

# SUSTAINABLE PRODUCTION

## What is the Theatre Green Book?

The Theatre Green Book is a guide to support the sustainability of theatre in response to the climate crisis and produced by a range of people from across the theatre production world with support from sustainability experts Buro Happold.

There are 3 volumes to the Theatre Green Book:

Volume 1: Sustainable Productions

Volume 2 Sustainable Buildings

Volume 3: Sustainable Operations

We imagine Volume 1 will be the most relevant to readers of this catalogue.

Learn more about the Theatre Green Book by visiting their website: [www.theatregreenbook.com](http://www.theatregreenbook.com). Scanning this QR code will take you there:



## Why is Flints talking about Theatre Green Book?

Much like the makers driving the development of the Theatre Green Book, we feel we have a duty to support the necessary changes in response to the climate crisis. As such we are doing our absolute best to improve our product offering, and business practices to ensure we are giving you the best options for all your production needs. This includes researching and sourcing more sustainable and eco-friendly products and services.

### Flints' response

Our original intention for this catalogue had been to make this a 'Green Catalogue', however the closer we got to our print deadline the more obvious it became that we were not going to be able to make enough of the changes to our product offerings to justify this accolade, and a key concern of Flints is to ensure whatever we are doing is not simply 'greenwashing'.

We outline our considerations for products offered in the section entitled '*What makes a product 'sustainable'?*', but this is not the only place we can make changes. In recent years we have made significant efforts with our packaging and internal processes to reduce our carbon footprint and environmental impact as a business. See the section entitled '*Changes to Flints Packaging & Delivery Services*' to read more.

If you are reading a printed copy of this catalogue, it has been printed in South Wales using FSC certified paper, and vegetable based inks which are kind to the environment. It is fully recyclable, so if you should ever need to dispose of it, please do put it in the recycling!

### Why should you care?

Well, aside from the environmental concerns there are also considerable financial and health benefits from making changes. We'd urge you to do some more research and follow the excellent work being done by groups like the Theatre Green Book, and the Association of Scenic Artists and Makers [ASAM] amongst others.

## Are the old ways more sustainable?

There are certainly compelling arguments to be made around our increased consumption and the impact that has had on how sustainable productions are - scale and individual production budgeting has probably also had an impact on this. In Europe it is common for big production houses to have 2 budgets - 1 for each production, and 1 for stock pieces which get used for multiple productions, thus spreading that cost and justifying the expense of better and repairable equipment. Something we could learn from them perhaps!

If we think back to scenics working 150 years ago, they would have probably been mixing their own paints made from size and raw pigments. Sustainable, yes, but not necessarily ethical in the production of the raw materials, and having a hot pot of size running in a workshop is certainly not practical! Also, working with powdered pigments can be quite dangerous, so not necessarily better for the user's health. Complex stuff.

## Do the eco alternatives live up to modern standards?

Many "eco" paints struggle to achieve the same intensity of colours, and flexibility of acrylics that scenics are used to having, and one of our biggest struggles in product testing is working out the best options for our clients. So, we are currently testing a range of eco binders and have recently introduced some eco glazes [see page 55] which could be used as bases for our scenic pigments to make your own colour. Keep an eye out on our social media posts for our test results, but if successful we could find that a blend of traditional techniques with modern products could prove a viable path forward.

## Changes to Flints' Packaging and Delivery Services

We've made lots of changes to our packaging over recent years, but it seems many people aren't aware of them! Just remember all plastic and cardboard needs to be **clean and dry** to be put into recycling.



Our special paper bags hold an impressive 27 kg and can even survive a light drizzle! Definitely robust enough for a few pots of paint, or some tools, and can easily be reused. One of our best swaps to date. Plus as they aren't plastic, we don't have to charge you for them!



Might not look like much, but these plastic bags are a bit magic. Not only are they recyclable [within 6 months please], but they contain a special bio element which means if despite your best efforts they end up in the environment they will completely biodegrade!



We're not highlighting our tins here, but the tape sealing it! Paper tape is great, we just wonder why we didn't use this in the first place! Also used on our boxed deliveries, it means you don't have to remove the tape before you recycle them. Boxes are made from recycled card too. Happy days!

Additionally almost all our 'Van Run' Deliveries in London's West End and City are fulfilled by PediVan - bike couriers and an electric van. Can't get greener than that!



