

Profit Versus Public Health: The Need to Improve the Food Environment in Recreational Facilities

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ABSTRACT

Despite their wellness mandate, many publicly funded recreational facilities offer primarily unhealthy foods. Governments have developed programs and resources to assist facilities to improve their food offerings, however the challenge to incent preferential sale of healthier foods remains substantial. In the Canadian province of Alberta, uptake of government-issued voluntary nutrition guidelines for recreational facilities has been limited, and offers of free assistance to implement them as part of a research study were not embraced. Financial constraints appear to be the most important barrier to offering healthier items in Alberta's recreational facilities, as facility and food service managers perceive that selling healthier foods is unprofitable and might jeopardize sponsorship agreements. Mandatory government regulation may therefore be required to overcome the barriers to offering healthier foods in this setting. The advantages of a regulatory approach appear to outweigh any disadvantages, with benefits for population health, more effective use of public funds, and greater equity for the public and industry. Adverse effects on corporate profitability and freedom of choice are expected to be limited. Regulation may offer an efficient, effective and equitable means of ensuring that recreational facilities support child health and do not undermine it by exposing children to unhealthy food environments.

KEY WORDS: Nutrition policy; obesity; public health; food industry; child; recreation

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A growing body of literature documents the problem of the ubiquitous availability of unhealthy foods in recreational facilities¹⁻⁶ and other sport settings.⁷ This is of concern because unhealthy food environments negatively impact children's dietary behaviours and body weights.⁸⁻¹⁰ To address this problem, several Canadian provinces have developed formal nutrition guidelines (British Columbia and Alberta), incentive-based programs (Ontario), toolkits (British Columbia, Ontario, Manitoba, Saskatchewan, New Brunswick) and other printed and online resources for the recreation sector.¹¹ Uptake of Alberta's Nutrition Guidelines for Children and Youth (ANGCY),¹² in particular, has been limited, with only 6% of facilities surveyed reporting that they had implemented them one year following their release.³ Financial constraints appear to be the most important barrier to offering healthier items in Alberta's recreational facilities, as managers perceive that selling healthier foods is unprofitable.^{4,13} Managers play a gatekeeping role in recreational facility food services, and thus it is particularly important to target their knowledge, beliefs and perceptions of nutrition guidelines.⁴

On the basis of these findings, we designed an intervention to overcome some of the barriers to offering healthier foods in recreational facilities, and specifically to stimulate uptake of the ANGCY. The study was intended to positively impact managers' knowledge, beliefs and perceptions of nutrition guidelines through: 1) participation in a one-day training session to learn about the ANGCY and strategies to offer healthier items without losing revenue, and

2) interaction, through five monthly group meetings, with other managers who were successfully using nutrition guidelines. Notably, managers were assured in advance that they would be free to decide how and to what extent to comply with ANGCY recommendations to offer healthier items within their food services. However, despite a lengthy recruiting process facilitated by provincial recreation associations (reach of >1,400 individuals) and Health Promotion Coor-

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dinators in communities across the province, the study had to be cancelled due to low enrollment.

The challenge to incent preferential sale of healthier foods in recreational facilities is clearly substantial. Although other factors such as the time commitment associated with study participation were likely influential, comments from managers who declined to participate and results from past Canadian investigations^{2-6,13-15} suggest that the barriers to study participation were primarily financially driven. Recreational facility and food service managers felt compelled to generate a profit, but perceived that selling healthier foods as part of the study would be unprofitable, and might jeopardize sponsorship agreements with beverage companies. Economos et al.¹⁶ encountered similar challenges recruiting restaurant managers into an initiative to increase availability of healthier options. By contrast, although similar barriers existed in BC recreational facilities, a pilot study of 10 facilities proceeded.⁵ It is likely that availability of seed funding and substantial implementation resources supported participation in that study, although improvements to recreational facility food environments were limited even within that supportive context.⁵

In general, voluntary guidelines have proven relatively ineffective in encouraging provision of healthier items by the food industry.¹⁷ Similarly, evidence indicates that voluntary guidelines may be ineffective in encouraging meaningful change in recreational facility food environments.^{3-5,13} Mandatory government regulation may therefore be required to ensure that recreational facilities support child health and do not undermine it by exposing children to overwhelmingly unhealthy food environments. Prior to enacting regulations, however, it is important to consider their potential positive and negative consequences to ensure a reasonably equitable distribution of costs and benefits.

