

CASE STUDY: Skanska – Skanska’s Approach To Plastic Waste

Construction is a resource intensive industry, consuming 400 million tonnes of material and generating a third of all total waste produced in the UK every year. As a result of this, Skanska has a responsibility to find ways to reduce the impact of our operations on the environment and society.

Through Skanska’s ‘**Journey to Deep Green**’ initiative, our aim is to for all our projects to have a near zero impact on the environment. We measure the environmental performance of our projects on the Skanska Colour Palette™ shown below. This ranges from ‘**Vanilla**’ (compliance with laws and standards) through to ‘**Deep Green**’ (future proof – when the construction process and operation of the facility has a near zero impact on the environment).

| | Vanilla Compliance | Green Beyond Compliance | Deep Green Future Proof |
|-----------|-----------------------|----------------------------|---|
| Energy | | | Net zero Primary Energy |
| Carbon | | | Near Zero Carbon Construction |
| Materials | | | Zero Unsustainable Materials Zero Hazardous Materials Zero Waste |
| Water | | | Net Zero Water |

Zero waste is one of our six performance areas we assess:

- Net zero primary energy.
- Near zero carbon construction.
- Zero unsustainable materials.
- Zero hazardous materials.
- Zero waste.
- Net zero water.

Zero Waste

Significant opportunities exist in construction to prevent waste from occurring and to improve resource efficiency. Skanska operate in line with the waste hierarchy and are working with our design partners and supply chain on initiatives which aim to eliminate waste produced, and if it is produced, divert it from landfill.

The long term objective, as stated in our Environment Policy, is to '*generate zero waste through reducing upfront demand, reusing materials whenever possible, and recycling or down cycling*', resulting in Deep Green zero waste projects.

As a result of our efforts, to date in 2018, we have diverted from landfill over 95% of self-generated construction waste produced, which comprises of construction materials and packaging brought to site.

Sustainable Procurement

The biggest opportunities to lower our environmental impact lie in the efficient use of natural resources and materials in our supply chain. We recognise that to achieve our zero waste target, we must work closely with the supply chain to prevent waste and to create innovative products.

The Skanska Sustainable Procurement Policy document outlines our commitment when sourcing products and services, to take into account environmental aspects over the whole product or service life cycle. We require our suppliers to have an appropriate Environmental Management System, to comply with the Skanska Environment Policy, to minimise packaging, and to maximise recycled or secondary material content.

Specifically for waste, the document contains:

- **Reducing waste:** Suppliers shall support Skanska in its commitment to delivering zero waste to landfill and shortly, zero waste products.
- **Reducing packaging:** The use of primary, secondary, and tertiary packaging should be minimised to that required to be fit for purpose. As a preference, tertiary packaging should be made from materials that can be reused, such as plastic returnable transit packaging. All other packaging materials must be able to be recycled or recovered by commonly available methods in the UK. Suppliers shall at their expense, where required by Skanska, take back any excess or non-compliant packaging relating to the products and services provided for subsequent reuse or recycling.

Our People

Skanska considers educating our employees and raising their awareness of environmental risks and impacts as fundamental for achieving our Deep Green and zero waste ambitions.

All staff attend mandatory environmental awareness training and are fully briefed on environmental risks on site before any construction starts, including waste.

Specific briefings on plastic waste have been developed and rolled out during 2018.

UN World Environment Day

World Environment Day 2018



#PledgeLessPlastic

IEMA and Partners are proud to support World Environment Day

5th June 2018 | Make your pledge: [Access our toolkit](#)



Skanska are corporate members of IEMA and worked with members of their Employer Forum, including: Rolls Royce, Siemens, Canary Wharf Group, Willmott Dixon, Society for the Environment, and www.lessplastic.co.uk to produce a campaign to promote UN World Environment Day 2018, which has theme: '**Beat Plastic Pollution.**'

A series of pledge cards with the hashtag **#PledgeLessPlastic**, case studies, and other resources were developed and shared on both the [IEMA](#) and [Society for the Environment](#) websites.

Looking at plastic use, globally:

- Up to 5 trillion plastic bags are used each year.
- 1 million plastic bottles are bought every minute.
- 12 million tonnes of plastic leaks into the ocean every year.
- 17 million barrels of oil are used on plastic production each year.
- 100,000 marine mammals are killed by plastic each year.
- 90% of bottled water samples have been found to contain plastic particles.
- 83% of tap water has been found to contain plastic particles.
- 50% of consumer plastics are single-use.
- 10% of all human generated waste is plastic.

A six months on update to this campaign was produced in December 2018, with additional and updated resources added to the websites.

During these campaigns, the IEMA website received over 6,000 hits, with over 500 downloads of the toolkit and nearly 1,000 downloads of the plastic pledge cards.

Benefits

Below are some examples of working with our people and the supply chain to reduce and divert plastic waste from landfill:

- Using Wysebase lightweight blocks made from recycled plastic to form the base for site cabins and welfare units instead of traditional concrete foundations. On completion, the blocks can be removed and reused at another site, saving on further material consumption and eliminating related manufacturing carbon emissions and procurement costs.
- Working with MacRebur to trial the use of asphalt containing plastic. The material is made from plastic pallets which are added to the asphalt mix to replace a proportion of the bitumen. The pellets reuse plastic waste which would have otherwise been disposed of to landfill.
- Two members of our Environment Team supported one of our hospital clients by speaking to staff, patients, and visitors about single-use plastics and hospital waste management during their 2018 Sustainability Week.
- Skanska employees used their 'lend a hand' volunteering day to litter pick some of the 12 million tonnes of plastic pollution that enter the ocean annually, and to help keep beaches clean.
- Reverse vending machines are being installed on several of our Facilities Management contracts. The machines sort, separate, and crush consumer waste such as cans and plastic bottles. Consumers are incentivised to use the machines by dispensing rewards such as restaurant vouchers. This helps our Facility Management Team improve the segregation of plastic at source.
- One of the most persistent issues with plastic waste is single-use plastic cups. Skanska branded water containers and coffee cups are now available to staff to use to replace single-use plastic water cups and coffee containers. We are also trialling reusable collapsible cups and compostable paper cups on several projects.

To find out more about Skanska, please click [here](#) to visit our website.