

Letter to the Editor

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Compulsory calorie-labelling of menu items is not a panacea for the obesity epidemic. A response to 'Compulsory calorie labelling of foods' by Nikolaou and Lean

Madam

I thank Charoula Nikolaou and Michael Lean⁽¹⁾ for their response to the commentary 'Food for thought: obstacles to menu labelling in restaurants and cafeterias'⁽²⁾. However, I believe that they present an overly simplistic and rather naïve critique. I agree that restaurants and other food outlets have a responsibility to help consumers make more informed choices, but it would be a mistake to expect too much of menu labels alone⁽³⁾; they are no panacea when it comes to solving the obesity epidemic. There are incentives for menu labelling to make changes for public good and these are well publicized. Less well publicized are the barriers that many restaurants face when attempting to implement menu labelling.

As the authors point out, one of the main obstacles to menu labelling among restaurateurs seems to be not knowing how to calculate calorie contents and so collaboration with nutrition/dietetic staff is valuable. Restaurants can hire dietetic consultants or companies to conduct menu analysis on their behalf but according to the US Food and Drug Administration, services range from \$US 25 per item to \$US 100 for more complicated items⁽⁴⁾. These costs are hardly insignificant when menu items are updated or changed frequently. Many restaurants change their menus seasonally to take advantage of fresh-from-the-field fruits and vegetables. Based on Food and Drug Administration figures this could cost anywhere in the region of \$US 1500–6000 per year for menu analysis alone, assuming a modest fifteen-item menu and four seasonal menu changes. According to the Center for Science in the Public Interest⁽⁴⁾, menu analysis software in the USA can be purchased for as little as \$US 200, but this does not take into account the ongoing costs associated with staff training or the time required to perform the analysis. Indeed, most 'recent evidence and current experience' from a feasibility study in Canada⁽⁵⁾ exploring menu labelling showed that menu labelling is highly resource-intensive for small independent restaurants. There are a few free-use websites, but according to Aronson⁽⁶⁾ they are not the best choice because many are not up to date or accurate. She further argues that it is important to know the limitations of nutrient analysis software and know how to manage unforeseen situations such as variability in ingredients, lack of standardized recipes, ingredient substitutions, how different cooking

methods impact outcome, adjusting the analysis for changing portion size, missing ingredient information, accounting for hard-to-calculate methods of preparation and ingredients such as deep frying, converting correctly between weight and volume and calculating losses due to cooking, and so on. I would continue to argue therefore that cost, time and lack of expertise are likely to deter many small independent restaurants from labelling their menus voluntarily.

Nikolaou and Lean⁽¹⁾ argue that independent restaurants are receptive to menu labelling. They discuss the results of an earlier study they conducted at two independent catering facilities at the University of Glasgow⁽⁷⁾. The intervention itself led to a drop in the sales of high-calorie items once calorie labelling was introduced. Nikolaou and Lean⁽¹⁾ report that the caterers perceived this as a positive outcome and responded to it with the reformulation of some items. There are several points to consider here. No doubt there are caterers out there who are receptive to the idea of menu labelling. However, the catering contractors in the cited study may be an unreliable source when considering their willingness to take part and their views concerning the acceptability of the intervention. Did they take part because they were genuinely receptive to the idea of calorie labelling or because there was a conflict of interest given that the study had been approved and led by researchers at the University? After all, they were trading on University premises. By the researchers' own admission, it is unusual to obtain agreement like this from caterers⁽⁷⁾. Thus the intervention sites chosen for the study open up the possibility for bias in the results. Regarding the effect of calorie labels on food sales, the intervention suffers from a number of limitations. For example, administering a questionnaire evaluating customers' views and use of labels during the intervention period may have contributed to the results by prompting calorie-label use. What is more, studies have found significant disparities among customers who use calorie labels^(8,9). For example, Green *et al.*⁽⁹⁾ report that educated individuals are more likely to use calorie labels than less educated individuals, so the generalizability of Nikolaou *et al.*'s results⁽⁷⁾ to a wider population is questionable. The association between education and label use is not surprising given that educated individuals are more likely to have healthy behaviours and better health outcomes, including a lower BMI^(10,11). Indeed, Nikolaou *et al.*⁽⁷⁾ report that the calorie labels were mostly used by normal-weight young females. This suggests that calorie labelling may not target those in

most need of intervention; instead they preferentially influence the behaviour of those who are already healthy⁽³⁾. For those already overweight or obese alternative public health strategies may need to be developed. Finally, the 'willingness' of caterers 'to review their recipes' reported by Nikolaou *et al.*⁽⁷⁾ does not constitute the actual reformulation of items as suggested by Nikolaou and Lean⁽¹⁾.

Nikolaou and Lean⁽¹⁾ argue that 'customers who notice calorie labels at food outlets consistently go for lower-calorie choices, ordering meals and snacks with 519 kJ (124 kcal) less'. They base this on the results of a meta-analysis⁽¹²⁾ that included two studies; one of which found a reduction in calories purchased for women but not for men. This is hardly consistent; more research is needed to examine the effects of calorie labels among those who report noticing them. Even so, Nikolaou and Lean⁽¹⁾ argue that calorie labels must be large and prominent, but one of the main obstacles to menu labelling among restaurateurs was finding space on menus that are already overcrowded, especially when there are several item/recipe variations⁽²⁾. Even when calorie labels are posted prominently on menu boards, only 64% of customers report seeing the information and only 27% actually use it⁽¹³⁾. Similar results were reported by Green *et al.*⁽⁹⁾, but this time only 16% of respondents used the information for food or beverage purchases; simply noticing the calorie menu labels in their study was not associated with purchasing fewer calories. Evidently there is a large discrepancy between those who notice and those who use calorie information. One explanation for the wide gap could be that restaurant patrons are looking for a quick lunch or a way to celebrate a special occasion, in which case concerns about calorie content may not be a priority. In fact, some people simply do not want nutrition information when eating away from home. Indeed, Nikolaou *et al.*⁽¹²⁾ report in an earlier study that over half of the participants they surveyed did not want or were ambivalent to the provision of calorie labelling in catering outlets. Finally, consumers in quick-service restaurants tend to be hungry and in a hurry and thus may be more short-sighted and less motivated to process menu labels⁽¹⁴⁾. Even when menu labels are large and prominent they can go unnoticed. Psychologists refer to this as 'change blindness'. To add to this, Balci and Dunning⁽¹⁵⁾ have shown that people's motivational states influence the processing of visual stimuli, guiding what the visual system presents to conscious awareness. In other words, consumers may need to be motivated, for example by having a health goal, in order to perceive the information in the first place.

Despite all this, menu labelling can help some consumers make more informed food choices and even encourage restaurants and catering outlets to take greater responsibility for the nutritional quality of the food they serve. Perhaps some businesses would even benefit by providing nutrition information voluntarily to calorie-conscious consumers. However, we cannot ignore the

fact that many restaurants still perceive several obstacles to menu labelling which impede the likelihood of voluntary participation. Recent evidence suggests that menu labelling is highly resource-intensive for independent restaurants⁽⁵⁾, can be expensive⁽⁴⁾ and may not be effective in changing people's food choices, especially those who are already overweight or obese^(7,12).

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Erica Thomas

Faculty of Education, Health and Wellbeing
University of Wolverhampton
City Campus, Nursery Street, Wolverhampton
WV1 1AD, UK
Email: Erica.Thomas@wlv.ac.uk

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