Potential advantages

1) Policies mandating provision of primarily or exclusively healthier foods in recreational facilities within specific and short time frames are virtually certain to increase these foods' availability in an efficient manner, provided that policies are enforced. Such policies are associated with improved dietary behaviours and body weight in children,¹⁸ and thus regulation would contribute to important public health objectives. If enacted in multiple settings (e.g., schools, childcare, government buildings), regulations might furthermore incent food reformulation by industry,^{19,20} providing healthier default options for all consumers and yielding more widespread health benefits. By improving population health, regulations could also benefit industry by providing a productive workforce to produce and deliver the goods and services they sell, a healthy clientele to purchase them, and a productive economic climate within which to operate.

2) Currently, governments provide partial funding to recreational facilities in support of healthy living, yet actively undermine their own efforts by allowing unhealthy foods to predominate there. Regulations that increase availability of healthier items and curtail availability of unhealthy items would resolve this paradoxical conflict. Coherent policy would furthermore project a consistent message to children that healthy eating and physical activity go hand in hand.

3) Regulations are an equitable means of addressing the problem of unhealthy food environments in recreational facilities. Universal

regulations would create a level playing field for businesses that provide food services within recreational facilities, reducing the risks associated with compliance. Regulations could also help to correct the unequal distribution of costs and benefits associated with the sale and consumption of unhealthy foods, whereby the benefits primarily accrue to industry while the costs are largely borne by the public.

Potential disadvantages

1) Corporate profitability might be negatively impacted if, as industry contends, few consumers will purchase healthier items despite increased availability.¹³ In reality, however, there is no reason why selling healthier foods cannot be a profitable venture for industry. Indeed, the food industry controls the food supply, and not only responds to but actively shapes consumer demand for its products through marketing. Were it to leverage its vast wealth and resources to develop and market healthier items, it would almost certainly succeed in increasing their sale and consumption. Even scientists with comparatively limited resources have succeeded in doing so.²¹ The problem is not that healthy items are not profitable, but that industry has so far lacked the incentive to make them so.

2) While critics contend that government regulation would limit freedom of choice, given the preponderance and extensive marketing of unhealthy foods in recreational facilities, it is difficult to argue that the current environment supports free and independent food purchasing decisions. Therefore, increased or exclusive availability of healthier foods in recreational facilities would not further constrain choice, but would merely change the content of the limited choice that currently exists.

Governments regulate food to ensure its microbial safety and mandate food fortification to prevent nutritional deficiencies because society acknowledges that food choice must sometimes be curtailed to protect public health. In developed nations, morbidity and mortality attributable to unhealthy diets greatly exceed that attributable to food-borne pathogens and toxins. Therefore, just as regulations prevent industry from purposely selling and marketing foods that are unsafe for microbial reasons, so too should it not be permitted to sell and market foods that are unsafe for nutritional reasons, particularly in venues where children gather, such as recreational facilities. Failure to limit children's access to nutritionally unsafe foods constitutes a violation of society's ethical obligations to protect children.

Development and implementation of regulations

Unhealthy food environments in recreational facilities are an unintended negative consequence of policies designed to improve access to affordable physical activities by using food service revenues to partially subsidize lower user fees. Regulations are not a panacea, however judicious use of government power to regulate food availability in recreational facilities can redress the aforementioned oversight and appears advantageous. Although this discussion has focused on children, as they represent the majority of recreational facility users, adults who use recreational facilities may also benefit from regulations.

