All Sustainable Consumers Are Not the Same:
Segmentation through Application of the Sustainable Apparel Consumer (SAC) Typology

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Key words: typology, sustainable apparel consumption, unsustainable, willingness to pay, importance of appearance

Background. Consumers are a major force in transforming the current fast fashion market into a sustainable one (Coscieme et al., 2022), resulting in a rapidly growing number of studies on the topic (Dabas & Whang, 2022). Previous research has examined how sustainable consumers are different from mainstream consumers (e.g., Lundblad & Davies, 2016; Paetz, 2021; Rahman & Koszewska, 2020). Yet, knowledge about sustainable consumers remains fragmented; it is not well understood what drives them when they acquire and use clothing and how their needs and wants are different from other consumers (Karpova et al., 2022). In a review of 25 years of sustainable fashion research, Dabas and Whang (2022) called for delineating the drivers of environmental- vs. social-value based consumption. Thus, the present study focuses on the environmental aspect of sustainability and defines sustainable consumers as those who aim to reduce the footprint of their clothing consumption. The **first research objective** was to examine attitudes and practices of sustainable consumers in comparison with consumers in general.

Scholars tend to view sustainable apparel consumers as a homogenous market segment. In past studies, most researchers segmented *all* apparel consumers into a number of groups (from two to six), depending on their (un)sustainable inclinations or behaviors as well as various fashion-related attitudes (Cavender & Lee, 2018; Koszewska, 2013; Paetz, 2021; Park et al., 2017). The resulting groups range from indifferent to sustainable consumers, with most being "in-between." No study has attempted to identify different segments among *sustainable* apparel consumers. It is important to understand how sustainable consumers might differ in their clothing needs and wants and, therefore, adopt different practices when acquiring, using, and caring for clothing. Therefore, the **second research objective** was to segment sustainable consumers to understand differences in their attitudes and practices related to clothing consumption.

Theoretical Framework. The sustainable apparel consumer (SAC) typology was used as a theoretical framework (Karpova et al., 2023). The typology explains how two research constructs (*willingness to pay for clothing* and *importance of personal appearance*) can be used to segment sustainable apparel consumers into four groups: classy affluents, functional

minimalists, chic thrifters, and austeritics. A qualitative study, where sustainable consumers from each of the four typology groups were interviewed, identified two other key constructs to profile the four groups: importance of clothing and hedonic shopping (Karpova et al., 2022). It was also found that sustainable consumers in all four groups exhibited anti-consumption sentiments and took good care of their clothing. We used these constructs to contrast sustainable and mainstream consumers.

   Method. The study consisted of two parts. *Part 1* addressed the first objective to compare attitudes and practices of sustainable consumers and apparel consumers in general. In *Part 2,* sustainable apparel consumers were segmented following the SAC typology. Scales were adapted from previous studies to measure sustainable apparel consumption (D'Souza et al., 2015), willingness to pay for clothing, importance of appearance and clothing (Armstrong et al., 2018; O'Cass, 2000), hedonic shopping (Babin et al., 1994), clothing care (Park & Lee, 2021), and anti-consumption sentiments (Iyer & Muncy, 2016). The constructs were measured with a six-point Likert scale (1=strongly disagree, 6=strongly agree). Principal component factor analysis was conducted, and the scales' reliabilities were calculated, with Cronbach's alpha ranging from 0.66 to 0.93. A Qualtrics national consumer panel was used to collect data through an online survey. Respondents (N=1,014) were from the fifty US states and ranged in age from 18 to 65 (M=46). They were predominately female (75.4%) and white (76.8%).

Results

   Part 1. To contrast sustainable consumers with mainstream consumers, the sample (N=1,014) was divided into three groups using the mean of the sustainable apparel consumption (SAC) scale plus/minus one standard deviation (M+/– SD, or 3.12+/–1.24). The resulting three groups differed significantly in sustainable apparel consumption (F=1,545; p<.001):

-   sustainable consumers (M=5.10), n=155, had higher SAC than the other two groups,
-   mainstream consumers (M=3.12), n=696, had lower SAC than sustainable consumers but higher SAC than unsustainable consumers,
-   unsustainable consumers (M=1.27), n=163, had lower SAC than the other two groups.

ANOVA and Tuckey post-hoc tests results showed that sustainable apparel consumers had stronger anti-consumption sentiments; spent more on clothing; took better care of clothing; placed higher importance on clothing and personal appearance; and enjoyed shopping more than mainstream or unsustainable consumers (Table 1).

Table 1. Profiles of sustainable, mainstream, and unsustainable apparel consumers, N=1,014

Construct	Sustainable	Mainstream	Unsustainable	Av.	F	p

	consumers	consumers	consumers	Mean		
Willingness to pay	3.28[a]	2.86[b]	2.60[c]	2.88	18.20	.001
Importance of appearance	4.54[a]	4.25[b]	4.12[b]	4.27	6.91	<.001
Hedonic shopping	4.58[a]	4.11[b]	3.60[c]	4.10	24.31	<.001
Importance of clothing	4.68[a]	3.90[b]	3.60[c]	3.97	34.91	<.001
Anti-consumption	5.29[a]	4.24[b]	3.18[c]	4.23	162.22	<.001
Clothing care	4.21[a]	3.29[b]	2.64[c]	3.33	83.22	<.001

*Note: different superscript letters indicate significantly different mean

Part 2. Following the SAC typology, *willingness to pay* and *importance of appearance* were used to segment sustainable apparel consumers (*n*=155) identified in Part 1. K-means cluster analysis was used with the preset number of clusters (four). Four distinct clusters were obtained and compared using ANOVA and Tukey post-hoc tests (Table 2). Confirming the SAC typology (Karpova et al., 2021), austeritics and thrifters revealed a lower willingness to pay for clothing in contrast with minimalists and, especially, affluents. Affluents and thrifters placed higher importance on appearance in comparison with minimalists and austeritics. Following the typology, the four groups of SAC differed on hedonic shopping and importance of clothing. As predicted, all sustainable consumers had high anti-consumption sentiments and took good care of clothing.

Table 2. Profiles of the four **sustainable** apparel consumer groups, *n*=155

Construct	Affluent *n*=31	Austeritic *n*=36	Thrifter *n*=43	Minimalist *n*=45	Av. Mean	*F*	*p*
Willingness to pay	4.81[a]	2.34[c]	2.35[c]	3.87[b]	3.28	138.3	<.001
Importance of appearance	5.53[a]	3.22[d]	5.13[b]	4.35[c]	4.54	115.4	<.001

Hedonic shopping	5.35[a]	3.59[d]	4.53[c]	4.89[b]	4.58	14.2	<.001
Importance of clothing	5.45[a]	3.98[c]	4.67[b]	4.72[b]	4.68	12.5	<.001
Anti-consumption	5.46	5.41	5.26	5.13	5.29	1.47	.225
Clothing care	4.27	4.03	4.36	4.17	4.21	0.542	.654

Conclusions and Implications. This study advances sustainability research by testing the SAC typology using a large-scale survey and cluster analysis. It is the first study to empirically establish four distinct groups of sustainable apparel consumers. The results provide new insights on the attitudes and practices of sustainable apparel consumers and differente them from consumers in general. Segmenting sustainable apparel consumers offers practical knowledge for companies developing and marketing products.

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