Alcohol Research Update

The following is a brief summary of the some new research that has been published recently.

Vested interests in addiction research and policy. Why do we not see the corporate interests of the alcohol industry as clearly as we see those of the tobacco industry?

This article is part of the 'vested interest series' in the Addiction Journal. It compares the current status of global alcohol corporations with their tobacco counterparts in terms of their role in global governance, and to document the process by which this difference has been achieved and the consequences for alcohol control policy.

Author Prof. Sally Casswell argues that the transnational producers of alcohol have waged a sophisticated and successful campaign during the past three decade, including; sponsorship of intergovernmental events, funding of educational initiatives, research, publications and sponsoring sporting and cultural events. She notes that a key aspect has been the framing of arguments to undermine perceptions of the extent of alcohol-related harms to health by promoting ideas of a balance of benefits and harms. An emphasis on the heaviest drinkers has been used to promote the erroneous idea that 'moderate' drinkers experience no harm and a goal of alcohol policy should be to ensure they are unaffected by interventions. This leads to highly targeted interventions towards the heaviest drinkers rather than effective regulation of the alcohol market.

In conclusion the author argues that a sophisticated campaign by global alcohol corporations has promoted them as good corporate citizens and framed arguments with a focus on drinkers rather than the supply of alcohol. This has contributed to acceptance in the global governance arena dealing with policy development and implementation to an extent which is very different from tobacco. This approach, which obscures the contribution supply and marketing make to alcohol-related harm, has also contributed to failure by governments to adopt effective supply-side policies.

Casswell S. (2013). Vested interests in addiction research and policy. Why do we not see the corporate interests of the alcohol industry as clearly as we see those of the tobacco industry? Addiction, 108(4), 680-685.

A content analysis of the portrayal of alcohol in televised music videos in New Zealand: Changes over time.

This New Zealand research aimed to document the extent and nature of alcohol portrayal in televised music videos in New Zealand in 2010 and assess trends over time by comparing with a similar 2005 sample. The researchers analysed references to alcohol in 861 music videos shown on a youth-orientated television channel.

They found that overall, the proportion of alcohol content in the music videos was higher in 2010 than in 2005. The portrayal of alcohol was significantly more common in music videos where the main artist was not from New Zealand. Furthermore, in the music videos with alcohol content, at least a third of the time, alcohol was shown being consumed and the main artist was involved with alcohol. In only 2% (in 2005) and 4% (in 2010) of these videos was the tone explicitly negative towards alcohol. The researchers note that currently there are no standards as to the content of the music videos funded by NZ On Air and recommend that videos funded by the government agencies such as 'NZ on Air' should not contain any reference to alcohol, as the evidence strongly suggests this is a form of alcohol promotion that increases drinking in young people. They also recommend restricting music videos with alcohol content to only be shown late at night, as per the current policy on alcohol advertising in New Zealand.

Sloane K, Wilson N, Gunasekara FI. (2013). A content analysis of the portrayal of alcohol in televised music videos in New Zealand: Changes over time. Drug Alcohol Review, 32(1), 47-52.

Alcohol consumption by parents of Pacific families residing in New Zealand: Findings from the Pacific Islands Families Study

This Pacific Islands Families (PIF) study followed a cohort of Pacific infants. The families were followed up at 6-weeks, 1-year, 2-years, 4-years, 6-years and 9-years. Mother and father alcohol consumption was assessed using the Alcohol Use Disorders Identification Test-C (AUDIT). The research found that the prevalence estimates for harmful alcohol consumption were higher in this study when compared to the New Zealand Health Survey (2006/07). Approximately 5% of mothers declared alcohol consumption in pregnancy. A clear pattern emerged between alcohol consumption and pregnancy with harmful maternal drinking levels falling during pregnancy, increasing slightly in the 6-weeks postpartum period, and then steadily increasing in the following years. There were considerable differences in the prevalence estimates within Pacific ethnicities. They suggest that paternal drinking may exhibit a similar pattern. The researchers note that more emphasis needs to be placed on ethnic-specific services targeting and addressing parents' alcohol misuse.

