



Ontario Chronic Disease Prevention Alliance

Evidence-Informed Messages: High-Risk Alcohol Consumption



For more information, please visit: www.ocdpa.on.ca

Context

The Ontario Chronic Disease Prevention Alliance (OCDPA), in consultation with external experts, has developed messages for use by individuals, groups and organizations to focus attention and promote collective action on chronic disease prevention issues and to improve the health of Ontarians. The evidence-informed messages address the following chronic disease risk factors:

- High-Risk Alcohol Consumption
- Physical Inactivity
- Poor Mental Health
- Tobacco Use/Exposure
- Unhealthy Eating

The messages use a “socio-environmental approach” (Birse, 1998) to chronic disease prevention and are framed around the central themes of “availability and accessibility”. Each of the evidence-supported messages relate to actions that can be taken as part of a comprehensive approach to support healthier living conditions and to make healthy choices the easy choice for Ontarians.

It is important to note that the messages represent a comprehensive package, all of which need to be pursued over time in order to achieve a comprehensive approach to health promotion and chronic disease prevention. Partnership and shared responsibility across sectors are needed to influence sustainable system change. Different organizations might be involved in the various aspects of the promotion, use, and action of the messages which may not occur simultaneously. In order to maximize impact, all messages are necessary.

Benefits in Advancing Key Messages

Working in parallel to advance OCDPA's evidence-informed messages can result in:

- Focused attention and action on chronic disease prevention issues;
- Strategic alignment of policy, planning and practice to support chronic disease prevention efforts;
- A shift in policy and practice to an evidence-informed, multiple-risk factor, multiple-setting approach that strengthens the chronic disease prevention agenda;
- Increase impact of chronic disease prevention efforts; and
- A comprehensive, system-wide approach to chronic disease prevention.

The production of OCDPA's evidence-informed message documents was made possible through in-kind contribution from the OCDPA membership and its stakeholders.

High-Risk Alcohol Consumption & Chronic Disease

Alcohol consumption has both positive and negative impacts on the population. For some sectors of the population, there may be health benefits such as reduction of cardiovascular disease risk. However, these health benefits are only for those aged 45 and older, and can be achieved with consuming one standard drink a day or less. Drinking above recommended levels increases the risk of developing alcohol-related disease or injury (Centre for Addiction and Mental Health, 2009).

Health-Related Consequences

Alcohol misuse is associated with over 60 chronic conditions, cancers, and types of trauma (Babor et al., 2003). Moreover, high-risk alcohol drinking is associated with neuropsychiatric conditions such as alcohol abuse and depression; gastrointestinal conditions such as liver cirrhosis; and maternal and perinatal conditions such as low birth weight and fetal alcohol syndrome (Centre for Addiction and Mental Health, 2009). Alcohol use is also a major contributor to motor vehicle accidents, violence, suicide and immediate toxic effects – such as alcoholic poisoning (Babor et al., 2003).

Prevalence

Alcohol consumption in Canada has risen 13% between 1997 and 2005, on a per capita basis (aged 15+); the percentage of people reporting having 5 or more drinks on one occasion has also increased (Statistics Canada, 1997, 1999, 2003, 2005a, 2007). Specifically, 20% of young adults (aged 18-29) reported having 5 or more drinks weekly in the past year (Adlaf et al., 2005).

Cost

High-risk alcohol consumption not only adversely affects health, but also contributes to damage within society. In Canada, several studies conducted from 1950-2000 suggested alcohol sales were associated with changes in: alcohol related mortality (Ramstedt, 2004); homicides (Rossow, 2004); traffic fatalities (Skog, 2003); and total mortality (Norstrom, 2004). The estimated cost (healthcare, law enforcement, prevention and research, productivity lost and other costs) attributable to alcohol abuse in 2002 was estimated to be \$5.3 billion for Ontario, and \$13.9 billion for Canada (Rehm et al., 2006a).

Reason for Action

Despite the growing evidence that suggest the association between high-risk alcohol consumption and disease risk, disability and costs (World Health Organization, 2002; Rehm et al., 2006b, 2009), it is still not an apparent or a high priority risk factor in most chronic disease initiatives in Canada. Action must be taken now in order to decrease the impact of its avoidable burden and costs.

OCDPA's Messages to Address High-Risk Alcohol Consumption

The OCDPA encourages the dissemination, promotion, integration and use of OCDPA's Messages to ensure consistent communication that addresses high-risk alcohol consumption. Depending on the purpose, please integrate and/or use the information provided below:

1. For Actions at the Individual Level:

Provide individuals a resource to make informed decisions about alcohol consumption.¹

- Follow the “Low Risk Drinking Guideline”², available: www.lrdg.net (Centre for Addiction and Mental Health, 2009)

2. To Influence System Level Change:

Eliminate the marketing and promotion of high-risk drinking in Ontario.

