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### Authors

Hussain, Alina Hsiao, Yaling

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#### What can language tell us about anxiety: A novel emotion Stroop task

Alina Hussain

University of Birmingham, Birmingham, United Kingdom

Yaling Hsiao

University of Birmingham, Birmingham, United Kingdom

#### Abstract

A plethora of research has identified that undergraduate students experience higher levels of general anxiety disorder (GAD) with questionnaires primarily being used diagnose students. However, the potential for linguistic analysis and the emotional Stroop test as measurements of GAD remains unexplored, especially if both were to be used together. The present study aimed to produce a novel measure of GAD using both linguistic measures and the emotional Stroop task. This research study employed a quantitative approach and an experimental research design. A volunteer sample of 17 undergraduate students completed an online questionnaire, a written task, and an emotional Stroop task distributed via social media and the University of Birmingham Research Participation Scheme. This study produced a novel questionnaire for GAD and was utilised as a baseline measure. This study used two independent T-tests to measure the overall sentiment of written responses of participants and the frequency of first-person singular pronouns in written response. Additionally, two independent T-tests were used to measure reaction times and accuracy on the emotional Stroop Task. The findings highlighted no statistical differences between higher and lower levels of GAD and linguistic responses and reaction times and accuracy on the emotional Stroop test, suggesting that the measures utilised in the present study may not be able to predict GAD. As such, the findings of this study underscore the complexity of GAD and extend our understanding of GAD measurements. By illuminating the emotional, behavioural and cognitive factors of GAD, this study advocates for more awareness in university settings and proactive support for undergraduate students.

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