Schluter PJ, Tautolo ES, Taylor S, Paterson J. (2013). Alcohol consumption by parents of Pacific families residing in New Zealand: Findings from the Pacific Islands Families Study. Alcohol. doi:10.1016/j.alcohol.2012.12.009. [Epub ahead of print]

Binge drinking among Māori secondary school students in New Zealand: Associations with source, exposure and perceptions of alcohol use.

This study analysed results of 1702 Māori secondary school students from the 2007 national youth health survey and found that 43.5% of all Māori students perceived that it was okay for people their age to drink alcohol regularly with no differences found by gender, deprivation level and urban/rural location. Senior secondary students were more likely to drink than junior students. Among current drinkers, 31.5% of students reported binge drinking (5-9 drinks) and 30.4% reported heavy binge drinking (≥10 drinks) in a 4-hour session in the past 4 weeks.

Parental alcohol use in the family home was reported by 65.5% of students. However, sourcing alcohol from parents was not associated with increased binge and heavy binge drinking. Students who bought their own alcohol or obtained from friends were significantly more likely to be binge or heavy binge drinkers.

The most commonly reported problems associated with alcohol use was: done things that could have got them into serious trouble (28.3%), being injured after drinking alcohol (27%), having unsafe sex (25.6%), having their school or work affected by their alcohol use (14.1%), injuring someone else after drinking alcohol (14.1%), requiring medical treatment for an injury (4.9%) and involvement in a car crash (3.6%).

Māori youth reported poorer access to drug and alcohol treatment services.

The researchers conclude that urgent measures are needed to reduce alcohol-related harm for young Māori drinkers, and recommend that interventions and services should be strengths-based, community focused, culturally relevant, actively engage families and schools to support equitable health outcomes for young Māori.

Clark TC, Robinson E, Crengle S, et al. (2013). Binge drinking among Maori secondary school students in New Zealand: associations with source, exposure and perceptions of alcohol use. The New Zealand Medical Journal, 126(1370), 70-84.

Alcohol: The lubricant to suicidality

Authors discuss the complex relationship between alcohol and suicide. They describe how and why alcohol "lubricates the gears to propel the act of committing suicide". In

particular they describe the available literature on the association between alcohol and suicide, alcohol's impact on the brain and propose three main mechanisms: biochemical; psychosocial and genetic predisposition. They conclude that "alcohol reduces 'barriers' for suicidality through its biochemical and psychosocial mechanisms and acts as a lubricant to suicidality". They also note that blood alcohol levels greater than 0.05% pose a high risk for suicidality.

Ali S, Nathani M, Jabeen S, et al. (2013). Alcohol: the lubricant to suicidality. Innovations in Clinical Neuroscience, 10(1), 20-29.

Lack of international consensus in low-risk drinking guidelines

The authors determined the degree of international consensus within low-risk drinking guidelines from countries around the globe. The researchers searched government websites for official definitions and intake guidelines from a total of 57 counties including New Zealand.

The researchers found that currently no international consensus exists about what a standard drink is, what low-risk alcohol consumption is on a daily or weekly basis, or what the legal BAC should be for drivers. They note that although the WHO has suggested that pregnant women and drivers should be alcohol free, and has issued some guidance on daily consumption, the goal of harmonising definitions of standard drinks and consumption guidelines has not been achieved.

They suggest a global system of units and low-risk drinking guidelines could help people to make better-informed choices about alcohol consumption.

The authors make a strong call for standardised guidelines and recommend that:

- Women should drink no more than two standard drinks per day.
- Men should drink no more than three standard drinks per day.
- Women should drink no more than 12 standard drinks per week.
- Men should drink no more than 18 standard drinks per week.
- Women and men should have at least one alcohol-free day per week.
- Motor vehicle drivers should not consume any alcohol.
- Pregnant and breast-feeding women should not consume any alcohol.

Furtwængler NAFF, de Visser RO. (2013). Lack of international consensus in low-risk drinking guidelines. Drug Alcohol Review, 32(1), 11-8.

The relationship between minimum alcohol prices, outlet densities and alcohol attributable deaths in British Columbia, 2002 to 2009.

