RESEARCH SUMMARY
Date Compiled: November 2018

Key Takeaways from Included Research

- A spatial analysis found that higher alcohol densities in lower-income neighborhoods were the result of higher income and higher population in adjacent neighborhoods. This finding suggests that some alcohol-related harms in lower-income neighborhoods may be driven not by demand within that neighborhood, but by the demand of wealthier nearby neighborhoods.

- A model-based study in New York City found that increased alcohol taxation in large urban areas could modestly reduce alcohol-related violent victimization and income inequalities in alcohol-related violence, as well reduce overall alcohol consumption.

- Alcohol industry corporate social responsibility (CSR) activities appear to have a public relations and commercial strategic purpose but are not shown to reduce harmful alcohol use – according to an analysis of a web-based compendium of alcohol industry activities.

- Research has shown that price-related alcohol policies are important tools to reduce alcohol related harm. The optimum approach is to utilize a variety of price-related policies to achieve health-related policy outcomes.

- A large-scale analysis of individual health records from the National Health Interview Survey (NHIS) and the Veterans Health Administration (VA) determined that daily drinking, even at low levels, was detrimental to human health. The minimum risk of low-level drinking frequency for all-cause mortality found was approximately 3 occasions weekly.

LONGITUDINAL IMPACTS OF TWO CAUSAL DRIVERS OF ALCOHOL DEMAND ON OUTLET CONCENTRATIONS WITHIN COMMUNITY SETTINGS: POPULATION SIZE AND INCOME EFFECTS.

October 2018

Abstract

We analyzed counts of licensed bars, restaurants and off-premise alcohol outlets within 53 California cities from 2000–2013. Poisson models were used to assess overall space-time associations between outlet numbers and population size and median household income in local and spatially adjacent block groups. We then separated covariate effects into distinct spatial and temporal components ("decomposed" models). Overall models showed that densities of all outlet types were generally greatest within block groups that had lower income, were adjacent to block groups with lower income, had greater populations, and were adjacent to block groups that had greater populations. Decomposed models demonstrate that over time greater income was associated with increased counts of bars, and greater population was associated with greater numbers of restaurants and off-premise outlets. Acknowledging the many negative consequences for populations living in areas of high outlet density, these effects are a predictable and powerful social determinant of health.

Source:

Jin, Z., Chang, H. H., Ponicki, W. R., Gaidus, A., Waller, L. A., Morrison, C. N., & Gruenewald, P. J. (2018). Longitudinal impacts of two causal drivers of alcohol demand on outlet concentrations within community settings: Population size and income effects. *Spatial and Spatio-temporal Epidemiology, 27*, 21-28.

Related media coverage:

Medical Daily: https://medicalxpress.com/news/2018-10-long-term-effects-alcohol-demand-retail.html

ASSESSING THE IMPACT OF ALCOHOL TAXATION ON RATES OF VIOLENT VICTIMIZATION IN A LARGE URBAN AREA: AN AGENT-BASED MODELING APPROACH.

October 2018

Abstract

Aims: To use simulation to estimate the impact of alcohol taxation on drinking, non-fatal violent victimization, and homicide in New York City (NYC). We simulate the heterogeneous effects of alcohol price elasticities by income, level of consumption, and beverage preferences, and examine whether taxation can reduce income inequalities in alcohol-related violence.

Design: Agent-based modeling simulation.

Setting: NYC, USA.

Participants: Adult population aged 18-64 years in the year 2000 in the 59 community districts of NYC. The population of 256,500 agents approximates a 5% sample of the NYC population.

Measurements: Agents were parameterized through a series of rules that governed alcohol consumption and engagement in violence. Six taxation interventions were implemented based on extensive reviews and meta-analyses: increasing universal alcohol tax by 1, 5, and 10%, and beer tax by 1, 5, and 10%.

Findings: Under no tax increase, approximately 12.2% (95% credible interval [P.I.] 12.1-12.3%) were heavy drinkers. Taxation decreased the proportion of heavy drinkers; a 10% tax decreased heavy drinking to 9.6% (95% P.I. 9.4-9.8). Beer taxes had the strongest effect on population consumption. Taxation influenced those in the lowest income groups more than the highest income groups. Alcohol-related homicide decreased from 3.22 per 100,000 (95% P.I. 2.50-3.73) to 2.40 per 100,000 under a 10% universal tax (95% P.I. 1.92-2.94). This translates into an anticipated benefit of ~1,200 lives/year.

Conclusion: Reductions in alcohol consumption in a large urban environment such as NYC can be sustained with modest increases in universal taxation. Alcohol tax increases also have a modest effect on alcohol-related violent victimization. Taxation policies reduce income inequalities in alcohol-relates violence.

Source:

Keyes, K. M., Shev, A., Tracy, M., & Cerdá, M. (2018). Assessing the impact of alcohol taxation on rates of violent victimization in a large urban area: An agent-based modeling approach. *Addiction.*

IS THE ALCOHOL INDUSTRY DOING WELL BY 'DOING GOOD'? FINDINGS FROM A CONTENT ANALYSIS OF THE ALCOHOL INDUSTRY'S ACTIONS TO REDUCE HARMFUL DRINKING.
October 2018

Abstract

Objectives: The aims of this study were to: (1) describe alcohol industry corporate social responsibility (CSR) actions conducted across six global geographic regions; (2) identify the benefits accruing to the industry ('doing well'); and (3) estimate the public health impact of the actions ('doing good').

Setting: Actions from six global geographic regions.