- Keep alcohol pricing in line with the current cost of living and maintain minimum price policies.
- Restrict the density and regulate the spatial location of retail alcohol outlets through local by-laws.
- Encourage the continuation of a government managed alcohol retailing system in Ontario with a health protection agenda.
- Eliminate alcohol marketing and promotion to children and youth.
- Increase the availability of screening and brief interventions and referral programs for all who drink above the Low Risk Drinking Guidelines (LRDG).
- Design and implement health promotion programs, materials, school-based curriculum, workplace wellness programs and family based interventions at the community level that address the linkages between access to alcohol, high-risk alcohol consumption and the risk of chronic disease and alcohol-related trauma.

1 Individuals need to be aware that alcohol use increases the risk of chronic disease, trauma and social problems, that level of access to alcohol is related to damage from alcohol in a society and that high-risk drinking has negative impacts on others including non-drinkers.

2 The low-risk drinking guidelines are an important resource; however they do not apply to all drinkers or situations, please refer to the guidelines for caveats and conditions.

Evidence Supporting OCDPA's Messages

1. Individual Level

Message: Follow the “Low Risk Drinking Guideline”.

This guideline was developed by a team of medical and social researchers from University of Toronto and Centre for Addiction and Mental Health. The integration of clinical expertise and best available research ensures it is evidence based and is an appropriate message to deliver to the public (Low Risk Drinking Guideline, www.lrdg.net). Individuals also need to be aware of alcohol-related risks including chronic disease, trauma and social problems (Babor et al., 2010; Alcohol and Public Policy Group, 2010) and that drinking can cause problems for others including innocent or non-drinking victims (Giesbrecht et al., in press).

2. System Level

Message: Keep alcohol pricing in line with the current cost of living and maintain minimum pricing policies.

Alcohol control policies such as excise taxes and high alcohol prices have been shown to be an effective mechanism in controlling alcohol consumption (Chaloupka et al., 2002). Among all age groups, increasing the price of alcohol was associated with the reduction of a wide range of problems such as injuries, frequency of disease, and abuse among all age groups (Chaloupka et al., 2002). Particularly, adolescents are more sensitive to this type of public policy compared to adults as they have limited disposable income (Chamberlain & Solomon, 2006).

Moreover, studies have shown excise taxes and increased alcohol prices to be more effective at reducing high-risk alcohol consumption as compared to prevention policies and programs (Wagenaar et al., 2009). Specifically, an increase of 10% in price would reduce consumption by about 1% (Xie, 2000). However, despite all this evidence that suggest increases in alcohol prices and excise taxes reduce alcohol drinking rates, actual implementation of pricing and taxation policies is infrequent (Toomey & Wagenaar, 1999). Advocating and creating a strong voice is crucial if anything is to be done about this important issue.

Message: Restrict the density (i.e. the number of outlets and bunching) of retail alcohol outlets through local by-laws.

An increase in alcohol outlet density is related to increase in alcohol consumption and alcohol related problems (Kypri, 2008). For example, studies have shown that the levels of drinking among students are significantly higher at universities where there is an higher number of alcohol outlets in relation to the proximity of university campuses (Chaloupka & Wechsler, 1996).

With a decrease in retail alcohol outlet density, it becomes inconvenient for consumers to obtain alcohol (Babor et al., 2003; 2010). Consumers would require more time and cost due to physical inavailability of alcohol outlets, which ultimately discourages them from alcohol use (Babor et al., 2003). A study found that 10% reduction in alcohol outlets is associated with a 3% reduction in alcohol sales (Gruenewald et al., 1993). Two recent reviews found a strong association between access variables, such as density of outlets and hours and days of sale, and high risk drinking as well as damage from alcohol (Popova et al., 2009; Stockwell and Chikritz, 2009).

Message; Encourage the continuation of a government-managed alcohol retailing system in Ontario with a strong health protection agenda.

There is extensive and growing evidence that the type of alcohol management system is associated with overall level of alcohol consumption and damage from alcohol (Edwards et al., 1994; Babor et al., 2003, 2010). Government-run retail systems tend to have lower density of outlets in their jurisdiction, shorter hours of sale, and greater emphasis on controlling sales to minors or intoxicated patrons (Her et al., 1999; Stockwell et al., 2009). There is also less vested interest by the store manager or staff in the government run outlets on a profit motive and thus greater willingness to accommodate a control orientation. The switch from public to private system has been associated with increased sales (e.g. Wagenaar & Langlely, 1995), and damage (e.g. Flam-Zalcman & Mann, 2007). A recent study of British Columbia focusing on partial privatization, found that alcohol sales increased most steeply in regions with the greatest increase in proportion of private outlets (Stockwell et al., 2009).

