

Engagement and Motivation in Alcohol Purchasing Behavior Change

Applying Response Models on AI Driven Platforms

Eszter Vigh

Digital Health and Care CDT, Bristol Interaction Group, Tobacco & Alcohol Research Group, University of Bristol,
eszter.vigh@bristol.ac.uk

The challenge facing motivation and engagement in alcohol intervention is facilitating responses of those without high levels of self-relevance and self-efficacy. Addressing maladaptive responses in those who are motivated to change their behavior but lack the capability of engaging with an intervention. AI powered data sets have the power to increase the self-relevance by way of predicting purchasing behavior whereas self-efficacy comes from a precision medicine angle of targeting the motivators.

CCS CONCEPTS • HCI theory, concepts and models • Web-based Interaction • Specialized Information Retrieval

Additional Keywords and Phrases: alcohol purchasing behavior, choice architecture, behavior change techniques

1 ALCOHOL PURCHASING BEHAVIOR ON DIGITAL PLATFORMS

The recent reports on the impact of COVID-era changes to alcohol purchasing and consumption behavior prove there is not a lack of data surrounding alcohol related behavior [1]. The disconnect comes from the utilization of the data in relevant areas to facilitate behavior change and encourage individuals to take an active role in their healthcare prior to starting on a clinical pathway for alcohol use disorder or an illness associated with excessive alcohol consumption. Considering existing response models, there is an understanding of how responses must change to lead to an adaptive response. The ultimate success of any intervention is the level of engagement across time.

Current interventions widely available in the UK is the Drink Less app, but there is a commonly cited concern around the relevance of the data a specific user's drinking is compared to [2]. The aspect of self-relevance is the difference between a non-response and an adaptive response in the case of the response model presented (Appendix 1). The data provided as comparison needs to reflect a group of individuals that the user themselves recognizes themselves as a member of. By grounding the claims around drinking behavior in a group that the user self-identifies as being a part of, there is a greater degree of personalization that is possible.

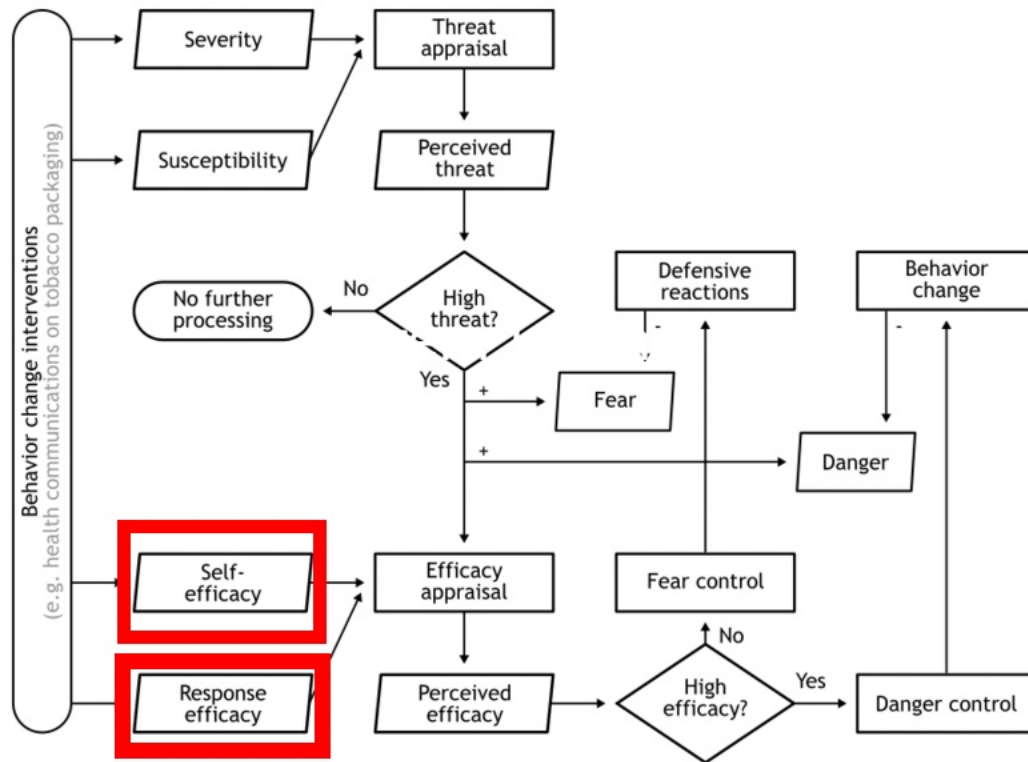
Clinicians in this case have little engagement with the pre-clinical population that seek to explore these technologies, the sourcing of the shopping data from online retailers is something that causes motivational issues for stakeholders outside of the medical space. For those retailers offering alcohol for purchase, the goal is to continue making profit from the good sold to the public. The product offerings change in line with demand, motivating online-retailers with regards to alcohol with current consumption levels would require a degree of policy intervention. The cost to the retailer is financial if sharing the data with clinicians leads to shoppers selecting alternative shopping platforms or if they do continue shopping there, the concern is more around the net spending value decreasing.

REFERENCES

- [1] Angus, C., Henney, M., & Pryce, R. (2022, July 26). Modelling the impact of changes in alcohol consumption during the COVID-19 pandemic on future alcohol-related harm in England. University of Sheffield, School of Health and Related Research. Sheffield: University of Sheffield.
- [2] West, R. (2015, July 31). Drink less. App Store. Retrieved February 12, 2023, from <https://apps.apple.com/gb/app/drink-less/id1020579244?see-all=reviews>.
- [3] Peters, G.-J. (2018). Illustration of the Extended Parallel Process Model. Wikipedia. Retrieved February 27, 2023, from [https://upload.wikimedia.org/wikipedia/commons/7/76/Extended_Parallel_Process Model.png](https://upload.wikimedia.org/wikipedia/commons/7/76/Extended_Parallel_Process_Model.png).

A APPENDICES

A.1 Appendix 1



Extended Parallel Process Model demonstrating interest/capability [3].