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Commentary

Making Fashion Sustainable: Waste and Collective Responsibility

Debbie Moorhouse^{1,*}¹Department of Fashion & Textiles, University of Huddersfield, Huddersfield, West Yorkshire, UK*Correspondence: d.moorhouse@hud.ac.uk<https://doi.org/10.1016/j.oneear.2020.07.002>

Fashion is a growing industry, but the demand for cheap, fast fashion has a high environmental footprint. Some brands lead the way by innovating to reduce waste, improve recycling, and encourage upcycling. But if we are to make fashion more sustainable, consumers and industry must work together.

As the demand for apparel and shoes has increased worldwide, the fashion industry has experienced substantial growth. In the last 15 years, clothing production has doubled, accounting for 60% of all textile production.¹ One particular trend driving this increase is the emergence of fast fashion. The newest trends in celebrity culture and bespoke fashion shows rapidly become available from affordable retailers. In recent years, a designer's fashion calendar can consist of up to five collections per year, and in the mass-produced market, new stock is being produced every 2 weeks. As with many commodities today, mass production and consumption are often accompanied by mass wastage, and fashion is no different.

In fashion, trends rapidly change, and a drive to buy the latest style can leave many items with a short lifespan and consigned to the waste bin. Given that 73% of clothing ends up in landfills and less than 1% is recycled into new clothing, there are significant costs with regard to not only irreplaceable resources but also the economy via landfilling clothing. At present, it is estimated that £140 million worth of clothing is sent to landfills in the UK each year.² Although a significant proportion of recycled fibers are downgraded into insulation materials, industrial wipes, and stuffing, they still constitute only 12% of total discarded material.

The world is increasingly worried about the environmental and social costs of fashion, particularly items that have short lifespans. Mass-produced fashion is often manufactured where labor is cheap, but working conditions can be poor. Sweatshops can even be found in countries with stricter regulations. The transport of products from places of manufacture to

points of sale contributes to the textile industry's rising carbon footprint; 1.2 billion metric tons of CO₂ were reportedly emitted in 2015.¹ Textile dyeing and finishing are thought to contribute to 20% of the world's water pollution,³ and micro-fiber emission during washing amounts to half a million metric tons of plastic pollution annually.⁴ Fashion's water footprint is particularly problematic. Water is used throughout clothing production, including in the growth of crops such as cotton and in the weaving, manufacturing, washing, and dyeing processes. The production of denim apparel alone uses over 5,000 L of water⁵ for a single pair of jeans. When you add this to consumer overuse of water, chemicals, and energy in the laundry process and the ultimate discard to landfills or incineration, the environmental impact becomes extremely high.

As demand for fast fashion continues to grow, so too does the industry's environmental footprint. Negative impacts are starkly evidenced throughout the entire supply chain—from the growth of raw materials to the disposal of scarcely used garments. As awareness of the darker side of fashion grows, so too does demand for change—not just from regulatory bodies and global action groups but also from individual consumers. People want ethical garments. Sustainability and style. But achieving this is complicated.

Demand for Sustainable Fashion

Historically, sustainable brands were sought by a smaller consumer base and were typically part of the stereotype “hippy” style. But in recent years, sustainable fashion has become more mainstream among both designers and consumers, and the aesthetic appeal has evolved to

become more desirable to a wider audience. As a result, the consumer need not only buy into the ethics of the brand but also purchase a desirable, contemporary garment.

But the difficulty for the fashion industry lies in addressing all sustainability and ethical issues while remaining economically sustainable and future facing. Sustainable and ethical brands must take into account fairer wages, better working conditions, more sustainably produced materials, and a construction quality that is built for longevity, all of which ultimately increase the cost of the final product. The consumer often wrestles with many different considerations when making a purchase; some of these conflict with each other and can lead the consumer to prioritize the monetary cost.

Many buyers who place sustainability over fashion but cannot afford the higher cost of sustainable garments will often forsake the latest styles and trends to buy second hand. However, fashion and second-hand clothing need not be mutually exclusive, as can be seen by the growing trend of acquiring luxury vintage pieces. Vintage clothing is in direct contrast to the whole idea of “fast fashion” and is sought after as a way to express individuality with the added value of saving something precious from landfills. Where vintage might have once been purchased at an exclusive auction, now many online sources trade in vintage pieces. Celebrities, fashion influencers, and designers have all bought into this vintage trend, making it a very desirable pre-owned, pre-loved purchase.⁶ In effect, the consumer mindset is changing such that vintage clothing (as a timeless, more considered purchase) is more desirable than new

products because of its uniqueness, a virtue that stands against the standardization of mass-market production.

Making Fashion Circular

In an ideal system, the life cycle of a garment would be a series of circles such that the garment would continually move to the next life—redesigned, reinvented, and never discarded—eliminating the concept of waste. Although vintage is growing in popularity, this is only one component of a circular fashion industry, and the reality is that the linear system of “take, make, dispose,” with all its ethical and environmental problems, continues to persist.

Achieving sustainability in the production of garments represents a huge and complex challenge. It is often quoted that “more than 80% of the environmental impact of a product is determined at the design stage,”⁷ meaning that designers are now being looked upon to solve the problem. But the responsibility should not solely lie with the designer; it should involve all stakeholders along the supply chain. Designers develop the concept, but the fashion industry also involves pattern cutters and garment technologists, as well as the manufacturers: both producers of textiles and factories where garment construction takes place. And finally, the consumer should not only dispose, reuse, or upcycle garments appropriately but also wash and care for the garment in a way that both is sustainable and ensures longevity of the item. These stakeholders must all work together to achieve a more sustainable supply chain.