Message: Eliminate alcohol marketing and promotion to children and youth.

The association between exposure to alcohol marketing and promotion and subsequent alcohol consumption by young children and youths has been consistently supported by many studies found in literature (Smith & Foxcroft, 2009). Also, being exposed to media and commercial communications on alcohol can increase the likelihood of non-drinking adolescents to initiate drinking and already-drinking adolescents to drink even more (Anderson et al., 2009).

Therefore, policy development regarding banning alcohol advertising and promotion to children and youths must be implemented in order to decrease alcohol consumption. A strong case to support this action can be seen in a study that looked at the effect of prohibiting broadcast of alcohol advertising in over 17 different countries. Results show countries with alcohol advertising bans on beer and wine had about 11% lower alcohol consumption than countries with no bans (Saffer, 1991). These findings suggest that restrictions in alcohol advertising may be warranted.

Message: Increase the availability of screening brief intervention and referral programs for all who drink above the Low Risk Drinking Guidelines (LRDG).

Alcohol screening and brief interventions has been shown to decrease high-risk alcohol drinking (Babor et al., 2006). Evidence from randomized controlled trials from a variety of settings has consistently suggested that brief interventions contribute to significant changes in drinking behaviour (Babor et al., 2003). For example, a university health centre that screens for high-risk drinkers and subsequently provides them with a brief intervention program has shown positive results in reducing high-risk drinking (Schaus et al., 2009). Moreover, results from a secondary analysis from seven studies show that there was a 12% reduction in at-risk alcohol consumption after drinkers exposed to a brief intervention (Babor et al., 2003).

A possible limitation in providing these services is cost. However, mid-level practitioners such as nurses, has been shown to be as effective in carrying out brief interventions as physicians, leading to savings as much as 50% (Babor et al., 2006). Therefore, screening and brief interventions must be considered a priority in many areas and settings (e.g. clinics, hospitals, other health services), including those where high-risk drinking is prevalent (e.g. universities), and be made more available and accessible.

Message: Design and implement health promotion programs, materials, school-based curriculum, workplace wellness programs and family based interventions at the community level that address the linkage between access to alcohol, high-risk alcohol consumption and the risk of chronic disease and trauma.

Evidence points to the need for a comprehensive approach to address high-risk alcohol consumption at multiple settings and across the lifespan.

Targeting students during early adolescents is considered critical due to the high-risk of onset and progression of substance use during this period of time (Botvin & Griffin, 2007). Furthermore, one literature review of school-based alcohol prevention programs reported that effective programs are delivered interactively and teach skills to help young people overcome peer pressures, resist substance influences and enhance social and personal competence skills (Botvin & Griffin, 2007). Nevertheless, on balance, most evaluated school-based programs do not produce sustained desired impact on drinking behaviour, high-risk drinking or drinking-related harm (Foxcroft et al., 2002, 2003; Foxcroft, 2006; Babor et al., 2010; Alcohol and Public Policy Group, 2010). Therefore, it is important to explore new foci for information and persuasion strategies, and to consider them a supplementary rather than a primary intervention. These new foci may include using these strategies as a means to raise awareness of the environmental context of drinking and alcohol promotion -- including enhanced knowledge of damage of alcohol to society and high costs, and to increase knowledge of the impact of effective policies and interventions (e.g. Giesbrecht, 2007).

Although school settings have been the common intervention sites for information or persuasion interventions, family and community based programs have also been a prevention strategy using these techniques (Emshoff & Price, 1999). Promoting healthy behaviour through educational means, skill building, and increasing support through family and community based programs could reduce the risk factors to alcohol drinking (Emshoff & Price, 1999).

In addition, workplace programs addressing alcohol use hold great potential in reducing high-risk alcohol consumption. For example, since employees spend a lot of time at work, other colleagues are more likely to notice any alcohol-related problems and subsequently, can provide social support (Roman & Blum, 2002). Moreover, workplace programs can educate employees about the potential risk factors that arise from their jobs, such as stress and alienation (Roman & Blum, 2002).

A comprehensive approach to address high-risk alcohol consumption needs to include supply control and demand reduction interventions. The messages noted above -- by focusing attention on price, access to alcohol, control systems and advertising, as well as educational, workplace, family and community-based interventions/ programs -- could potentially provide supplementary support for more effective interventions (Babor et al., 2010).

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