



Research to Support the Development of a Healthy Beverage Initiative at UBC Okanagan

EXECUTIVE SUMMARY

Prepared by: Morgan Alford *BSc (Hons), VOICE 4 Co-Researcher, UBC Sustainability Scholar 2018*

Prepared for: Joan Bottorff *PhD, RN, FCAHS, FAAN, Institute for Healthy Living and Chronic Disease*

Introduction

UBC demonstrated its commitment to promoting holistic wellness amongst campus community members, within a healthy and sustainable campus environment, by signing the *Okanagan Charter: An International Charter for Health Promoting Universities and Colleges (2015)*. The Okanagan Charter guided the collaborative development of the *UBC Action Framework for a Nutritionally Sound Campus (2017)* to enhance the potential of UBC as a wellbeing-promoting institution and increase community members' control over their health. More specifically, this action framework mandated that UBC support the development of nutritional skills and knowledge amongst campus community members, in addition to increasing their intake of safe, healthy and sustainable food. As a strategy to fulfill this call to action, UBC is planning a Healthy Beverage Initiative (HBI), through which campus community members will be encouraged to choose healthier beverages (including water) rather than unhealthy alternatives such as sugar-sweetened beverages (SSBs).

The Centre for Disease Control and Prevention defines SSBs as “any liquids that are sweetened with various forms of added sugars like brown sugar, corn sweetener, corn syrup, dextrose, fructose, glucose, high-fructose corn syrup, honey, lactose, malt syrup, maltose, molasses, raw sugar, and sucrose” (CDC, 2017). Focusing on SSBs in the university setting is important because youth and young adults report the highest intake of SSBs in the Canadian population (Public Health Agency of Canada, 2016). Moreover, SSBs are a primary dietary factor associated with the development of obesity and type 2 diabetes. Consumption of sugary beverages increases susceptibility to chronic disease because free sugars add calories and replace essential nutrients in the diet (Brisbois et al., 2014). In fact, an average of 184 000 deaths are attributed to high added sugar intake each year (Acton & Hammond 2017). As such, the World Health Organization recommends that children and adults consume less than 10% of their daily calories in the form of added sugars (WHO, 2015).

Since people tend to consume what is available to them, phasing out the sale of SSBs at UBC and expanding the range of healthier drink options via a HBI will enable campus community members make healthier beverage choices. Preliminary results obtained by the *Perceptions of Sugar-Sweetened Beverages Survey* administered at UBC Vancouver indicates that community members desire increased availability and marketing of healthier beverages. There is evidence that the beverage choices are influenced by the “food environment,” which is characterized by the variety, price and quality of food and beverage options present at the consumer level (National Collaborating Center for Environmental Health, 2015). The Okanagan campus is unique in its setting and food environment. There is a need,



therefore, to gather comparable information on the Okanagan campus. Herein, Campus Health VOICE team provide a preliminary report on the administration of the *Perceptions of Sugar-Sweetened Beverages Survey* at UBC Okanagan. The final results from this project will inform HBI implementation and guide the development of strategies that specifically enhance UBC Okanagan’s environment.

Methodology

The VOICE methodological framework guided the study (i.e. community-based participatory action research (CBPAR) methods, settings-based health promotion strategies and student/non-student partnerships, see Figure 1).



Figure 1. The VOICE methodological framework used to guide Campus Health research.

CBPAR encompasses research, education and action in addition to involving an ongoing process of methodological refinement (Minkler & Wallerstein 2003). The design evolves through negotiation and dialogue between researchers and community members, who function as co-researchers, in an egalitarian team (see Figure 2). CBPAR complements and strengthens the action strategies of setting-based health promotion, enabling the research team to explore changing determinants of health and interactions in communities more thoroughly (Satcher 2005).



Figure 2. The collaborative CBPAR design to promote engagement across sectors.

In our study, students and non-students (i.e. faculty, administrators, and staff) were engaged as co-researchers in a healthy campus environment development process. Previous work on campus has laid the "partnership" groundwork and confirmed the feasibility of the approach. The research team



comprises a multidisciplinary team of faculty, senior administrators, university department managers, campus business people and students. The structure of the research team enables members of the campus community to become co-researchers for periods of time, according to their interests and areas of expertise. The study protocol was approved by the UBC Okanagan Behavioural Research Ethics Board.

To date, this CBPAR project has involved phases of engagement and preliminary campus community assessment/ issue identification using a modified version of the *Perceptions of Sugar-Sweetened Beverages Survey*. Minor modifications were made to better suit the UBC Okanagan environment. The survey includes questions to gather perceptions about and consumption patterns related to various beverages. Respondents are invited to provide feedback on a variety of strategies to promote healthy beverage choices. The survey also includes demographic questions. All students and other non-student members of the campus community are eligible to participate in the survey. The survey is being administered in two phases with data collection in June and September. In June 2018, 438 campus community members (341 undergraduates (81.4%), 38 graduates (8.4%), 37 staff (8.2%), 15 faculty (3.3%), 4 post-doctoral fellows (0.9%) and 3 others (0.7%)) completed the survey. Preliminary data analysis included descriptive statistics for quantitative data and content analysis for responses to open ended questions.

Findings from the survey will be used to guide the development of the HBI on the Okanagan campus and future phases of this research. These phases will include planning, taking actions, reflecting, renewing and sustaining (adapted from Ridley et al., 2004; Healthy Communities: The Process, Province of BC, 1989).

Conclusion and Recommendations

Key engagement results are not included herein since the study is ongoing. Nonetheless, the following interim recommendations pertaining to the implementation of an HBI on UBC Okanagan's campus are brought forward from consultations with campus community members:

- Provide healthy alternatives to SSBs at competitive prices in all food outlets and vending machines.
- Install more complimentary water-bottle refilling stations and improve the maintenance of existing water stations to address concerns about poor quality water.
- Investigate accessibility to quality drinking water in campus residences.

Moreover, to enhance recruitment of survey participants in phase 2 it is suggested that emails be sent to professors who earlier in the semester to improve the likelihood of their availability for survey advertisement/completion in class.

UBC has the unique opportunity to be the first post-secondary institution in Canada to implement a HBI. With this initiative UBC will show leadership in its commitment to the Okanagan Charter and demonstrate an important step in meeting the goals of UBC's Strategic Plan to effect change in wellbeing on our campuses, and provide an environment conducive to sustainability.



References

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