



Abstract

Can Eating Behaviour Traits Be Explained by Underlying, Latent Factors? An Exploratory and Confirmatory Factor Analysis [†]

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Abstract: Eating Behaviour Traits (EBTs) are psychological constructs developed to explain patterns of eating behaviour, including factors that motivate people to (over or under) eat. There is a need to align and clarify their unique contributions and harmonise the understanding they offer for human eating behaviour. Therefore, the current study examined whether 18 commonly cited EBTs could be explained by underlying, latent factors (domains of eating behaviour). An exploratory factor analysis (EFA) was used to identify latent factors, and these factors were validated using a confirmatory factor analysis (CFA). A total of 1279 participants including the general public and members of a weight management programme were included in the analysis (957 females, 317 males, 3 others, 2 prefer not to say), with a mean age of 54 years (median = 57 years, SD = 12.03) and a mean BMI of 31.93 kg/m² (median = 30.86, SD = 6.00). The participants completed 8 questionnaires which included 18 commonly cited EBTs and the dataset was split at random with a 70/30 ratio to conduct the EFA (n = 893) and CFA (n = 383). The results supported a four-factor model which indicated that EBTs can be organised into four domains: reactive, restricted, emotional, and homeostatic eating. The four-factor model also significantly predicted self-reported BMI, weight change and perceived stress. Future research should test whether this factor structure is replicated in more diverse populations, and including other EBTs, to advance these domains of eating as a unifying framework for studying individual differences in human eating behaviour.

Keywords: eating behaviour; obesity; reactive eating; restricted eating; homeostatic eating; emotional eating

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Data Availability Statement: Data and code for this study will be made available on request. The corresponding author has full access to the data reported in the manuscript.

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