	hting Calo	ulation											
Plug in Su													
	5.2 Embo	died Ca	rbon Mid-le	evel Calculat									
Date: Assessor/C	rganisatior	1:		11/10/2 Stoane Li									
Contact:			sale	es@mikestoar	<u>nelighting.co</u>	<u>m</u>							
Embodied (Carbon Re	sults with	n 'Mid-Level	TM65 Calcul	ation' Metho	d Total							
							1.03 kg C0)2e					
Through Lif	e (25 year) Embod	lied Carbon	n (kaCO₂e)									
	- (<u></u> ,	First Bu		(٦	Γ	Repair						
		0.82					0.21						
1 2	3 4	5	6 7	89	10 11	12 13 1	4 15 1	6 17 1	8 19 20	21 22	23 24	25	
25 year pro	duct lite												
Product In	formation												
Type of Pro	duct										Luminaires		
Product We Material Bre		or at leas	st 95% of th	e product wei	icht. Breakd	own					0.034 kg 100.00%		
B3: Materia	ls replaced	d as part	t of repair								0.212 kgCO2e	Э	
			ctory per ur	nit of product						Edinbi	0.35 kWh Irgh, Edinburg	th City	
Location of		re									United Kingd		
Product Co	mplexity										Category 2		
100	1%					laterials by %		¥¥ 61g.1.					
90)%												
80)%												
70)%												
60)%												
50)%									42 2 4 0/			
)%									43.24%			
30)%												
20)%										18.53%		
								8.82%	F 0.00/			F 0.00/	
	2.9	94%	1.47%	2.94%	4.41%	2.94%	2.94%		5.88%			5.88%	
	Br	ass	Copper	Glass	Plastics (general)	Printed circuit board mixed	Rubber	Stainless steel	Steel (general or I	ngot from old	Aluminium d primary ingot	PMMA (acrylic,	
						mounted			galvanised)	scrap		plexiglass)	

STOANE LIGHTING

EQUIPMENT DESIGN + MANUFACTURE

TM65.2 Lighting Calculation: Luminaire

Plug in Surf Type S

CIBSE TM65 Embodied Carbon Mid-level Calculation

Embodied Carbon Results Breakdown (kg CO ₂ e)	
A1: Material Extraction	0.311
A2: Transport	0.013
A3: Manufacturing	0.201
A4: Transport to Site	0.001
B3: Repair	0.163
C2: Transport	0.000
C3: Waste Processing	0.100
C4: Disposal	0.000
Embodied Carbon Results (kg CO ₂ e)	
A1-C4	0.79
A1-C4 with Buffer Factor	1.03
Assumptions	
A1: Material carbon coefficient source	TM65, Table 2.1; TM65.2 Table 9
C4 Percentage of product going to landfill(%)	55% - TM65 Table 4.14

This report was generated using the CIBSE TM65 Manufacturers form 'beta' version V1.3. Released in August 2023

Stoane Lighting are a UK based company.

Files are generated for a 'standard' version of the fitting and may not include calculations for accessories or derivatives. Only if LED drivers or Power supplies are integral will they be included in the calculation. Repair embodied carbon is calcualted based on light source and control gear replacement once in the 25 year product life

For more inoformation please contact us via our website shown below.



This report was produced using the CIBSE documents; TM65 Embodied Carbon of MEP Products - June 2021 TM65.2 Lighting - August 2023

www.stoanelighting.com