

## Contents

Vol. 60, No. 2 September 2022

(Click on an item/ page no. to be taken directly to your choice of article)

**News from around the world****Medical News**

Alcohol consumption and health outcomes among 70 year olds in Sweden

Smoking is positively related and alcohol consumption is negatively related to an increased risk of Meniere's disease

Diet change may make biggest impact on reducing heart risk in people with hypertension

Meta-analysis of alcohol consumption and venous thromboembolism

Red wine improves cardiovascular function and oxidative stress of the hypertensive-SHR and diabetic-STZ rats

Association of change in alcohol consumption with risk of ischemic stroke

A longitudinal evaluation of increasing or lowering alcohol intake throughout adulthood and colorectal cancer risk

Do we know what moderate alcohol consumption is? The particular case of beer

The relationship between alcohol use and dementia in adults aged more than 60 years

Association between changes in alcohol consumption and cancer risk

The melatonin contained in beer can provide health benefits

Associations between alcohol consumption and HDL subspecies

Associations of combined healthy lifestyles with cancer morbidity and mortality among individuals with diabetes

Is alcohol consumption associated with a lower risk of cardiovascular events in patients treated with statins?

Covid-19 and alcohol associated liver disease

**Social and Policy News**

Risk factors for problematic drinking in one's thirties and forties

Patterns and predictors of high-intensity drinking and implications for intervention

Drinking among university students with a history of reading difficulties

2	Study comparing behaviours of e scooter drivers and cyclists in Norway	
3	Attention bias and alcohol craving: Differential effects via biological sex and mood	16
7	The impact of lower-strength alcohol products on alcohol purchases by Spanish households	
7	Health and household environment factors linked with early alcohol use in adolescence	17
8	Developing an alcohol and other drug serious game for adolescents: considerations for improving student engagement	
9	Smoking Drinking And Drug Use In England	18
	Low calorie alcohol retailer Drinkwell secures £1m funding	19
10	Scotland to consider restricting alcohol promotions	
	Offenders targeted as part of Scottish drink and drug drive campaign	
	Spiking: what universities can do	
	Student designed and informed campaign to #endspiking & promote safer nights out for freshers	20
11	Evidence on food information – Empowering consumers to make healthy and sustainable choices	21
12	Heineken Ireland partners with Free Now to encourage responsible drinking	
12	Proposed guidelines for alcohol consumption in Canada	22
	Monitoring the Future panel study annual report	23
13	Mandatory energy labelling in Australia and New Zealand	24
	Alcohol.Think Again One Drink campaign showing impressive results	
	A world history of women and alcohol	
14	Gen Z: Drinking less, but what about alcohol-related harm?	25
	Isle of Man changes measure sizes for alcohol	
	The proportion of Australians who drink alcohol falls in the past year	
	Global Healthy Ageing and Prevention Index to be launched to track progress and drive action on healthy ageing	26
15	2022 MCA Symposium on Alcohol & Health	
	The Northwest Territories' liquor laws	
	The Art of Drinking campaign	

**AIM Digest**  
**Frampton House**  
**Frampton, Dorchester**  
**Dorset DT2 9NH**  
 T: +44 (0)1300 320 869  
 E: [info@aim-digest.com](mailto:info@aim-digest.com)

**Websites:**

[www.alcoholinmoderation.com](http://www.alcoholinmoderation.com)  
[www.drinkingandyou.com](http://www.drinkingandyou.com)  
[www.alcoholresearchforum.org](http://www.alcoholresearchforum.org)

**AIM Subscription Levels:**

**Individual:** GBP 900-  
 USD 1,250-  
 Euro 1000-

**Silver:** GBP 1,500-  
 USD 2,500-  
 Euro 2,000-

**Gold:** GBP £3,000-  
 USD 5,000-  
 Euro 4,000-

**Platinum:** available on request.  
 Please contact [Zoe.westwood@aim-digest.com](mailto:Zoe.westwood@aim-digest.com) for information about AIM's subscription levels.  
 Please make cheques/drafts in British pounds sterling, dollars or Euros payable to AIM Digest at the above address

Helena Conibear – **Executive Director**  
 T: +44 (0)1300 320 869  
 E: [helena.conibear@aim-digest.com](mailto:helena.conibear@aim-digest.com)

Alison Rees - **Editor**  
 E: [alison.rees@aim-digest.com](mailto:alison.rees@aim-digest.com)

Zoe Westwood – **Finance and Subscriptions**  
 E: [zoe.westwood@aim-digest.com](mailto:zoe.westwood@aim-digest.com)

The publisher takes reasonable care to ensure the accuracy of quotations and other information contained herein, but is not responsible for any errors or omissions. Opinions and recommendations quoted herein are usually excerpted, digested or condensed, may be edited for continuity, and are only part of the opinions and recommendations expressed in the original sources, which should be consulted for details.

© AIM Digest 2001. All rights reserved. Material may be reproduced with attribution to AIM.

## Japan

Japan's government wants young people to drink more alcohol in order to reverse declining sales.

The "Saka Viva!" campaign, launched by Japan's National Tax Agency, asks young people between ages 20 and 39 to come up with new ideas to help revitalize the industry.

The agency says sales of alcoholic drinks are down due to declining birthrates, an aging population and the coronavirus pandemic. It hopes the project will encourage young people to come up with "business plans" to promote alcoholic beverages "among the younger generation."

## Scotland

In July, ScotRail announced that the ban on drinking or visibly carrying alcohol would continue for the 'foreseeable future', extending rules introduced as part of Covid in 2020. The decision was taken against a ScotRail board recommendation, to return to pre-pandemic rules, which would have seen a ban on the consumption of alcohol between 9pm and 10am every day, rather than a blanket and indefinite ban. ScotRail's preference was to include rules for 'dry routes' where anti-social behaviour was a problem and ensure 'dry trains' around major events such as football matches. But following a meeting with transport minister Jenny Gilruth on June 22, the plans changed to a full and indefinite ban.