Regulations should be developed in consultation with all stakeholders, considering each sector's capacities and constraints, while being careful not to allow the economically powerful voice of industry to take precedence over public health concerns. The final

regulations should be child-focused, include robust standards for what constitutes a healthy food/beverage (i.e., standards should not merely lead to production of healthier junk foods), mandate that a high proportion of items be healthy, prohibit marketing of unhealthy foods, and ensure healthier items are affordable in recreational facilities.

Implementation of regulations will be challenging, as adults who frequent recreational facilities and industry may raise some of the aforementioned objections. It will furthermore take time to denormalize the culture of unhealthy eating that exists. Substantial implementation support will be essential to address these challenges, and regulations should be phased in over several years to provide an adjustment period.

CONCLUSION

Government regulation of food availability in recreational facilities appears to offer an efficient, effective and equitable means of aligning the financial interests of the food industry with public health goals. Clearly, these regulations will not solve the complex problem of childhood obesity. Nevertheless, each eating occasion represents an opportunity to influence health, for better or worse. The food environment within recreational facilities is part of a broader context of unhealthy food environments that reinforces a culture of unhealthy eating, detracts from efforts to reverse it, and is a source of contradictory messages. Action to improve recreational facility food environments will help facilities to achieve their wellness mandate, while contributing to a broader culture of healthy eating across societal sectors and settings.

REFERENCES

1. Chaumette P, Morency S, Royer A, Lemieux S, Tremblay A. Food environment in the sports, recreational and cultural facilities of Quebec City: A look at the situation. *Can J Public Health* 2009;100(4):310-14.
2. Naylor PJ, Bridgewater L, Purcell M, Ostry A, Wekken SV. Publically funded recreation facilities: Obesogenic environments for children and families? *Int J Environ Res Public Health* 2010;7(5):2208-21.
3. Olstad D, Downs S, Raine K, Berry T, McCargar L. Improving children's nutrition environments: A survey of adoption and implementation of nutrition guidelines in recreational facilities. *BMC Public Health* 2011;11:423-35.
4. Olstad DL, Raine KD, McCargar LJ. Adopting and implementing nutrition guidelines in recreational facilities: Public and private sector roles. A multiple case study. *BMC Public Health* 2012;12(1):376.
5. Naylor PJ, Wekken SV, Trill D, Kirbyson A. Facilitating healthier food environments in public recreation facilities: Results of a pilot project in British Columbia, Canada. *J Park & Recreation Admin* 2010;28(4):37-58.
6. Thomas H, Irwin J. Food choices in recreation facilities: Operators' and patrons' perspectives. *Can J Diet Pract Res* 2010;71(4):180-85.
7. Nelson TF, Stovitz SD, Thomas M, Lavoie NM, Bauer KW, Neumark-Sztainer D. Do youth sports prevent pediatric obesity? A systematic review and commentary. *Current Sports Med Rep* 2011;10(6):360-70.
8. van der Horst K, Oenema A, Ferreira I, Wendel-Vos W, Giskes K, van Lenthe F, et al. A systematic review of environmental correlates of obesity-related dietary behaviors in youth. *Health Educ Res* 2007;22(2):203-26.
9. Pearson N, Biddle SJ, Gorely T. Family correlates of fruit and vegetable consumption in children and adolescents: A systematic review. *Public Health Nutr* 2009;12(2):267-83.
10. Fox MK, Dodd AH, Wilson A, Gleason PM. Association between school food environment and practices and body mass index of US public school children. *J Am Dietetic Assoc* 2009;109(2 Suppl):S108-S117.
11. Andrews RL. Healthy Eating in Recreation & Sport Settings – Provincial & Territorial Scan Summary. Halifax, NS: Capital District Health Authority, 2011. Available at: <http://www.recreationns.ns.ca/wp-content/uploads/2012/05/HealthyEatingInRecSportScanSummaryFINALMay2011.pdf> (Accessed March 1, 2013).
12. Alberta Health and Wellness. The Alberta Nutrition Guidelines for Children and Youth. Edmonton, AB: Alberta Health and Wellness, 2010. Available at: <http://www.healthyalberta.com/HealthyEating/ANGCY.htm> (Accessed August 14, 2012).
13. Olstad DL, Raine KD, McCargar LJ. Adopting and implementing nutrition guidelines in recreational facilities: Tensions between public health and corporate profitability. *Public Health Nutr* 2012;1-9.
14. Vander Wekken S, Sorensen S, Meldrum J, Naylor PJ. Exploring industry perspectives on implementation of a provincial policy for food and beverage sales in publicly funded recreation facilities. *Health Policy* 2012;104(3):279-87.
15. Olstad DL, Lieffers JR, Raine KD, McCargar LJ. Implementing the Alberta nutrition guidelines for children and youth in a recreational facility. *Can J Diet Pract Res* 2011;72(4):e212-e220.
16. Economos CD, Foltz SC, Goldberg J, Hudson D, Collins J, Baker Z, et al. A community-based restaurant initiative to increase availability of healthy menu options in Somerville, Massachusetts: Shape Up Somerville. *Prev Chronic Dis* 2009;6(3):A102.
17. Sharma LL, Teret SP, Brownell KD. The food industry and self-regulation: Standards to promote success and to avoid public health failures. *Am J Public Health* 2010;100(2):240-46.
18. Foster GD, Sherman S, Borradaile KE, Grundy KM, Vander Veur SS, Nachmani J, et al. A policy-based school intervention to prevent overweight and obesity. *Pediatrics* 2008;121(4):e794-e802.
19. Angell SY, Cobb LK, Curtis CJ, Konty KJ, Silver LD. Change in trans fatty acid content of fast-food purchases associated with New York City's restaurant regulation: A pre-post study. *Ann Intern Med* 2012;157(2):81-86.
20. Bruemmer B, Krieger J, Saelens BE, Chan N. Energy, saturated fat, and sodium were lower in entrees at chain restaurants at 18 months compared with 6 months following the implementation of mandatory menu labeling regulation in King County, Washington. *J Acad Nutr Diet* 2012;112(8):1169-76.
21. French SA. Pricing effects on food choices. *J Nutr* 2003;133(3):841S-843S.