The challenge of sustainability is particularly pertinent to denim, which, as already mentioned, is one of the more problematic fashion items. Traditionally an expression of individualism and freedom, denim jeans are produced globally at 1.7 billion pairs per year⁸ through mass-market channels and mid-tier and premium designer levels, and this is set to rise. In the face of growing demand, some denim specialists are looking for ways to make their products more sustainable.

Reuse and recycling can play a role here, and designers and brands such as Levi Strauss & Co. and Mud Jeans are taking responsibility for the future life of their garments. They are offering take-back services, mending services, and possibilities for recycling to new fibers at

end of life. Many brands have likewise embraced vintage fashion. Levi’s “Authorized Vintage” line, which includes up-cycled, pre-worn vintage pieces, not only exemplifies conscious consumption but also makes this vintage trend more sought after by the consumer because of its iconic status. All material is sourced from the company’s own archive, and all redesigns “are a chance to relive our treasured history.”⁹

Mud Jeans in particular is working toward a circular business model by taking a more considered, “seasonless” approach to their collections by instead focusing on longevity and pieces that transcend seasons. In addition, they offer a lease service where jeans can be returned for a different style and a return service at end of life for recycling into new fiber. The different elements that make up a garment, such as the base fabrics (denim in the case of Mud jeans) and fastenings, are limited so the company can avoid overstocking and reduce deadstock.¹⁰ This model of keeping base materials to a minimum has been adopted by brands that don’t specialize in denim, such as Adidas’s production of a recyclable trainer made from virgin thermoplastic polyurethane.¹¹ The challenge with garments, as with footwear, is that they are made up of many different materials that are difficult to separate and sort for recycling. These business models have a long way to go to be truly circular, but some companies are paving the way forward, and their transparency is highly valuable to other companies that wish to follow suit.

Once a product is purchased, its future is in the hands of the consumer, and not all are aware of the recycling options available to them or that how they care for their garments can have environmental impacts. Companies are helping to inform them. In 2009, Levi Strauss & Co. introduced “Care Tag for Our Planet,” which gives straightforward washing instructions to save water and energy and guidance on how to donate the garment when it is no longer needed. Mud Jeans follows a similar process by highlighting the need to break the habit of regular unnecessary washing and even suggesting “air washing.”¹⁰

At the same time, designers are moving away from the traditional seasonal production cycle and into a more seasonless calendar. In light of the coronavirus dis-

ease 2019 (COVID-19) pandemic, Gucci’s creative director, Alessandro Michele, has announced (May 2020) that the Italian brand will end the traditional five fashion shows per year and will “hold shows just twice a year instead to reduce waste.”¹²

This is a brave decision because it goes against the practice whereby designers were pressured for decades to produce more collections per year, but the hope is that it will be quickly followed by more brands and designers.

Transparency

The discussion around sustainable fashion practices has led to a growing demand from consumers for transparency in the supply chain and life cycle of fashion garments. Consumers want to be informed. They are skeptical of media hype and “greenwashing” by fast-fashion companies wanting to make their brand appear responsible. They want to know the origin of the product and its environmental and social impact.

Some companies are responding by seeking a better understanding of the environmental impacts of their products. In 2015, denim specialist Levi Strauss & Co. extensively analyzed the garment life cycle to consider the environmental impact of a core set of products from its range. The areas highlighted for greatest water usage and negative environmental impact were textile production and consumer laundry care; the consumer phase alone consumed 37% of energy,¹³ fiber and textile production accounted for 36% of energy usage, and the remaining 27% was spent on garment production, transport, logistics, and packaging.¹⁴ This life-cycle analysis has led to innovation in waterless finishing processes that use 96% less water than traditional fabric finishing.¹⁵ As noted previously, transparency here also inspires the wider industry to do likewise. Other companies have also introduced dyeing processes that need much less water, and much work is focused on improving textile recycling.

But this discussion does not just apply to production. Some high-street brands are using a “take back” scheme whereby customers are invited to bring back unwanted clothing either for a discount on future purchases or as a way to offload unwanted items of clothing. Not only might this encourage consumers to buy more without feeling guilty, but the

ultimate destination of these returned garments can also be unclear. Without further transparency, a consumer cannot make fully informed decisions about the end-of-life fate of their garments.

Collective Responsibility

The buck should not be passed when it comes to sustainability; it is about collective responsibility. Professionals in the fashion industry often feel that it is in the hands of the consumer—they have the buying power, and their choices determine how the industry reacts. One train of thought is that the consumer needs to buy less and that the fashion retail industry can't be asked to sell less. However, if a sustainable life cycle is to be achieved, stakeholders within the cycle must also be accountable, and there are growing demands for the fashion industry to be regulated.

With the global demand for new clothing, there is an urgent need to discover new materials and to find new markets for used clothing. At present, garments that last longer reduce production and processing impacts, and designers and brands can make efforts in the reuse and recycling of clothing. But environmental impact will remain high if large quantities of new clothing continue to be bought.

If we want a future sustainable fashion industry, both consumers and industry professionals must engage. Although greater transparency and sustainability are being pursued and certain brands are leading the way, the overconsumption of clothing is so established in society that it

is difficult to say how this can be reversed or slowed. Moreover, millions of livelihoods depend on this constant cycle of fashion production. Methods in the recycling, upcycling, reuse, and remanufacture of apparel and textiles are short-term gains, and the real impact will come from creating new circular business models that account for the life cycle of a garment and design in the initial concept. If we want to maximize the value from each item of clothing, giving them second, third, and fourth lives is essential.

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The author is the co-founder of the International Society for Sustainable Fashion.

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