A spokesperson from Transport Scotland said: "As a publicly owned and controlled railway, it is important that ScotRail plays its part in delivering Scottish Government ambitions for its success".

## France

The French government has tightened the rules for wines sold by-the-glass or carafe.

Until now, there was no requirement to provide information about the origins of the wine sold in these measures. In future, however, on-trade venues will need to display the origin, or according to the quality, the protected designation of origin (PDO) or protected geographical indication (PGI) of the wines they offer, whether for consumption on-site or for takeaway. Details about the wine will need to be displayed in full and failure to do so could result in a fine of €1,500.

The amendment to the Law on the Transparency of Information on Agricultural and Food Product aims to protect remuneration for farmers and producers in France by providing improved information on the origins of products to the consumer.

## Cyprus

A proposal to amend the road safety law in Cyprus has been approved by the cabinet. The amendment, made by Transport Minister Yiannis Karousos, will ensure that in the future, alcohol and vehicle advertisements will have to include road safety messages. The bill is to be forwarded to the parliament for a vote.

## Nepal

In Nepal, parliamentarians have proposed that the public sale of alcohol should cease in the run up to elections of the Federal Parliament and Provincial Assemblies to be held on November 20. The Chief Election Commissioner has said that a 15 day ban on the sale of alcohol is appropriate.



## Alcohol consumption and health outcomes among 70 year olds in Sweden

Ahlner F, Erhag HF, Johansson L, Fässberg MM, Sterner TR, Samuelsson J, Zettergren A, Waern M, Skoog I. Patterns of Alcohol Consumption and Associated Factors in a Population-Based Sample of 70-Year-Olds: Data from the Gothenburg H70 Birth Cohort Study 2014–16.

Int. J. Environ Res Public Health 2022;19:8248; doi.org/10.3390/ijerph19148248

Abstract: Older adults of today consume more alcohol, yet knowledge about the factors associated with different consumption levels is limited in this age group.

Based on the data from a population-based sample (n = 1,156, with 539 men and 617 women) in The Gothenburg H70 Birth Cohort Study 2014–16, we examined sociodemographic, social, and health-related factors associated with alcohol consumption levels in 70-year-olds, using logistic regression. Total weekly alcohol intake was calculated based on the self-reported amount of alcohol consumed. Alcohol consumption was categorized as lifetime abstinence, former drinking, moderate consumption ( $\leq 98$  g/week), and at-risk consumption ( $> 98$  g/week). At-risk consumption was further categorized into lower at-risk (98–196 g/week), medium at-risk (196–350 g/week), and higher at-risk ( $\geq 350$  g/week).

We found that among the 1,156 participants, 3% were lifetime abstainers, 3% were former drinkers, 64% were moderate drinkers, and 30% were at-risk drinkers (20% lower, 8% medium, 2% higher). Among several factors, former drinking was associated with worse general self-rated health (OR 1.65, 95% CI 1.08–2.51) and lower health-related quality of life (measured by physical component score) (OR 0.94, 95% CI 0.91–0.97), higher illness burden (OR 1.16, 95% CI 1.07–1.27), and weaker grip strength (OR 0.96, 95% CI 0.94–0.98). Higher at-risk drinkers more often had liver disease (OR 11.41, 95% CI 3.48–37.37) and minor depression (OR 4.57, 95% CI 1.40–14.95), but less contacts with health care (OR 0.32, 95% CI 0.11–0.92).

Our findings demonstrate the importance of classifications beyond abstinence and at-risk consumption, with implications for both the prevention and clinical management of unhealthy consumption patterns in older adults.

### Forum Comments

It is usually recommended that elderly persons should consume lower amounts of alcohol than advised for younger subjects. This is based on limited evidence that older people have slower alcohol metabolism and lower levels of total body

water (as well as the frequent coexistence of a number of diseases of ageing and the usual intake of medications that may react to alcohol). However, reviewer Skovenborg cites strong evidence that such recommendations for the elderly are based more on tradition than on science.

Are our assumptions about drinking in the elderly valid? Forum member Skovenborg states: “The size of reduction of total body water with age is exaggerated, the myth of slower alcohol metabolism is false, and the problems of disease and use of medication in old age is very diverse.” He continues: “The population of adults aged 65 years or older is very varied, ranging from the most robust healthy individuals with excellent marathon performances to the frailest residents of assisted living facilities and nursing homes. No single formula can predict the alcohol metabolism, alcohol tolerance and consequences of drinking for this heterogeneous group. However, essential information is presented in a recent review by Jones of the relevant scientific literature on alcohol, its absorption, distribution and metabolism.”

Skovenborg describes the lack of evidence for marked changes in alcohol tolerance among the elderly. He speaks first of total body water (TBW), where he states: “Evidence from Chumlea et al indicates that the change is total body water with age is not great: Once in the bloodstream, alcohol is distributed into the total body water (TBW) compartment, which comprises around 55–60% of body weight in non-obese males and around 50–55% in females. In men, TBW declines from on average 45.6 liters (age 20 to 29 years) to 42.5 liters (age 80 to 89 years) = a loss of 3.1 liters (6.9 pct.) of TBW during 60 years. In women TBW declines from 32.0 liters (age 20 to 29 years) to 30.2 liters (age 80 to 89 years) = a loss of 1.8 liters (5.6 pct.) of TBW during 60 years.”