This research investigates the relationship between minimum alcohol prices, outlet densities and alcohol attributable deaths and found that the percentage of deaths caused by alcohol in British Columbia (Canada), dropped more than expected when minimum price was increased between 2002 and 2009. A 10% increase in average minimum price for all alcoholic beverages was associated with an immediate, substantial and significant (31.7%) reduction in wholly alcohol attributable (AA) deaths. Furthermore, significant reductions in chronic and total AA deaths were detected between two and three years after minimum price increases. The authors suggest that the reason for the reduction in mortality is that increasing the price of cheaper drinks reduces the consumption of heavier drinkers who prefer these drinks.

A 10% increase in private liquor stores was associated with a 2.45%, 2.36% and 1.99% increase in acute, chronic, and total AA mortality rates.

Zhao J, Stockwell T, Martin G, et al. (2013). The relationship between minimum alcohol prices, outlet densities and alcohol attributable deaths in British Columbia, 2002 to 2009.

Addiction, Feb 2013. Accepted, unedited article published online and citable. DOI: 10.1111/add.12139.

Use of alcohol intoxication codes for serious non-fatal hospitalised injury.

This cross-sectional New Zealand study determined the extent to which ICD-10 alcohol intoxication codes were used for serious hospitalised injury; the distribution of these codes according to gender, age, injury mechanism; and the intent, severity of injury, and whether the patient was treated in an Intensive Care Unit. All injury hospital discharges from 2010 that met the specified severity criteria were included.

The researchers found that of the 10,394 discharges only 2.5% had a blood alcohol recorded and 3% were coded as being intoxicated but there was no blood alcohol code. Males were 3.4 more times likely to have a blood alcohol code and 5.2 times more likely to be subjectively assessed only as being intoxicated. The more severe the injury was, the more likely there was to be an alcohol code. Assaults had the highest proportion of cases with an alcohol code. The researchers suggest that the infrequent use of alcohol codes is likely due to under-coding of alcohol intoxication assessment, no routine determination of alcohol intoxication as there are no agreed protocols for doing so in New Zealand.

Langley J, et al. (2013). Use of alcohol intoxication codes for serious non-fatal hospitalised injury. Injury, http://dx.doi.org/10.1016/j.injury.2012.11.021 *[Epub ahead of print.*

Patron offending and intoxication in night-time entertainment districts (POINTED).

This study was conducted in night-time entertainment district of 6 cities in Australia. The study investigated the levels of intoxication of people in and around licensed venues; the relationship between time of evening, duration of drinking episode and level of intoxication and harmful or risky behaviour, and harmful or risky behaviour and the relationship between illicit drugs, energy drinks and alcohol.

Authors report that alcohol remains the driver of most harm in the night-time economy (NTE).

The authors recommend a number of possible directions and practical proposals for policy and practice.

Miller P, et al. (2013). Patron offending and intoxication in night-time entertainment districts (POINTED). Monograph Series No. 46. Canberra: National Drug Law Enforcement Research Fund (NDLERF). Full report: http://www.ndlerf.gov.au/pub/Monograph_46.pdf

Using Public Health and Community Partnerships to Reduce Density of Alcohol Outlets.

Authors suggest that despite the knowledge, many public health professionals find it challenging to work with local authorities to implement evidence-based strategies to regulate alcohol outlet density. They discuss ways in which states and localities can reduce alcohol outlet density such as by limiting the number of alcohol outlets per specific geographic unit or per population; or establishing a cap on the percentage of retail outlets per total businesses in a specific area; and limiting alcohol outlet locations and operating hours. In addition, they suggest that localities may use land-use powers to limit, deny or remove permission to sell alcohol from existing outlets.

The authors cite an Action Guide, '*Regulating Alcohol Outlet Density*' and discuss steps that community coalitions and public health departments can take to inform and educate policy makers.

Jernigan DH, et al. (2013). Using Public Health and Community Partnerships to Reduce Density of Alcohol Outlets. Prev Chronic Dis;10:120090. DOI: http://dx.doi.org/10.5888/pcd10.120090. Full article: http://www.cdc.gov/pcd/issues/2013/12_0090.htm