**We're looking to introduce more eco delivery options, so watch this space for more news!**

### What makes a product 'sustainable'?

Sustainability is very complex. There are so many factors to consider in whether a product is truly a better or worse option from an environmental perspective. We have identified 4 key areas for consideration:

**Carbon Footprint:** This is an almost impossible number to calculate as there are so many factors and layers of calculation involved. The most obvious of these is distance travelled, i.e. Country of Origin vs. Country of Use. e.g. a book (or a catalogue) printed in China and shipped to the UK will of course have a higher carbon footprint in terms of miles travelled than one printed in the UK for distribution in the UK. However, this doesn't consider the manufacturing process, which has a big input on the carbon footprint of the product. e.g. a book printed using energy generated by a coal plant will have a much bigger carbon footprint than one printed using energy generated by an off-shore wind farm. Also, neither of these elements considers the carbon footprint of the materials going into the product; in our book analogy, the paper, the inks, the adhesives etc. Has the paper been sourced in the same country as the production plant? What's the carbon footprint of the production of the paper? The rabbit hole goes on, and on.

**Raw Materials:** We have considered the "carbon footprint" element of Raw Materials in the previous point – the miles travelled to the production facility and their own production [e.g. felling trees and transporting them to a factory to make paper] – but what about the impact that production process has on the wider environment. Many assume recycled paper is more environmentally-friendly, but the production process of recycled paper can be so carbon and water intensive that ultimately could cause far more damage than responsibly sourced FSC certified new paper.

**Product Use:** Did you know that almost all paints and glazes [even water-based ones] contain plastics? Environmental Action [a mission-driven research based consultancy] state that, on average, paint is 37% plastic polymers<sup>1</sup>. They also estimate that globally the paint share of micro-plastic leakage in the ocean and waterways is a shocking 58%<sup>2</sup>. This is disputed by The British Coatings Federation [BCF] who claim it to be far lower<sup>3</sup> and assume less than 1% of a pot of paint is washed from brushes and pots into our waterways. Regardless of the specific amount that ends up in our environment, this is clearly problematic.

Additionally almost all paints, glazes, and adhesives contain VOCs [Volatile Organic Compounds] which are harmful to user's health, and there is an increase in cancer rates amongst regular users<sup>4</sup>. Considerable efforts have been made in recent years to reduce the 'nasty' components<sup>5</sup> in the products, and to reduce the VOC content - pretty much all of our scenic paints are classed as "Low VOC" [generally accepted to be less than 50 g/L<sup>6</sup>]. Of course these risks to health can [and should] be mitigated by the use of respirators [see page 342]. It is also worth noting that if you are diluting a pot of paint, a 1:1 dilution with water will halve the concentration of the VOCs.

The long and the short of it is, almost all products and materials we use commonly in theatre, film & TV - particularly in set construction & decoration, art department and props are problematic in terms of both ecology and health, so we need to find improvements and alternatives without compromising on quality.

**End of life:** What happens once your tool or scenery reaches the end of its life? We hope that for most of our clients they will be stripping down and reusing what bits they can, but ultimately some pieces simply won't be reusable. If the products used in the production of said pieces are not viable to be recycled then they will likely end up in landfill. In England alone in 2020 it is estimated that we created a 33.8 million tonnes of commercial and industrial waste<sup>7</sup> the majority of which is destined to end up in landfill. Imagine instead that the materials used in those un-reusable bits were instead compostable – what a difference that could make!

**To conclude,** it is nigh-on impossible to give emphatically clear answers over which product is more sustainable than another, or to calculate whether one production is "better" than another.

### What are Flints' aims?

Our aims are simple, though our task is complex! We are aiming to give you good, and truly, sustainable product options whilst also bearing in mind the difficulty of balancing a budget, and not compromising on practicality! We are intending to try to give a rough sliding scale of how good or bad a product is weighing up all the factors above, with different weightings being applied to different areas. If you are interested in helping us in this endeavour [we are already working with scenic artists from the Association of Scenic Artists and Makers] we would welcome your input. Please register your interest via this form, or scan the QR code:

<https://forms.office.com/e/DPFsNhwARm>



### Some exciting new Eco Products introduced into this catalogue:



Eco glazes! Plastic free and made in the UK.  
Check them out on pages 55 & 57!



Long lasting Eco brushes!  
See pages 72 & 73



Eco textures - Cork Granules  
See page 48



Eco Bio Beads. Made from Corn Starch  
and Sugar Cane. See page 101.

1 Taken from the report: *PLASTIC PAINTS - THE ENVIRONMENT; A global assessment of paint's contribution to plastic leakage to Land Ocean & Waterways* by Environment Action. Available at <http://www.e-a.earth/resources/publications>

2 See Footnote 1.

3 No comparable figure given; BCF site and statement <https://coatings.org.uk/page/Microplastic-Paint-in-the-Ocean>

4 See UK HSE: <https://www.hse.gov.uk/construction/healthrisks/cancer-and-construction/painting.htm>

5 See UK HSE: <https://www.hse.gov.uk/construction/faq-paint.htm>

6 See <https://ecospaints.net/low-voc-paint-vs-no-voc-paint>

7 See <https://www.gov.uk/government/statistics/uk-waste-data/uk-statistics-on-waste>