As for metabolism of alcohol, Skovenborg reports: “Vestal et al’s 1977 study of the effect of aging on the elimination of alcohol in a group of 50 healthy subjects ranging in age from 21 to 81 years found no influence by age on the rates of ethanol elimination. A well-preserved hepatic ethanol elimination in old age has subsequently been confirmed in ten other studies. For example, Beresford & Lucey studied the influence of age and





gender on blood alcohol concentrations in 14 men and 14 women 21–40 years old and 14 men and 15 women  $\geq 60$  years old who were given the same amount of alcohol on three occasions; they found the downward sloping parts of the BAC curves (depicting alcohol metabolism) to be identical for young/old women and young/old men, whether fasting or after a meal. After a light meal, the peak BACs are practically identical for young and old alike. One study (Fiorentino & Moskowitz) even found a higher alcohol elimination rate for older subjects (51 to 69 years) than younger subjects (19 to 50 years)."

Skovenborg also commented on evidence for an altered responsiveness to alcohol of the brain in the elderly, stating: "Quillan, et al compared simulated driving performance of 14 middle-aged men (mean age 36 years) and 14 older men (mean age 69 years) while sober and when legally intoxicated (BAC > 80 mg/100 ml). While both age and legal intoxication affected driving performance, older men were no more sensitive to alcohol in terms of peak BAC, driving performance or awareness/judgement than middle-aged men."

Reviewer Finkel commented: "I am pleased that Skovenborg, in his usual erudite way, has remembered to correct the all too facily accepted, long and widely repeated, but scientifically poorly based assumptions about our older populations' toleration of alcohol." Reviewer di Gaetano agreed that we must always investigate traditional assumptions and test them with unbiased review of emerging data.

Definitions of "at-risk drinking": The present analyses are based on a population-based study in Sweden, and provide good information on the amount of alcohol consumed, the pattern of alcohol intake, and associations with health outcomes, among a large group of 70-year-old subjects. It provides not only a valid overview of the drinking patterns of such subjects, but associates varying levels of what is commonly referred to as "at risk" drinking with health outcomes. The results indicate that it is not appropriate to group all subjects consuming more than the recommend level of alcohol, thus classified as "at-risk" drinkers, into a single category. Health outcomes are less favorable for ex-drinkers and at-risk drinkers reporting larger

amounts than they are for moderate drinkers and those classified as at-risk drinkers but consuming lower amounts of alcohol.

Reviewer Ellison noted: "This paper is mainly a descriptive picture of the factors associated with alcohol consumption in a group of 70-year-old men and women. It demonstrates very well how a large number of social, biological, mental and physical factors relate to alcohol consumption, and may modify the effects of drinking on health. We have recognized for many years how socio-economic status, however measured by education, occupation, and income, can modify the effects of alcohol, but many of the conditions studied in this analysis are generally not considered in most epidemiologic studies, and information on such are not readily available.

"The relations reported on the effects of various levels of drinking emphasize how defining 'at-risk' can be tricky. As often shown in epidemiologic studies, subjects reporting levels that barely exceed the amounts of alcohol 'recommended' do not show the same health effects as for really 'heavy drinkers.' While the results of this study cannot give definitive answers on what could be considered 'safe' levels of consumption, they support many previous studies that suggest some people whose drinking is considered 'at-risk' do not have adverse effects on health from their alcohol intake."

Forum member Mcevoy wrote: "I think this study is valuable in demonstrating the variety of factors that differ across drinking groups in the absence of any potential confounding by age or birth cohort. It also clearly illustrates that it is not appropriate to lump all "at risk" drinkers in the same category since those who drink closer to guidelines show few differences from moderate drinkers.

Skovenborg added: "I agree with the comments by others that 'it is not appropriate to lump all "at risk" drinkers in the same category since those who drink closer to guidelines show few differences from moderate drinkers'. The large majority of this group of elderly people from Sweden are very moderate drinkers indeed: the median consumption was 32 g alcohol per week among moderate drinkers and 135 g among the lower risk drinkers. The lower at-risk drinkers had higher life satisfaction, had myocardial infarction



and diabetes less often, had better grip strength and had higher MMSE scores. To most people the word “risk” means “danger” – the chance that something bad will happen to you – and the above results seem to give the significance of “low risk” a whole new dimension. The drinkers were classified according to alcohol intake (g/week) with no information about drinking pattern which is an important limitation. A drinker with a weekly consumption of 135 g with a drinking pattern of regular intake of wine or beer with a meal most days of the week should not be in the same risk category as a person with a drinking pattern of weekend drinking of 135 g consumed in 2 days = 67.5 g/day, which amounts to a binge drinking pattern.”

Reviewer Goldfinger wrote: “Further, this paper underscores the value of looking more closely at historical drinking pattern, particularly in the older population where history has consumed many decades of influence, and in this particular population where current drinking patterns may have more immediate implications. As we have been emphasizing for decades, ex-drinkers who no longer consume alcohol must never be placed in the same category as never drinkers, as many of the former may have stopped drinking due to adverse health effects, so may be classified as ‘sick quitters.’

“Past drinkers, or new abstainers, often have serious co-morbidities, particularly in the older population, that leads to the decision to stop drinking. Excessive drinking over the course of many years would be expected to have its greatest risk in later years. Moderation, as it is with most things in life, supports healthy ageing. Inasmuch as teasing out these subsets in the elderly are important in understanding the influence of alcoholic consumption with respect to health and making accurate observations, I would suspect the same may be said for younger subjects.” Reviewer Finkel wrote: “I think we need more studies of this sort, which explore these various facets and others of the relationship between alcohol consumption and health. Here, we see patterns of health associated with different patterns of drinking among a relatively uniform population. The authors are restrained in extracting conclusions.”

Reviewer Stockley agreed with other Forum

members that regular, moderate alcohol intake among the elderly may have beneficial health effects; she presented an interesting summary of experiences in Australia and in the US and other countries. “Alcohol consumption in later life has reportedly increased in Australia and internationally, and despite public health recommendations to reduce all alcohol consumption with increasing age, such recommendations may be misleading.

