

FAQs on single-use plastics

- What's the problem with single-use plastic?

Plastic is an integral part of our daily lives; its versatility means that we use it every day in various forms and for many uses. The problem with single-use plastic is that it is used for a short period of time before being disposed of, and it isn't biodegradable like paper or food, so instead it remains in the natural environment for hundreds of years. This is why the U.N. Environment describes single-use plastics as '[one of our planet's greatest environmental challenges](#)'. The production of plastic also is largely reliant on fossil fuels, which are non-renewable resources. In short, the problems associated with single-use plastics are complex and exist at every stage of the lifecycle.

- So what can I do?

There are many actions that individuals can take. Bringing a reusable bag when you go shopping, carrying a reusable coffee cup and saying no to straws when ordering drinks, are easy actions that you can introduce to your daily routine. You can also shop in unpackaged or bulk buy shops to reduce your plastic packaging. When you're on campus, our [Want not Waste shop](#) in Academy 1 has many refillable items, such as dried goods, cleaning products and beauty products. There are also several zero waste shops in Greater Manchester - see here for a [useful map](#) to find your nearest shop.

Our staff can take part in our [10,000 Actions](#) and [Team Actions](#) programmes to contribute to the University's targets on reducing single-use plastics and see these actions mapped against the UN Sustainable Development Goals. Laboratories or workshops can take part in [LEAF \(Laboratory Efficiency Assessment Framework\)](#) to help identify ways to reduce plastics, waste, energy and water and measure success against other teams in the University.

See our [Get Involved](#) pages for more information.



- Are some alternative materials better than plastic?

Some materials like bioplastics or compostable plastics may seem better because they are made from renewable materials such as plant biomass, instead of petroleum like traditional plastic. However, most compostable plastics end up in landfill, which does not have the necessary conditions to break them down. Industrial composting facilities are required to heat the material to a high enough temperature that allows microbes to break it down.

There isn't yet a treatment plant near Manchester which can compost these, so the best way to dispose of bioplastic is in the general waste which at the University is sent for use as a [Refuse Derived Fuel](#). They will also not break down in Greater Manchester's food waste collections, which are [treated through anaerobic digestion](#). Fundamentally, bioplastics are still single-use and encourage a throwaway system that needs changing.

Visit the [Clear on Plastics](#) website to read on the latest information and insights on plastics.

- What about using aluminium or glass instead of plastics?

There isn't a straightforward answer to which material has the least environmental impact. Although the effects of plastic pollution have been well publicised, materials such as metal and glass can also create problems if not disposed of properly. These materials can also weigh more than plastic, which produces more carbon emissions during transport and require intensive mining processes to be created.

Plastic has its benefits, including its light weight, which reduces carbon emissions from transport, and it won't smash like glass or disintegrate like paper when used. When looking at the combination of aspects along the lifecycle – its production, transport, consumption and disposal – there are several factors that should be considered, not just its end-of-life. [This BBC article](#) summarises the real costs of different materials.



Most of the time, *the way that we use plastics* needs to change, not necessarily the material itself.

- Is recycling the best option?

Although recycling plastic waste is a better option than leaving it in landfill or burning it to generate energy, the best option is to reduce plastic in the first place. The hierarchy is as follows: *Reduce, Reuse, Recycle*.

Recycling should ideally be used as a last resort, as much plastic ends up being downcycled (creating materials of lower quality and/or functionality) and not turned back into its original products. Therefore, it is not always a circular system. Recycling plastic at the end of its life still encourages a throwaway system, rather than changing consumers' habits. Buying products with less or no plastic eliminates the problem at its source and puts pressure on companies to follow this consumer demand. Where possible, items should also be reused to extend their lifespan which avoids repurchasing new items and associated costs.

- What is the University's decision-making process of eliminating plastics?

When identifying single-use plastic items to eliminate, we firstly ask if it is possible to *avoid* this plastic. If the plastic is avoidable, we will consider if it can be *eliminated* completely. Following the waste hierarchy, this prevention of waste should always take first priority. If the material cannot be removed, we will aim to replace it with *reusable* alternatives. The next option in the waste hierarchy is to *replace* the item with recyclable materials. We will also aim to use materials that are already recycled, to *reduce* the use of virgin plastic and support the market for recycled plastic. At each stage of the decision-making process, we will ensure that alternative materials are affordable and feasible within our campus facilities.

- Where can I keep up to date on the University's progress on plastics?

To keep updated on the University's progress towards eliminating avoidable single-use plastics, you can follow our team on [Instagram](#), [Facebook](#) and [Twitter](#) or sign up to our newsletter by emailing es@manchester.ac.uk.