

A large industrial factory and warehouse interior. In the foreground, a woman wearing a blue long-sleeved shirt, a high-visibility yellow safety vest, and a grey hairnet is looking at a clipboard. The background shows a vast space filled with industrial machinery, including several white machines labeled 'Demag', and numerous stacks of cardboard boxes. The ceiling is high with a complex network of pipes and numerous bright, rectangular LED light fixtures. The overall atmosphere is one of a busy, well-lit manufacturing environment.

# Case study

## Avent Factory and Warehouse

Location  
Philips Lighting

Suffolk, UK  
GentleSpace LED, Pacific LED,  
Dynalite Lighting Controls and Services



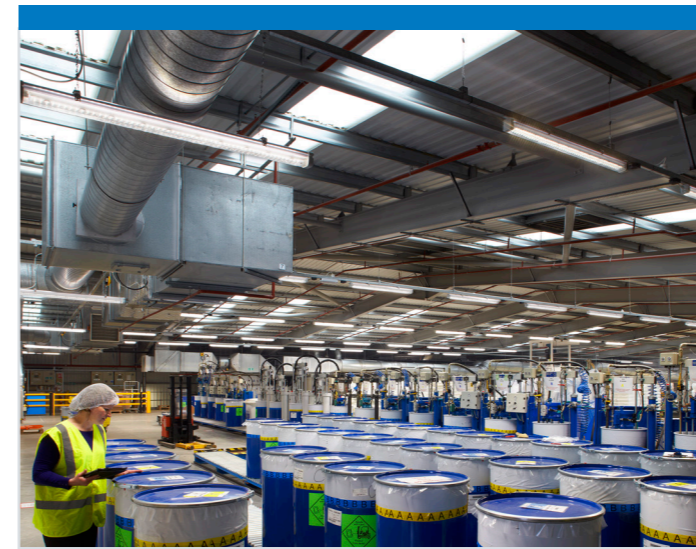
**PHILIPS**



“Both Powercor and Philips did a brilliant job and we are delighted with the results. The project has delivered greatly improved working conditions with increased light levels for staff and we have reduced energy costs, maintenance cost and carbon footprint significantly.”

Karl Rumball, Head of Facilities Management, Philips AVENT

## A project to upgrade to LED lighting in production and warehouse areas has enabled Philips AVENT to reduce lighting energy consumption by around 40% while significantly improving lighting levels



### Fast Facts

#### Customer

Philips AVENT

#### Location

Suffolk

#### Philips Products

GentleSpace LED, Pacific LED, Dynalite Lighting Controls

#### Services provided

Survey, Design Support, Project Management

#### Project in Partnership with

Powercor

### Background

Philips AVENT has been a leader in the design and manufacture of baby products since 1984, with a range including breast pumps, bottles, sterilisers, monitors, soothers and toddler feeding. In line with other Philips companies, Philips AVENT has a strong sustainability policy and is continually evaluating ways to reduce its environmental impact.

In 2013 capital funding became available and the company considered how this could be invested in support of its sustainability objectives. Karl Rumball, Head of Facilities Management, recalls. “A number of longer-term initiatives were introduced to reduce our carbon footprint but it was clear that by upgrading the lighting we would deliver fast results in terms of energy-saving, with a number of additional benefits.”

A priority for the company was to replace the ageing 400W and 450W high pressure sodium luminaires in the production area and warehouse at its facility in Suffolk. As well as being relatively inefficient, the poor colour rendering of this lighting was not ideal for the hand/eye dexterity required for production, nor the visual inspection of products. The old lighting was also adding heat to the workspace, so more energy was required for ventilation to maintain comfort conditions.

Furthermore, the maintenance requirements for the previous lighting were onerous, as frequent lamp replacements had to be carried out using special access equipment.

However, replacing the lighting presented a number of challenges as the factory operates 24 hours a day for most of the year and people working at height to replace the lighting would be very disruptive. The project therefore had to be completed during the Christmas and New Year shut-down period.

### The Solution

“We contacted Philips Lighting and they sent a team to survey the site and produce proposals for the new lighting,” Karl Rumball continued. “They were able to assure us that the work could be completed in the required timescale and, very importantly, that they could deliver a full solution service so we

could focus on other aspects of the planned building improvements. The projected payback period also fitted with Group requirements,” he added.

Philips GentleSpace LED luminaires were selected to replace the sodium lighting in the production and warehousing areas, using bespoke high-output versions in the factory and special ‘high rack’ optics in the warehousing area. In the inspection area on the mezzanine, 2 x 58W fluorescent T8 fittings have been replaced with Pacific LED surface-mounted LED luminaires. Kitchen LED fittings have been installed beneath the mezzanine.

Upgrading to LED lighting has also enabled more precise control of the lighting than was possible with the sodium light sources. The lighting is now divided into seven zones, instead of the previous three, under the control of a Philips Dynalite lighting management system. To minimise energy consumption the system uses daylight linking to dim the lighting in relation to the levels of daylight entering through rooflights. It is also linked to occupancy sensors in the warehouse area to dim the lighting in unoccupied aisles.

In parallel, lighting in the conference suite and reception area has been upgraded using a range of LED luminaires, including the innovative Soundlight Comfort Ceiling, which combines LED lighting and superior sound absorption in an integrated system.

Philips provided design support and project management and the installation in the manufacturing and warehouse areas was carried out by Powercor Electrical Services. Delivering the project within the tight timescales required close liaison between the two companies as well as with the Philips AVENT facilities team.

“Both Powercor and Philips did a brilliant job and we are delighted with the results. The project has delivered greatly improved working conditions with increased light levels for staff and we have reduced energy costs, maintenance costs and carbon footprint significantly,” Karl Rumball concluded.

If you would like to see more projects or have an enquiry, please visit us at [www.philips.co.uk/lighting](http://www.philips.co.uk/lighting) or email: [lighting.uk@philips.com](mailto:lighting.uk@philips.com)



#### Contact details:

Guildford  
Philips Lighting  
Philips Centre  
Guildford Business Park  
Guildford, GU2 8XH  
Tel: 0845 601 1283

Dublin  
Philips Electronics Ireland Ltd  
Philips House  
South County Business Park  
Leopardstown  
Dublin 18  
Tel: +353 1 764 0000

Email: [lighting.uk@philips.com](mailto:lighting.uk@philips.com)  
[www.philips.co.uk/lighting](http://www.philips.co.uk/lighting)



©2014 Koninklijke Philips Electronics N.V.  
All rights reserved. Reproduction in whole or in part is prohibited without the prior written consent of the copyright owner. The information presented in this document does not form part of any quotation or contract, is believed to be accurate and reliable and may be changed without notice. No liability will be accepted by the publisher for any consequence of its use. Publication thereof does not convey nor imply any license under patent- or other industrial or intellectual property rights.

Date of release: April 2014