“The US Health and Retirement Study published in 2019 conducted multiple, bi-annual assessments of alcohol consumption over 16 years, that is, data on frequency and quantity, and whether there was binge drinking, and other time-variable factors for 7,904 participants. This was so that changes in consumption could be evaluated. Even after adjustment for confounders, former drinkers who were current abstainers after age 56 years (subsequently aged 79-89 years) had the highest risk of subsequent mortality, consistent with sick quitters. Moderate alcohol consumption was associated with a lower mortality rate compared with occasional drinking. Moderate consumption for men was reporting 1-3 drinks/day without binge drinking and for women reporting 1-2 drinks/day without binge drinking. Quantitative bias analyses further indicated that omitted confounders would need to be associated with approximate four-fold increases in mortality rates for men and approximate nine-fold increases for women to change the results (Keyes, et al).

“It has also been previously shown that although older moderate alcohol consumers, aged over 55 years, may have better risk factor profiles than abstainers, including higher socioeconomic status and fewer functional limitations and psychosocial factors (which explain some of the survival advantage associated with alcohol consumption), moderate alcohol consumers still maintain their survival advantage even after adjustment for these factors (Lee, et al; Holahan et al). Moderate alcohol consumption was even associated with a lower risk of all-cause mortality in former problem drinkers (Holahan, et al).

“It has also been previously shown that women surviving to age 70 years and older who were moderate alcohol consumers generally had less disability and disease, and more signs of ‘successful ageing’ (Sun, et al). For ‘regular’



moderate alcohol consumers (on 5-7 days/week), there was an approximately 50% greater chance of such successful ageing when compared with non-drinkers.

"In addition, the US Health and Retirement Study has previously reported that moderate alcohol consumption independently confers reduced frailty risk for both older men and women (Shah, et al), predicts fewer depressive symptoms among older adults (Paulson, et al) where social interaction is essential to the seemingly beneficial effect of moderate alcohol consumption on depressive symptomatology and functional ability (Scott, et al). Quality of life is a relatively little considered factor in epidemiological studies of successful ageing and alcohol consumption, yet we know from the US Rancho Bernardo Study of Healthy Ageing, and indeed from the Australian Dubbo Study of the Elderly, that a higher quality of life is associated with higher cognitive, mental and physical health and generally, longevity (Simons, et al. 2006; Simons, et al 2014; Richard, et al)."

### References from Forum critique

Beresford TP, Lucey MR. Ethanol metabolism and intoxication in the elderly. In *Alcohol and Aging* (eds T. Beresford & E. Gomberg): pp. 117–127. Oxford University Press, 1995.

Chumlea WC, Guo SS, Zeller CM, Reo NV, et al. Total body water reference values and prediction equations for adults. *Kidney Int* 2001;59:2250-2258.

Fiorentino DD, Moskowitz H. Breath alcohol elimination rate as a function of age, gender, and drinking practice. *Forensic Science International* 2013;233:278-282.

Holahan CJ, Schutte KK, Brennan PL, Holahan CK, Moos BS, Moos RH. Late-life alcohol consumption and 20-year mortality. *Alcohol Clin Exp Res* 2010;34:1961–1971.

Jones AW. Alcohol, its absorption, distribution, metabolism, and excretion in the body and pharmacokinetic calculations. *WIREs Forensic Sci* 2019;e1340.

Keyes KM, Calvo E, Ornstein KA, Rutherford C, Fox MP, Staudinger UM, Fried LP. Alcohol Consumption in Later Life and Mortality in the United States: Results from 9 Waves of the Health and Retirement Study. *Alcoholism: Clin Exp Res* 2019;43:1734-1746.

Lee SJ, Sudore RL, Williams BA, Lindquist K, Chen HL, Covinsky KE. Functional limitations, socioeconomic status, and all-cause mortality in moderate alcohol drinkers. *J Am Geriatr Soc* 2009;57:955–962.

Paulson D, Shah M, Herring D, et al. The relationship between moderate alcohol consumption, depressive

symptomatology, and C-reactive protein: the Health and Retirement Study. *Int J Geriatr Psychiatry* 2018;33:316-324.

Quillian WC, Cox DJ, Kovatchev BP, Phillips C. The effects of age and alcohol intoxication on simulated driving performance, awareness and self-restraint. *Age Ageing* 1999;28:59-66.

Richard EL, Kritz-Silverstein D, Laughlin GA, Fung TT, Barrett-Connor E, McEvoy LK. Alcohol Intake and Cognitively Healthy Longevity in Community-Dwelling Adults: The Rancho Bernardo Study. *J Alzheimers Dis* 2017;59:803-814.

Scott RG, Wiener CH, Paulson D. The Benefit of Moderate Alcohol Use on Mood and Functional Ability in Later Life: Due to Beers or Frequent Cheers? *Gerontologist* 2018; doi: 10.1093/geront/gny129.

Shah M, Paulson D, Nguyen V. (2018) Alcohol Use and Frailty Risk among Older Adults over 12 Years: The Health and Retirement Study. *Clin Gerontol* 2018;41:315-325.

Simons LA, Simons J, McCallum J, Friedlander Y. (2006) Lifestyle factors and risk of dementia: Dubbo Study of the elderly. *Med J Aust*. 2006;184:68-70. || doi: 10.5694/j.1326-5377.2006.tb00120.x.

Simons, L.A. (2014) Alcohol intake and survival in Australian seniors: The Dubbo Study. *Nutr Aging* 2014;2:85-90.

Sun Q, Townsend MK, Okereke OI, et al. Alcohol consumption at midlife and successful ageing in women: a prospective cohort analysis in the Nurses' Health Study. *PLoS Med* 2011;8:e1001090.

Vestal RE, McGuire EA, Tobin JD, Andres R, et al. Aging and ethanol metabolism. *Clin Pharmacol Therapeutics* 1977;21:343-354.

