	-	No	No
TS59	956	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS60	965 End of Route	N	395	430	0.17	40	Square	Same post as TS59	-	1500	-	No	No
TS61 A, B	956 Shared footway/ cycleway	N	270	270	-	-	Circle	In a bollard	-	-	Manufactors requirements	No	No

ower Supply	Designer Comments
No	Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
No	
Yes	
No	Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
No	Mounted back to back with TS50
No	Mounted back to back with TS49
No	
No	
No	
No	Back to back on bollard
No	Back to back on bollard
No	Traffic signs as per Traffic island Type B8 WSCC Standard Detail WSCC-SD1-1100-072 Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
Yes	Traffic signs as per Traffic island Type B8 WSCC Standard Detail WSCC-SD1-1100-072
No	Internally illuminated Mounted back to back with TS52
No	Mounted back to back with TS51
No	Mounted back to back with TS54
No	Mounted back to back with TS53
No	Mounted back to back with TS60
No	Mounted back to back with TS59
No	Mounted back to back on bollard

A29 Re-alignment Scheme Job Number: CS/099505	Regulatory Signs Schedule	Date	09/10/2020

S3-P03

Rev



### CAPITA

Prepared By D Hubbard Checked by G Lansell Notes:

1. All posts over 80mm Dia to be passively safe equivalent

Document No. A29-CAP-HTS-00-SH-C-069

Sign Ref:	TSRGD Diagram Ref:	Re use existing sign		Sign Height (mm)	Sign Area (sq.m)	Text 'x' Height (mm)	Sign shape	No. Of Posts	Post Dia (mm) (Or equivalent)	Mounting Height (mm)	Foundations Dimensions (W x L x D)(mm) (See note 1)	Illuminated	Power S
Regulatory Signs													
Drawing A29-CAP-HTS-00-DR	I-C-0089					<u> </u>							
TS 21	670 30mph repeater	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	N
TS22	956	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	No
TS 28 A, B, C, D	3No. Chervons 515	N	1800	400	0.72	-	Rectangle	2	76.1 x 3.2 CHS	1000	600 x 600 x 600 each	No	No
TS 28 E, F, G, H	606	N	600	-	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	Yes	Ye
TS29	956 Shared footway/ cycleway	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	2400	600 x 600 x 600	No	No
TS30	965 End of Route	N	395	430	0.17	40	Rectangle	Same post as TS29	-	2400	-	No	N
TS31	955	N	270	270	-	-	Circle	In a bollard	-	-	Manufactors requirements	No	No
TS 38, 39, 40, 41	Bollard with 610 sign aspect	N	300	-	-	-	Circle	Bollards	-	-	Accordance with manufacturer's instructions	No	No
TS 42 Barnham east approach	818.4 'Low bridge'	N	640	930	0.6	67.5	Rectangle	1	76.1 x 6.3 CHS	2400	2100 x 2100 x 600	Yes	Ye
TS32	955 Cycleway	N	300	300	-	-	Circle	1	76.1 x 3.2 CHS	2400	600 x 600 x 600	No	N
TS55	670 30mph repeater	N	300	300	-	-	Circle	Same post as TS21	-	1500	-	No	N
TS62	956	Ν	300	300	-	-	Circle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	N
TS63	966	Ν	375	150	0.056	40	Rectangle	Same post as TS62	-	1500	-	No	No
TS64	966	Ν	375	150	0.056	40	Rectangle	1	76.1 x 3.2 CHS	1500	600 x 600 x 600	No	N

ower Supply	Designer Comments
No	Mounted back to back with TS 55
No	
No	
Yes	
No	Mounted back to back with TS30
No	Mounted back to back with TS29
No	
No	Sign post solutions SPS 3Sixty or Simmonsigns 'Weebol Flex' (or similar approved by WSCC) reboundable non-illuminated reflective bolaard with 300 diamter diagram 610 sign aspect
Yes	
No	
No	Mounted back to back with TS21
No	Mounted back to back with TS63
No	Mounted back to back with TS62
No	

62-64 Hills Road Cambridge CB2 1LA

wsp.com