

# LiAS Design Notes

This preliminary design is produced by the Lighting Application Specialist (LiAS) team of Signify UK based on information supplied by the Customer for the purpose of identifying suitable products and costing the proposal. This design cannot be used for Construction, as this design does not purport to eliminate health and safety risks as a CDM Regulation risk assessment has not been undertaken.

Depending on the level of information received, a number of assumptions may have been applied in order to create an indicative lighting proposal and costing model, according to lighting industry guidelines and incorporating industry best practice methods. These assumptions are documented below and will require confirmation by the Principal Designer (which is not Signify UK) during the detailed design phase.

## Project Specific Design Comments:

- Where 'Lighting Classes' have not been provided/specified, the calculations have been produced using lighting class P<sub>3</sub><sup>2</sup> for the estate roads and C4 for the Main Spine Road.
- Where column heights have not been provided/specified, these have been assumed to be 6m.
- Preliminary Design proposals produced by the Signify LiAS Team are not to be used for installation purposes. It is the responsibility of the Principal Designer and/or Principal Contractor to ensure all Installation and Maintenance can be done in a safe manner, carried out by competent persons, based on their agreed Risk Assessments and Method Statements.
- The Luminaire Maintenance Factors have been based on 6-year cleaning intervals within an E3/E4 Environmental Zone and it is assumed that lamp/luminaire failures will be replaced on a 'spot replacement'.
- Energy consumptions have been based on the luminaire/s having Constant Light Output (CLO) enabled and the quoted wattage/s are the average over 100,000 hours (without dimming).
- The design calculations produced by Signify do not account for the effect obstructions, such as trees, will cause.
- Signify has not been provided with utility plans showing Buried, Above Ground or Overhead utilities. Therefore, all column/luminaire locations are indicative and are subject to review/verification by the Principal Designer.
- Unless stated otherwise, Signify has not visited site. Therefore, all column/luminaire locations are indicative and are subject to an onsite verification arranged/performed by the Principal Designer.
- Signify has not produced any Private Cable Network electrical calculations or reviewed the DNO network to confirm power supplies to the proposed lighting.
- Signify has not performed any asset condition testing and therefore assumes that any existing lighting columns/wall mounted brackets are structurally capable of supporting the weight & windage of the proposed luminaire/s. This must be verified by the Principal Designer before installation works commence.
- Unless stated otherwise, Signify is not supplying the new lighting columns (including brackets etc) and therefore it is the responsibility of the Principal Designers to confirm that all proposed equipment is suitable for the intended locations (e.g. raise & lower, ground condition, foundation type, saline environment, etc).
- Unless stated otherwise, luminaires will be supplied in their standard colour.

# Luminaire Schedule

<b>Grid 1</b> Results - Horizontal Illuminance (lux) Eav= 8.76 Emin= 1.54 Emax= 21.05 Emin/Emax= 0.07 Emin/Eav= 0.18 Emax/Eav= 2.40	<b>Grid 6</b> Results - Horizontal Illuminance (lux) Eav= 11.21 Emin= 4.48 Emax= 20.07 Emin/Emax= 0.22 Emin/Eav= 0.40 Emax/Eav= 1.79
<b>Grid 2</b> Results - Horizontal Illuminance (lux) Eav= 8.30 Emin= 1.55 Emax= 18.28 Emin/Emax= 0.08 Emin/Eav= 0.19 Emax/Eav= 2.20	<b>Grid 7</b> Results - Horizontal Illuminance (lux) Eav= 10.32 Emin= 4.19 Emax= 24.61 Emin/Emax= 0.17 Emin/Eav= 0.41 Emax/Eav= 2.38
<b>Grid 3</b> Results - Horizontal Illuminance (lux) Eav= 10.18 Emin= 2.04 Emax= 30.34 Emin/Emax= 0.07 Emin/Eav= 0.20 Emax/Eav= 2.98	<b>Grid 8</b> Results - Horizontal Illuminance (lux) Eav= 10.37 Emin= 4.29 Emax= 20.02 Emin/Emax= 0.21 Emin/Eav= 0.41 Emax/Eav= 1.93
<b>Grid 4</b> Results - Horizontal Illuminance (lux) Eav= 7.88 Emin= 2.44 Emax= 15.80 Emin/Emax= 0.15 Emin/Eav= 0.31 Emax/Eav= 2.00	<b>Grid 9</b> Results - Horizontal Illuminance (lux) Eav= 11.39 Emin= 5.29 Emax= 21.70 Emin/Emax= 0.24 Emin/Eav= 0.46 Emax/Eav= 1.90
<b>Grid 5</b> Results - Horizontal Illuminance (lux) Eav= 8.40 Emin= 2.27 Emax= 22.76 Emin/Emax= 0.10 Emin/Eav= 0.27 Emax/Eav= 2.71	
<b>Luminaire Data</b> Luminaire A BGP291 DRXN1 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire B BGP291 DX51 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire C BGP291 DW50 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire D BGP292 DW50 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire E BGP292 DX50 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire F BGP292 DX51 Lamp LED-HB 5.2S 730 MF 0.76 Luminaire G BDP100 PCC DS LED50/- NO Lamp LED50/830/- MF 0.76	

- Key
- Luminaire A Column
  - Luminaire B Column
  - Luminaire C Column
  - Luminaire D Column
  - Luminaire E Column
  - Luminaire F Column
  - Luminaire G Column
  - Beam Aiming Target
  - Photometric Centre

All Dimensions in metres



**Lighting Proposal Terms and Conditions of Use**  
 These terms apply to the use of this preliminary proposal produced by Signify UK. This "Proposal" is understood to mean this document, a CAD drawing, lighting calculations, written documents, verbal conversations or any medium used to demonstrate or communicate the proposed lighting scheme using products from Signify's brands. A "Customer" is the person or organisation for whom the Proposal is intended. The "CDM Regulations" means The Construction, Design and Management Regulations 2015, the Safety, Health & Welfare at Work Act 2005, The Construction (Design & Management) Regulations (Northern Ireland) 2015.  
 This Proposal is for guidance only and cannot be relied upon for purposes of installation or Health and Safety.  
 The supply and installation of this lighting scheme are subject to a contract being agreed between Customer and Signify.

**PROPOSAL**  
(NOT FOR CONSTRUCTION)

Rev	DSR no.	Comment	Date	LIAS	KAM
0	D-584671	INITIAL PROPOSAL	20.08.24	CP	SC

Project Number	Project Name
0401022094	OLDCOURT ROAD, BALLYCULLEN
Scale & Sheet Size	Drawing Name
NTS @ A3	LIAS DESIGN NOTES & LUMINAIRE SCHEDULE
Sheet No	
DWG 00	