### Forum Summary

In a population-based cohort of 70-year-old men and women recruited in Gothenburg, Sweden, in 2014-2016, the authors of this paper have presented a detailed listing of many social, environmental, and biological factors that relate to non-drinking, former drinking, or current drinking of varying amounts of alcohol. Our Forum critique raises some questions about the traditional belief that the elderly should consume markedly less alcohol than younger subjects, and that the limitations placed on subjects related solely to their age may often not be appropriate.

The paper emphasizes how a very large number of factors may modify the association between the amount of alcohol consumed and measures of health and disease. Many of these, such as indices of socio-economic state, are usually adjusted for in





epidemiologic studies. Data on other factors that relate to alcohol consumption (such as self-related health, having a partner, grip strength, having others worried about their drinking, religiosity, gait speed, life satisfaction, etc.) represent data usually not collected in epidemiologic studies.

Forum members thought that these analyses show that subjects whose reported alcohol intake is only slightly above the recommended “safe” levels for subjects of this age should not be classified as “at-risk” drinkers. Most of their features match those of subjects reporting intake within current recommendations; certainly, they do not match the characteristics of heavier drinkers.

Forum members also pointed out that in addition to improved mortality associated with truly moderate drinking, as seen in essentially all epidemiologic studies, these analyses demonstrate that many other components of “successful ageing” are also associated with regular, moderate consumption of alcohol.

Comments on this critique by the International Scientific Forum on Alcohol Research have been provided by the following members:

Giovanni de Gaetano, MD, PhD, Department of Epidemiology and Prevention, IRCCS Istituto Neurologico Mediterraneo NEUROMED, Pozzilli, Italy

R. Curtis Ellison, MD, Professor of Medicine, Emeritus; Section of Preventive Medicine & Epidemiology, Boston University School of Medicine, Boston, MA, USA

Harvey Finkel, MD, Hematology/Oncology, Retired (Formerly, Clinical Professor of Medicine, Boston University Medical Center, Boston, MA, USA)

Tedd Goldfinger, DO, FACC, Desert Cardiology of Tucson Heart Center, University of Arizona School of Medicine, Tucson, AZ, USA

Dominique Lanzmann-Petithory, MD, PhD, Nutrition Geriatrics, Hôpital Emile Roux, APHP Paris, Limeil-Brévannes, France

Linda McEvoy, PhD, Department of Radiology, University of California at San Diego (UCSD), La Jolla, CA, USA

Erik Skovenborg, MD, specialized in family medicine, member of the Scandinavian Medical Alcohol Board, Aarhus, Denmark

Creina Stockley, PhD, MSc Clinical Pharmacology, MBA; Principal, Stockley Health and Regulatory Solutions; Adjunct Senior Lecturer, The University of Adelaide, Adelaide, Australia

Arne Svilaas, MD, PhD, general practice and lipidology, Oslo University Hospital, Oslo, Norway

## Smoking is positively related and alcohol consumption is negatively related to an increased risk of Meniere’s disease

Meniere’s disease is a chronic inner ear disorder that can cause problems with hearing and balance. A study investigated the relationship between smoking, alcohol consumption, and obesity with Meniere’s disease in an adult population.

The ≥40-year-old population in the Korean National Health Insurance Service-Health Screening Cohort 2002-2019 was analysed. A total of 15,208 patients with Meniere’s disease were matched with 499,658 comparison participants. The current smoking, alcohol consumption, and past medical histories were collected. Body mass index (BMI) was grouped into underweight, normal, overweight, obese I, and obese II. Odds of histories of smoking and alcohol consumption and BMI group for Meniere’s disease were analysed. These associations were further analysed in subgroups of age, sex, smoking, alcohol consumption, and BMI.

In the overall adult population, smoking and alcohol consumption did not show an association with Meniere’s disease. Being underweight was linked with lower odds for Meniere’s disease (adjusted OR [aOR] = 0.80, 95% CI = 0.68-0.93). In the male group, smoking was positively associated with Meniere’s disease (aOR = 1.08, 95% CI = 1.00-1.17), while alcohol consumption was negatively related (i.e., protective) to Meniere’s disease (aOR = 0.87, 95% CI = 0.81-0.94). Being underweight was related to a lower risk of Meniere’s disease. In adult men, smoking was predicted to increase, while alcohol consumption was predicted to decrease the risk of Meniere’s disease.

Source: Kim SY, Chung J, Yoo DM, Kwon MJ, Kim JH, Kim JH, Kim H, Choi HG. Smoking Is Positively Related and Alcohol Consumption Is Negatively Related to an Increased Risk of Meniere’s Disease. *J Clin Med.* 2022 Aug 26;11(17):5007. doi.org/10.3390/jcm11175007.



## Diet change may make biggest impact on reducing heart risk in people with hypertension

The American Heart Association reports on a simulation study using the latest US statistics for stage 1 hypertension. Researchers found that lifestyle changes to reduce systolic blood pressure to below 130 mm Hg may prevent nearly 26,000 cardiovascular disease events, avoid 2,900 deaths and save about \$1.6 billion in associated health care costs over ten years. Among several lifestyle changes considered, such as diet, weight loss, physical activity, etc., the study found the largest impact on reducing cardiovascular events may come from adopting the Dietary Approaches to Stop Hypertension (DASH) diet.

Among several lifestyle changes that may reduce cardiovascular disease, adopting the DASH (Dietary Approaches to Stop Hypertension) diet may have the greatest impact for young and middle-aged adults with stage 1 hypertension, according to new research presented at the American Heart Association's Hypertension Scientific Sessions 2022, held Sept. 7-10, 2022, in San Diego. According to the 2017 joint American Heart Association and American College of Cardiology High Blood Pressure Guideline, stage 1 hypertension is defined as having a systolic (top number) level of 130-139 mm Hg or having a diastolic (bottom number) measure of 80-89 mm Hg.

The researchers estimate widespread adoption of lifestyle changes, such as limiting heavy alcohol consumption and exercising regularly, may prevent thousands of deaths and save more than one billion dollars in health care costs over the next 10 years. Their analysis found that adoption of the DASH diet could have the greatest benefit, with an estimated 15,000 heart disease events prevented among men and 11,000 events among women.

