

APPENDIX C

Eco Impact Checklist

Title of report: LED/CMS Project				
Report author: Razvan Constantinescu				
Anticipated date of key decision 5 April 2022				
Summary of proposals: Approve the replacement of Bristol's current street lighting network with state-of-the-art, energy saving Light Emitting Diodes and Centrally Monitored System				
Will the proposal impact on...	Yes/ No	+ive or -ive	If Yes...	
Emission of Climate Changing Gases?	Yes	-ive	Travel around the city will generate emissions	Electric or low emission vehicles will be requested as part of the contractual terms. Contractors evidence how further reductions, such as minimising mileage can be provided as part of the quality submission.
		-ive	There will be embodied emissions from the materials and products used	Environmental product descriptions and life cycle analyses (if available) will be requested to establish the carbon impact of products to be used and determine whether there are lower impact options available that would effectively meet requirements.
Bristol's resilience to the effects of climate change?	Yes	+ive	Reducing demand from streetlighting on the local electrical grid will enable the electrification of heating and transport, reducing the need to transport fuels and making the city more resilient.	No mitigation needed.
Consumption of non-renewable resources?	Yes	-/+ive	The consumption of non-renewable materials is possible	Work will be done with Manufacturers and Suppliers to use renewable materials

				where this is appropriate. Equipment will be re-used and upgraded wherever possible to reduce the demand for materials provide replacements.
Production, recycling or disposal of waste	Yes	-/+ive	Poor waste management	Contractors will comply with the WEEE Regulations for the disposal of electrical items and the waste hierarchy and other waste legislation will be applied to all potential waste. For example, converting existing lanterns to LED and reusing them, or recycling them where this is not possible.
The appearance of the city?	Yes	+ive	Street Clutter & Conservation areas	Street clutter will be reduced by researching innovative products and designs. Ensure the heritage of the city is addressed with suitable and quality products.
Pollution to land, water, or air?	Yes	-/+ive	Hazardous Waste	Ensure safe systems of work, Coshh, Training, Inspections and supervision. Have action plans in place.
Wildlife and habitats?	Yes	-/+ive	Light spill	Ensure consultation with ecology, Lighting designs comply with legislation and ILP recommendations. Specify products suitable to comply with Light Spill and Ecology recommendations and space lamps appropriately to light as required, but allow unlit sections for animals such as bats that perceive continuous lines of lights

				as barriers.
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Consulted with: [Giles Liddell](#)

[Environmental Project Manager](#)

[Bristol City Council Climate Change and Sustainable City Service](#)

Summary of impacts and Mitigation - [to go into the main Cabinet/ Council Report](#)

The significant impacts of street lighting and other highway electrical works included in this proposal will be travel, waste, embodied emissions in new equipment and spares, and their in-use impact on energy consumption, longevity, and light pollution). This proposal does not change the nature of the work, although it does expand the scope covered by this contract.

The proposals include the following mitigation measures: requesting the use of more sustainable equipment and vehicles (including basing decisions on lifecycle emissions where lifecycle analyses / environmental product declarations are available), joint working with the contractor to improve waste reuse, recycling, and waste disposal, ecological consultation and consideration of light pollution in designs.

The overall impact of these proposals is likely to be a significant reduction in electricity use and light pollution from more energy efficient equipment with better controls, as well as a reduction in emissions and air pollution from lower emission vehicles. Other impacts will be similar to current operations.

Checklist completed by:

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