Participants: A web-based compendium of 3551 industry actions, representing the efforts of the alcohol industry to reduce harmful alcohol use, was issued in 2012. The compendium consisted of short descriptions of each action, plus other information about the sponsorship, content and evaluation of the activities. Public health professionals (n=19) rated a sample (n=1046) of the actions using a reliable content rating procedure.

Outcome measures: WHO Global strategy target area, estimated population reach, risk of harm, advertising potential, policy impact potential and other aspects of the activity.

Results: The industry actions were conducted disproportionately in regions with high-income countries (Europe and North America), with lower proportions in Latin America, Africa and Asia. Only 27% conformed to recommended WHO target areas for global action to reduce the harmful use of alcohol. The overwhelming majority (96.8%) of industry actions lacked scientific support (p<0.01) and 11.0% had the potential for doing harm. The benefits accruing to the industry ('doing well') included brand marketing and the use of CSR to manage risk and achieve strategic goals.

Conclusion: Alcohol industry CSR activities are unlikely to reduce harmful alcohol use but they do provide commercial strategic advantage while at the same time appearing to have a public health purpose.

Source:

Babor, T. F., Robaina, K., Brown, K., Noel, J., Cremonte, M., Pantani, D., et al. (2018). Is the alcohol industry doing well by 'doing good'? Findings from a content analysis of the alcohol industry's actions to reduce harmful drinking. *BMJ Open, 8*(10), e024325.

Free full text: https://bmjopen.bmj.com/content/8/10/e024325

MULTIPLE POLICIES NEEDED TO BALANCE ALCOHOL PRICES
October 2018

According to the latest Global Status Report on Alcohol and Health by the World Health Organization, "Price policies are the most cost-effective WHO best buy for reducing the burden of harmful alcohol use." Recently, the WHO released their "Safer" Alcohol Campaign which recommends raising the price of alcohol through excise taxes and pricing policies. Experience in the UK has made it clear that you need several tools to strike the right balance. In the US, our regulatory system is aimed at prices that are not too high or too low. Too high induces bootlegging (or selling in internet black market sites) and too low induces excessive drinking.

So, what are all these policies and what are they designed to do? Here is a summary:

No sale below cost: This is the loss leader idea commonly used in supermarkets these days to entice shoppers to their store. But cut-rate prices appeal to heavy drinkers many of whom are underage.

No free alcohol: Again, this is a way to attract customers with freebies or "buy one, get one free" and encourages overconsumption.

No volume discounts: These may be advertised or given with coupons. In either case, buying more usually results in drinking more.

Same price to all and price posting: Many states require that wholesalers sell all products at the same price to all retail customers. …

Excise Tax: Raising taxes is done for two reasons. First, if the increase is passed on to the consumer, it raises the overall price. This doesn't always happen in today's markets because alcohol is now sold in supermarkets and other places with thousands of other products …

Minimum price or mark-up: Only a few states have anything like a minimum price, but it is common in Canada. Scotland recently adopted this measure because tax increases failed to curb the cheap alcohol favored by problem drinkers …

Control-state pricing: The 17 states and several local governments that own all or part of the alcohol business do control price. Generally, those states have somewhat higher prices and do not permit some practices that might encourage high volume consumption.

Happy Hour Laws: Several states have regulations for bars, restaurants and taverns that prohibit drink specials designed to encourage excessive consumption …

Source: Healthy Alcohol Marketplace

Free full text: http://healthyalcoholmarket.com/wordpress/

DAILY DRINKING IS ASSOCIATED WITH INCREASED MORTALITY
October 2018

Abstract

Background: There is evidence that low-level alcohol use, drinking 1 to 2 drinks on occasion, is protective for cardiovascular disease, but increases the risk of cancer. Synthesizing the overall impact of low-level alcohol use on health is therefore complex. The objective of this paper was to examine the association between frequency of low-level drinking and mortality**.**

Methods: Two data sets with self-reported alcohol use and mortality follow-up were analyzed: 340,668 individuals from the National Health Interview Survey (NHIS) and 93,653 individuals from the Veterans Health Administration (VA) outpatient medical records. Survival analyses were conducted to evaluate the association between low-level drinking frequency and mortality.

Results: The minimum risk drinking frequency among those who drink 1 to 2 drinks per occasion was found to be 3.2 times weekly in the NHIS data, based on a continuous measure of drinking frequency, and 2 to 3 times weekly in the VA data. Relative to these individuals with minimum risk, individuals who drink 7 times weekly had an adjusted hazard ratio (HR) of all-cause mortality of 1.23 ($p < 0.0001$) in the NHIS data, and individuals who drink 4 to 7 times weekly in the VA data also had an adjusted HR of 1.23 ($p = 0.01$). Secondary analyses in the NHIS data showed that the minimum risk was drinking 4 times weekly for cardiovascular mortality, and drinking monthly or less for cancer mortality. The associations were consistent in stratified analyses of men, women, and never smokers.

Conclusions: The minimum risk of low-level drinking frequency for all-cause mortality appears to be approximately 3 occasions weekly. The robustness of this finding is highlighted in 2 distinctly different data sets: a large epidemiological data set and a data set of veterans sampled from an outpatient clinic. Daily drinking, even at low levels, is detrimental to one's health.

Source:

Hartz, S. M., Oehlert, M., Horton, A. C., Grucza, R. A., Fisher, S. L., Culverhouse, R. C., et al. (2018). Daily drinking is associated with increased mortality. *Alcoholism: Clinical and Experimental Research.*

Free full text: https://bmjopen.bmj.com/content/8/10/e024325