The DASH eating plan is specifically designed to help manage blood pressure. The diet emphasises foods including fruits, vegetables, lean meat sources, nut, seeds and grains and limiting consumption of red meat, sodium, sugars and sugar-sweetened beverages. It is recommended that alcohol is limited to 1 drink per day for women and up to 2 drinks per day for men.

The research team estimated that 8.8 million U.S. adults, ages 35-64, have untreated stage 1 hypertension and would be recommended lifestyle changes, such as physical activity,

sustained weight loss, moderating alcohol intake and adoption of the DASH diet.

In the absence of other health conditions, such as type 2 diabetes or kidney disease, and a predicted >(10%) 10-year CVD risk, people with stage 1 hypertension are considered at low risk for heart attack or stroke compared to people with stage 2 or higher hypertension. Stage 2 hypertension is defined as systolic measures of 140 mm Hg or higher, or diastolic measures of 90 mm Hg or higher. The recommendations for treatment for people with stage 1 hypertension is based primarily on lifestyle changes rather than medication.

"Nearly nine million young and middle-aged adults with untreated stage 1 hypertension represent a significant, impending burden for health care systems," said Kendra D. Sims, Ph.D., M.P.H., a postdoctoral fellow at the University of California, San Francisco and co-lead researcher of this study. "Our results provide strong evidence that large-scale, healthy behaviour modifications may prevent future heart disease, related complications and excess health care costs."

To simulate heart disease and stroke events, mortality and health care costs between 2018 and 2027, the researchers applied evidence from published meta-analyses and trial data about the blood-pressure reducing effects of lifestyle changes: dietary changes, sustained weight loss, physical activity, smoking cessation and alcohol moderation. About half of the modeled population were women and 61% (5.5 million) had regular health care access.

"Unfortunately, the availability and affordability of healthy food sources does not easily allow people to follow the DASH diet. Clinicians should consider whether their patients live in food deserts or places with limited walkability. Health counseling should include addressing these specific challenges to blood pressure control," Sims said.

In May, the Association published a policy statement, Strengthening U.S. Food Policies and Programs to Promote Equity in Nutrition Security, which recommends expanding and improving U.S. nutrition policies and programs to ensure all American can access nutritious food. In 2020, the Association launched the National Hypertensive





Control Initiative, a collaborative initiative with the U.S. Department of Health and Human Services that aims to improve blood pressure control among the most vulnerable populations, including racial and ethnic minorities.

[newsroom.heart.org/news/diet-change-may-make-biggest-impact-on-reducing-heart-risk-in-people-with-hypertension?preview=bbd6](https://newsroom.heart.org/news/diet-change-may-make-biggest-impact-on-reducing-heart-risk-in-people-with-hypertension?preview=bbd6)

## Meta-analysis of alcohol consumption and venous thromboembolism

The associations of alcohol consumption and venous thromboembolism (VTE) have been investigated widely, but the conclusions have been inconsistent. A study summarised the relationship of alcohol consumption and venous thromboembolism. The results are published in the Journal of Public Health.

Researchers searched the PubMed, Embase, Web of Science and the Cochrane Library databases from inception to September 2019 to identify studies assessing the association between alcohol consumption and risk of venous thromboembolism.

Fourteen cohorts and four case-control studies were included in the meta-analysis. Compared with non-drinkers, the risk of venous thromboembolism was decreased (RR: 0.93; 95% confidence interval [CI] 0.88-0.99) for alcohol drinkers. The pooled RRs of venous thromboembolism were 0.91 (95% CI 0.84-0.99) for low to moderate alcohol intake (0.1-14.0 drinks/week) and 0.91 (95% CI 0.78-1.06) for high alcohol intake (>14.0 drinks/week) compared with non-drinker. Subgroup analysis showed liquor intake might slightly increase the risk of venous thromboembolism (1.01; 95% CI 0.85-1.21) although the difference was not significant.

Alcohol consumption in low to moderate was associated with a lower risk of venous thromboembolism. Further studies are warranted to determine whether moderate alcohol consumption has a causal or protective role in venous thromboembolism.

Source: Zhang X, Chen X, Yang J, Du L, Zhou Y, Li K. Meta-analysis of alcohol consumption and venous thromboembolism. *J Public Health (Oxf)*. 2022 Aug 25;44(3):477-498. [doi.org/10.1093/pubmed/fdab045](https://doi.org/10.1093/pubmed/fdab045).

## Red wine improves cardiovascular function and oxidative stress of the hypertensive-SHR and diabetic-STZ rats

Hypertension and diabetes development had been characterised as idiopathic disorders tightly interconnected, and therefore it is essential to understand how the functionality of neurohormonal pathways are involved in both diseases. Hypertensive and diabetic patients have shown increased systolic blood pressure (SBP), oxidative stress, vascular hypertrophy, and remodeling. It is well established that the long-term consumption of red wine and/or polyphenol-stilbene causes cardioprotective and antihypertensive effects; however, some functions remain unrevealed. Downstream pathways such as reactive oxygen species (ROS), sympathoadrenal axis represented by  $\beta$ 1-adrenoceptors, and renin-angiotensin system via angiotensin-II receptors critically contribute to hypertension development. This raises the issue of whether in vivo long-term red wine treatment can act as a modulator of these targets.

A study monitored systolic blood pressure, glucose tolerance, oxidative stress, and cardiovascular function. Aortic and atrial tissues from normotensive-WKY, hypertensive-SHR, and diabetic-STZ animals, chronically exposed to red wine (3.715 ml/kg/v.o/day) or alcohol (12%) for 21-days, were used to measure contractile/relaxation responses by force transducers.

