

Case studies: How ICT is helping to deliver the low carbon economy

Title: Energy efficient lighting for streets and highways



Company: Philips

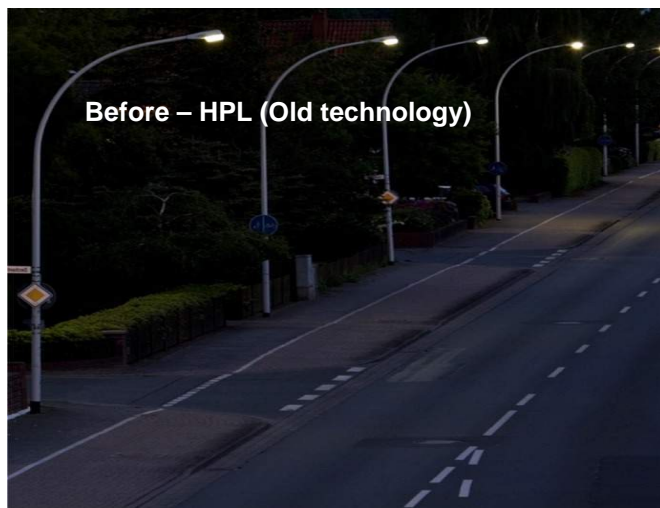
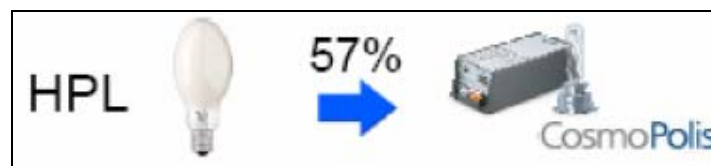
Summary of what has been achieved	Change-over to better and energy efficient lighting systems saving both the environment and costs
Parties involved:	Philips Lighting
Sector/s:	infrastructure and roads
Approx scale:	world wide application
Outcome:	saving 109 kg CO2 per lamp
Timeline/dates:	on the market and available

Key Objectives

World wide 19% of all electricity is used to provide light. Energy costs amounting to EUR 106 billion could be saved annually if lighting worldwide was converted to currently available energy-efficient technologies. Updating the lighting systems in these buildings to more energy efficient solutions leads to significant cost and energy savings.

Description

The energy costs of one lamp (HPL technology) amount to approximately EUR 100-160 per year. The significantly improved light from the modernized equipment ensures excellent visibility (see photos). Pedestrians, cyclists and possible obstacles on the road can be clearly seen – and the new lamps (CosmoPolis range) only consume about half of the energy. The energy costs per lamp/year are reduced by EUR 70-130, and CO2 emissions by approximately 600 kg.



Environmental Benefits

Upgrading from HPL lamps to CosmoPolis range saves 57% of energy, which results in 109 kg CO₂ emissions per lamp.

Scope for further work identified?

Philips Lighting is committed to provide more energy efficient lighting systems, for in houses, on roads, in shops and many other applications.