

## Know Your Limits: Labelling Interventions to Reduce Alcohol Consumption

April 2018

### Key findings

- There is relatively high support for alcohol labelling interventions, including calorie, unit and to a lesser extent, health warning labelling.
- Unit and calorie labels which put this information in the context of guideline amounts are preferred among consumers. These labels also increase drinkers' knowledge of the concept of units.
- Health warnings that present the negative consequences of drinking, including cancer, may have the biggest impact on drinking behaviours.

### Researchers

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### Background

The overall purpose of this research is to address the European Parliament's call for 'clear, concise and effective information on the effects of alcohol consumption and its health risks'.<sup>1</sup> In 2011, the alcohol industry pledged to place clear labelling on at least 80% of products. However a recent report has found that the industry has fallen short of this target both in terms of the extent and quality of this voluntary labelling (Institute of Alcohol Studies, 2015).<sup>2</sup> Statutory regulation may be the only feasible method of ensuring alcohol labelling is clear and consistent across all producers.<sup>3</sup>

There is a lack of research on the effectiveness of alcohol labelling interventions (i.e. unit, calorie and health warning information) for providing improved consumer information, or in terms of reducing harmful alcohol consumption (Hollands et al., 2013).<sup>4</sup>

In the two studies reported here, we examined how alcohol labels influence attitudes and beliefs towards drinking, behavioural intentions and alcohol choice behaviours. We also examined whether there are any unintended consequences of presenting this information.

### Methods

Using two online studies, we examined the impact of calorie, unit and health warning labelling on knowledge, attitudes, beliefs, intentions and behaviours related to alcohol.

Study 1 was an online public survey of 450 alcohol consumers. We investigated what information should be provided on alcohol labels, including the optimal presentation of health warnings, calories and units, and how delivery methods impact on attitudes, intentions and behaviours.

The primary research questions were:

1. What is the public's current knowledge regarding the strength (i.e., alcoholic unit content), calorie content and health risks of alcohol?
2. What impact does viewing calorie, unit and health warning information have on knowledge, attitudes, beliefs, intentions and behaviours?

3. What are the unintended consequences of this information?
4. To what extent are calorie, unit and warning labelling interventions supported by the public?

Study 2 was an online experiment investigating accuracy in assessing conceptual understanding of units. Participants (n = 1884) were randomised to one of four groups, each given different methods of describing alcohol content:

1. Basic alcohol by volume (ABV) percentage, which is the legal requirement for all alcoholic drinks
2. Total units per bottle, which are used in the alcohol industry Responsibility Deal
3. Units per serving, alongside percentage of the weekly low-risk guideline amount, following the example of voluntary food labelling schemes.
4. A novel pie chart design that displays units as a proportion of the weekly low-risk guideline amount.

In the second task, participants were randomised to groups shown one of eight health warning label conditions (where the health warnings varied in their specificity, framing and health message). Participants completed a series of questions regarding this warning, and motivation to drink less was the primary outcome measure. Support for alcohol labelling policies before and after the experiments was also assessed.

The primary research questions were:

1. What is the best method of presenting unit information?
2. What is the best method of presenting health warning information?

## Findings

In Study 1, over a third of participants said that warnings about the risk of liver disease, driving accidents, harm to an unborn child when pregnant and cancer would make them drink less. In comparison, warnings about dependence and injury were less likely to be rated as effective. When asked about the role alcohol plays in certain health conditions, there was more awareness of those conditions which have been the subject of previous campaigns (e.g. drink driving injuries and risks when pregnant), compared to others that have not (e.g. cancer, mental health and fertility problems). In Study 2, we found that participants reported higher motivation to drink less when viewing both cancer messages and negatively framed messages.

Across both Studies 1 and 2, we found that alcohol consumers have a poor understanding of the concept of units and are inaccurate in their estimations of the number of calories in alcoholic beverages. Our tests suggested that labels which put both calorie and unit information in the context of guidelines are most effective. They also suggested that labels should give consumers information about the unit and calorie content of a single serving in addition to the entire bottle.

We found some evidence that unit and calorie labelling may lead to changes in drinking behaviour, although only among a small number of respondents. More strikingly, we also found evidence that unit information may be used to facilitate heavier drinking among some consumers.

## Implications

The general public have a poor understanding of the calorific and alcohol content of the alcoholic beverages they consume. We found evidence that better presentation of unit information increases understanding, although there may be some unintended consequences in terms of behavioural response. This suggests health information should be included alongside unit information.<sup>5</sup> These health messages might describe the link between alcohol consumption

and a number of conditions, including cancer.

Increased support for health labelling policies was related to more positive responses to health warnings.

## Conclusion

Alcohol labelling provides a relatively low-cost, population-level approach to providing consumers with information about the content and potential harms related to alcohol consumption. In both Studies 1 and 2, we found relatively high levels of support for alcohol labelling interventions, although support for health warnings was lowest. Increased support for health labelling policies was related to more positive responses to health warnings.

Our research suggests that a comprehensive alcohol labelling policy should consider a broad range of message content and formatting in order to maximise reach. We have developed and tested a range of novel designs for presenting unit and calorie information.

Future research should identify how to most effectively communicate information about alcohol content and harms to at-risk groups. Hospital admissions related to alcohol disproportionately occur among people from lower socioeconomic backgrounds and awareness of the low-risk guidelines are also lower among this demographic of drinkers. This highlights the need to target improvements in health literacy to address health inequalities increased through alcohol use.

## Further Information

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## References

<sup>1</sup> European Parliament Resolution of 29th April 2015 on Alcohol Strategy, para 40. <http://bit.ly/2tMZoGd>

<sup>2</sup> Institute of Alcohol Studies (2015) Dead on Arrival? Evaluating the Public Health Responsibility Deal for Alcohol. <http://bit.ly/1NEdWK1>

<sup>3</sup> See also Royal Society for Public Health (2018). Labelling the point: towards better alcohol health information. <http://bit.ly/2tXAW5d>

<sup>4</sup> Hollands, G. J. et al. (2013) Altering micro-environments to change population health behaviour: towards an evidence base for choice architecture interventions. *BMC public health*, 13, 1218

<sup>5</sup> Martin-Moreno, J.M. et al. (2013) Enhanced labelling on alcoholic drinks: Reviewing the evidence to guide alcohol policy. *European Journal of Public Health* 23.6.

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