Red wine, but not alcohol, prevented the increase of systolic blood pressure and hyperglycemic peak. Additionally, was observed prevention of oxidative stress metabolites formation and an improvement in ROS scavenging antioxidant capacity of SHR. The study also found that red wine intake enhances the endothelium-dependent relaxation, decreases the hypercontractile mediated by angiotensin-II in the aorta, and via  $\beta$ 1-adrenoceptors in the atrium.

Source: Guilherme Henrique Souza Bomfim, Diego Castro Musial, Katiucha Rocha, Aron Jurkiewicz & Neide Hyppolito Jurkiewicz (2022) Red wine but not alcohol consumption improves cardiovascular function and oxidative stress of the hypertensive-SHR and diabetic-STZ rats, *Clinical and Experimental Hypertension*, 44:6, 573-584, [doi.org/10.1080/10641963.2022.2085737](https://doi.org/10.1080/10641963.2022.2085737)



## Association of change in alcohol consumption with risk of ischemic stroke

The effect of serial change in alcohol consumption on stroke risk has been limitedly evaluated. A research team investigated the association of change in alcohol consumption with risk of stroke. The study was a population-based retrospective cohort study from National Health Insurance Service database of all Koreans. 4,513,746 participants aged  $\geq 40$  years underwent 2 subsequent national health examinations in both 2009 and 2011. Alcohol consumption was assessed by average alcohol intake (g/day) based on self-questionnaires and categorised into non-, mild, moderate, and heavy drinking. Change in alcohol consumption was defined by shift of category from baseline. Cox proportional hazards model was used with adjustment for age, sex, smoking status, regular exercise, socioeconomic information, and comorbidities, Charlson Comorbidity Index, systolic blood pressure, and laboratory results. Subgroup analysis among those with the third examination was conducted to reflect further change in alcohol consumption.

During 28 424 497 person-years of follow-up, 74 923 ischemic stroke events were identified. Sustained mild drinking was associated with a

decreased risk of ischemic stroke (adjusted hazard ratio, 0.88 [95% CI, 0.86–0.90]) compared with sustained nondrinking, whereas sustained heavy drinking was associated with an increased risk of ischemic stroke (adjusted hazard ratio, 1.06 [95% CI, 1.02–1.10]). Increasing alcohol consumption was associated with an increased risk of ischemic stroke (adjusted hazard ratio, 1.11 [95% CI, 1.06–1.17] from mild to moderate; adjusted hazard ratio, 1.28 [95% CI, 1.19–1.38] from mild to heavy) compared with sustained mild drinkers. Reduction of alcohol consumption from heavy to mild level was associated with 17% decreased risk of ischemic stroke through 3 $\times$  of examinations.

Light-to-moderate alcohol consumption is associated with a decreased risk of ischemic stroke, although it might be not causal and could be impacted by sick people abstaining from drinking, the authors state. Reduction of alcohol consumption from heavy drinking is associated with a decreased risk of ischemic stroke.

**Source:** Association of Change in Alcohol Consumption With Risk of Ischemic Stroke Su-Min Jeong, Han Rim Lee, Kyungdo Han, Keun Hye Jeon, Dahye Kim, Jung Eun Yoo, Mi Hee Cho, Sohyun Chun, Seung Pyo Lee, Ki-Woong Nam and Dong Wook Shin. *Stroke* August 2022 Vol 53, Issue 8. doi.org/10.1161/STROKEAHA.121.037590

## A longitudinal evaluation of increasing or lowering alcohol intake throughout adulthood and colorectal cancer risk

Leveraging longitudinal exposure assessments on alcohol intake at different ages, researchers examined the relationship between change in alcohol intake and subsequent colorectal cancer (CRC) risk.

Within the European Prospective Investigation into Cancer and Nutrition, changes in alcohol intake comparing follow-up with baseline assessments were investigated in relation to CRC risk. The analysis included 191,180 participants and 1,530 incident CRC cases, with exclusion of the first three years of follow-up to minimize reverse causation. Trajectory profiles of alcohol intake, assessed at ages 20, 30, 40, 50 years, at baseline and during follow-up, were estimated and related to CRC risk, including 407,605 participants and 5,008 incident CRC cases.

Mean age at baseline was 50.2 years and the follow-up assessment occurred on average 7.1 years later. Compared to stable intake, a 12 g/day

increase in alcohol intake during follow-up was positively associated with CRC risk (HR = 1.15, 95%CI 1.04, 1.25), while a 12 g/day reduction was inversely associated with CRC risk (HR = 0.86, 95%CI 0.78, 0.95). Trajectory analysis showed that compared to low alcohol intake, men who increased their alcohol intake from early- to mid- and late-adulthood by up to 30 g/day on average had significantly increased CRC risk (HR = 1.24; 95%CI 1.08, 1.42), while no associations were observed in women. Results were consistent by anatomical subsite.

Increasing alcohol intake significantly during mid-to-late adulthood raised colorectal cancer risk among men, while reduction lowered risk.

**Source:** Mayén AL, Viallon V, Botteri E, Proust-Lima C, Bagnardi V, Batista V, et al. A longitudinal evaluation of alcohol intake throughout adulthood and colorectal cancer risk. *Eur J Epidemiol.* 2022 Sep 5. doi.org/10.1007/s10654-022-00900-6.



## Do we know what moderate alcohol consumption is? The particular case of beer

Academics in Spain say that there is currently a great controversy about the lack of definition regarding the concept of moderate consumption of alcoholic beverages from the point of view of health, since, in turn, it should be a socially accepted consumption. Although still there is not a global agreement about the definition of "moderate consumption", it is considered as such the amount below 10-12 g alcohol/day for women and no more than 20-24g alcohol/day for men. These differences are because that women are less able to metabolise alcohol. According to the scientific evidence, moderate consumption of beer seems to be accepted to maintain an adequate quality of the diet, as it provides vitamins B (vitamin B6, B12 and

folates) and minerals (magnesium) among other nutrients, as well as polyphenols and complex carbohydrates. In terms of health, a moderate beer consumption may play a protective role at cardiovascular levels, associated with an enhanced lipid profile. It should be highlighted the possible beneficial effects of a moderate consumption of fermented beverages (such as beer) is associated with other factors, such as gender, age, as well as the pattern of consumption throughout life.

