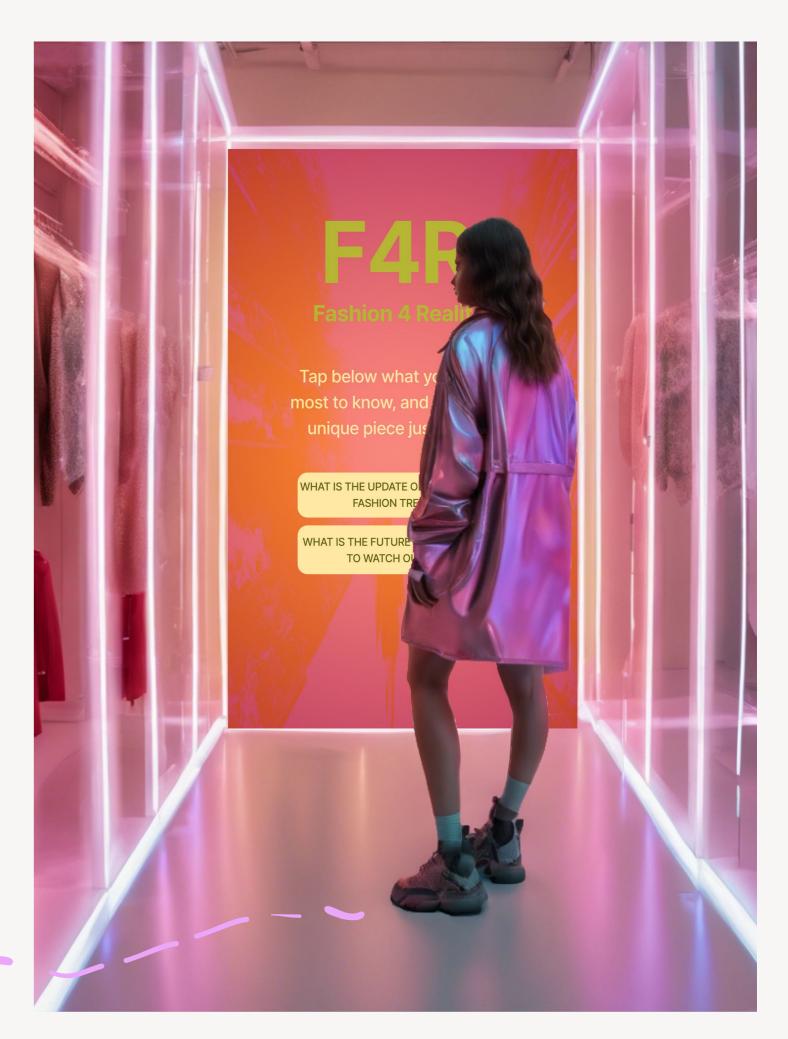# Stimulating fast fashion consumers in-stores to slow down consumption with AI art

Designing for socio-environmental impact

Mockup of concept installed in a store setting, showcasing the interface titled "F4R: Fashion 4 Reality." The screen invites users with the message: "Tap below what you desire most to know, and I'll reveal a unique piece just for you!". Image was co-created by author and AI DreamGen. F4R visual was added by author.

Meet Fashion 4 Reality!
An AI-generated visual art display designed to raise consumer awareness and shift perceptions of overconsumption in the fast fashion industry.

RESEARCH

There exists a gap in the understanding of how visual art can influence consumer perceptions of overconsumption within the fast fashion industry. To address this, this research investigates the potential of AI-generated visual art to raise consumer awareness and alter perceptions of unsustainable fashion practices. Using a conceptual framework based on theories from the Vision in Product (ViP) framework, the study employs two experimental phases to evaluate the effectiveness of various aesthetic combinations of AI-generated images. The research aims to identify how these images impact consumer attention, cognitive engagement, and behavioral change, with a focus on how generative visual art can challenge existing overconsumption patterns and promote more sustainable fashion practices. Through this approach, the study seeks to uncover opportunities for leveraging creative visual strategies to foster a deeper reflection on fashion consumption and drive meaningful change within the industry.

EXPERIMENTAL STUDIES

The **pre-study** tested eight aesthetic combinations (color vs. no color; zoom-in vs. zoom-out) to identify the most effective visual stimuli for capturing attention and prompting reflection on fast fashion. The **main study** compared AI-generated images with traditional images, dividing participants into control and treatment groups.
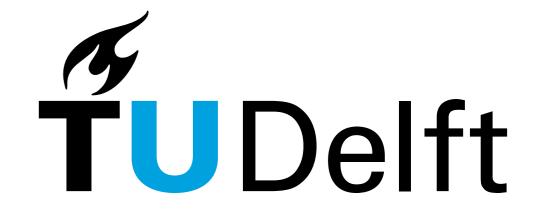
KEY FINDINGS

The **pre-study,** among 111 participants, yielded results on black and white, zoom-in compositions to being the most effective at drawing attention and sparking reflection on fast fashion practices.
The **main study** with 254 participants led to a statistically significant impact of the AI images: mean scores were higher by 13.94% (T1) and 7.33% (T2) compared to traditional images. A standout AI-generated image captured attention, boosted cognitive engagement, and encouraged behavioral change. These findings underscore the transformative potential of AI-generated visual art as an effective tool for raising awareness and challenging fast fashion's unsustainable practices.

Raw Materials Extraction	Design	Manufacturing	Distribution	Retail	Consumption -use-	Disposal -end of lif
Land use		Workshops	Transportation	-over- Selling	-over- Consumption	-over- Discarding
Animal Exploitation		Human Rights Violation / Exposure to chemicals / Exposure to noise / Ergonomic Issues	Environmental Pollution / Water Usage	Clothing cluttering		Waste Generation
Land (Over)(Ab)Use / Loss of Biodiversity		Air Pollution				Animal & Land Harm

Supply chain vs. product lifecycle system, designed by author. The foundation framework used for all experimental studies.

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Msc. Strategic Product Design

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