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RÉSUMÉ

Malgré leur mandat de favorisation du mieux-être, de nombreuses installations récréatives subventionnées par l'État servent principalement des aliments malsains. Les gouvernements élaborent des programmes et des ressources pour aider ces installations à améliorer leur menu, mais il demeure très difficile de les inciter à vendre de préférence des aliments sains. Dans la province de l'Alberta, au Canada, les lignes directrices volontaires publiées par le gouvernement en matière de nutrition sont peu suivies dans les installations récréatives, même lorsqu'on offre gratuitement une assistance pour appliquer ces lignes directrices, comme ce fut le cas dans le cadre d'une étude de recherche. Les contraintes budgétaires semblent être le principal obstacle à l'offre d'aliments sains dans les installations récréatives de l'Alberta; les gestionnaires de ces installations et des services d'alimentation jugent que la vente d'aliments sains n'est pas rentable et qu'elle peut compromettre les accords de commandites. Il faudrait peut-être envisager une approche réglementaire obligatoire pour surmonter les obstacles à l'offre d'aliments sains dans ces établissements. Les avantages de l'approche réglementaire (effets bénéfiques sur la santé des populations, utilisation plus efficace des fonds publics, plus d'équité pour le public et l'industrie) semblent l'emporter sur ses éventuels inconvénients. Ses effets indésirables sur la rentabilité des entreprises et la liberté de choix devraient être mineurs. La réglementation pourrait donc être un moyen efficace, efficace et équitable de faire en sorte que les installations récréatives favorisent la santé des enfants, au lieu de la miner en exposant ces enfants à des environnements alimentaires malsains.

MOTS CLÉS : politique nutritionnelle; obésité; santé publique; industrie alimentaire; enfant; loisir