READING BOROUGH COUNCIL

TRAFFIC MANAGEMENT SUB-COMMITTEE

14 JANUARY 2016

QUESTION NO. 1

Tanja Rebel to ask the Chair:

LED Street Lighting Programme

Will Reading Council commit to a specification of its proposed LED street lighting programme, which takes full account of the growing evidence that blue-rich spectral content is detrimental to the natural environment, human health, the view of the night sky as well as road safety – and in doing so limit the Correlated Colour Temperature (CCT) to a maximum of 3000K? This would be in line with other Councils, such as Westminster and Cardiff, who have already considered these issues and are taking the lead in good outdoor lighting practice.

<u>REPLY</u> by Councillor Page:

Reading Borough Council has specified a warm white 4000K LED lantern for its upcoming Invest to Save Street Lighting upgrade, rather than the cool white 5700K luminaires which have been specified to date, of which there are 2200 already in operation in the Borough. LED was first introduced in Reading in 2012 and there have been very few issues or problems brought to our attention during that time.

This specification has been arrived at following detailed design work which takes into account the spacing of the existing columns in the Borough. It provides the optimum performance in relation to lighting standards as well as maximising energy efficiency. At the time of the design work 3000K LED's were less efficient than 4000K versions, however, recent advances in technology mean they are more efficient which potentially makes them a viable option. We will discuss the potential for using 3000K LED's in residential areas with our designers and suppliers and if it is appropriate we will review the specification.

The new LED luminaires will be controlled by the Mayflower Central Management System (CMS) which reports faults automatically, monitors energy consumption and allows for lights to be dimmed to set schedules, further reducing energy consumption.

Cardiff have recently started swapping existing orange SOX and SON (low and high pressure sodium) lamps to GE Streetwise CDO-T lamps in their existing street light luminaires, rather than replacing the luminaires with LED's, so a direct comparison between Reading and Cardiff is not possible and it could be argued that they are using old technology. CDO-T lamps have a maximum life of 24,000 hours, LED's have a life of 80-100,000 hours.

Westminster City Council are installing LED luminaires at 3000K following trial installations. The feedback they received was that the warm/yellow light that the 3000K LED's produced was more appropriate than whiter light for public areas and areas with a high footfall as they produced less glare, which people felt was important if they were to spend time outdoors, for example in outdoor seating and entertainment areas.

As well as reducing energy consumption by up to 50% the conversion to LED will reduce maintenance costs due to the long service life of the LED equipment.