Source: Díaz Prieto LE, Gómez-Martínez S, Nova E, Marcos A. ¿Sabemos lo que es un consumo moderado de alcohol? El caso particular de la cerveza [Do we know what moderate alcohol consumption is? The particular case of beer.]. *Nutr Hosp.* 2022 Sep 1;39(Spec No3):12-16. Spanish. doi.org/10.20960/nh.04303.

## The relationship between alcohol use and dementia in adults aged more than 60 years

A study synthesised international findings on the alcohol-dementia relationship, including representation from low- and middle-income countries.

The individual participant data meta-analysis of 15 prospective epidemiological cohort studies from countries situated in six continents investigated the dementia risk associated with alcohol use in older adults aged over 60 years. Additional analyses assessed the alcohol-dementia relationship in the sample stratified by sex and by continent. Participants included 24 478 community dwelling individuals without a history of dementia at baseline and at least one follow-up dementia assessment. The main outcome measure was all-cause dementia as determined by clinical interview.

At baseline, the mean age across studies was 71.8 (standard deviation=7.5, range=60-102 years), 14,260 (58.3%) were female and 13,269 (54.2%) were current drinkers. During 151,636 person-years of follow-up, there were 2,124 incident cases of dementia (14.0 per 1000 person-years). When compared with abstainers, the risk for dementia was lower in occasional [hazard ratio (HR)=0.78; 95% confidence interval (CI)=0.68-

0.89], light-moderate (HR=0.78; 95% CI=0.70-0.87) and moderate-heavy drinkers (HR=0.62; 95% CI=0.51-0.77). There was no evidence of differences between life-time abstainers and former drinkers in terms of dementia risk (HR=0.98; 95% CI=0.81-1.18). In dose-response analyses, moderate drinking up to 40g/day was associated with a lower risk of dementia when compared with life-time abstaining. Among current drinkers, there was no consistent evidence for differences in terms of dementia risk. Results were similar when the sample was stratified by sex. When analysed at the continent level, there was considerable heterogeneity in the alcohol-dementia relationship.

Abstinence from alcohol appears to be associated with an increased risk for all-cause dementia. Among current drinkers, there appears to be no consistent evidence to suggest that the amount of alcohol consumed in later life is associated with dementia risk, the researchers conclude.

Source: Mewton, L, Visontay, R, Hoy, N, Lipnicki, DM, Sunderland, M, Lipton, RB, et al. The relationship between alcohol use and dementia in adults aged more than 60 years: a combined analysis of prospective, individual-participant data from 15 international studies. *Addiction.* 2022. doi.org/10.1111/add.16035





## Association between changes in alcohol consumption and cancer risk

How changes in drinking behaviour increase or decrease the incidence of cancer is not well understood. A study investigated the association between the reduction, cessation, or increase of alcohol consumption and the development of alcohol-related cancers and all cancers.

The population-based cohort study analysed adult beneficiaries in the Korean National Health Insurance Service. Participants (aged  $\geq 40$  years) included those who underwent a national health screening in both 2009 and 2011 and had available data on their drinking status. Alcohol consumption level, which was self-reported by participants in health screening questionnaires, was categorised into none (0 g/d), mild ( $< 15$  g/d), moderate (15-29.9 g/d), and heavy ( $\geq 30$  g/d) drinking. Based on changes in alcohol consumption level from 2009 to 2011, participants were categorised into the following groups: nondrinker, sustainer, increaser, quitter, and reducer.

The primary outcome was newly diagnosed alcohol-related cancers (including cancers of the head and neck, esophagus, colorectum, liver, larynx, and female breast), and the secondary outcome was all newly diagnosed cancers (except for thyroid cancer).

Among the 4 513 746 participants (mean [SD] age, 53.6 [9.6] years; 51.5% men), the incidence rate of cancer was 7.7 per 1,000 person-years during a median (IQR) follow-up of 6.4 (6.1-6.6) years.

Compared with the sustainer groups at each drinking level, the increaser groups had a higher risk of alcohol-related cancers and all cancers. The

increased alcohol-related cancer incidence was associated with dose; those who changed from nondrinking to mild (adjusted hazard ratio [aHR], 1.03; 95% CI, 1.00-1.06), moderate (aHR, 1.10; 95% CI, 1.02-1.18), or heavy (aHR, 1.34; 95% CI, 1.23-1.45) drinking levels had an associated higher risk than those who did not drink. Those with mild drinking levels who quit drinking had a lower risk of alcohol-related cancer (aHR, 0.96; 95% CI, 0.92-0.99) than those who sustained their drinking levels. Those with moderate (aHR, 1.07; 95% CI, 1.03-1.12) or heavy (aHR, 1.07; 95% CI, 1.02-1.12) drinking levels who quit drinking had a higher all cancer incidence than those who sustained their levels, but when quitting was sustained, this increase in risk disappeared. Compared with sustained heavy drinking, reduced heavy drinking levels to moderate levels (alcohol-related cancer: aHR, 0.91 [95% CI, 0.86-0.97]; all cancers: aHR, 0.96 [95% CI, 0.92-0.99]) or mild levels (alcohol-related cancer: aHR, 0.92 [95% CI, 0.86-0.98]; all cancers: aHR, 0.92 [95% CI, 0.89-0.96]) were associated with decreased cancer risk.

Results of this study showed that increased alcohol consumption was associated with higher risks for alcohol-related and all cancers, whereas sustained levels of moderate drinking, quitting and reduced drinking were associated with lower risks of alcohol-related and all cancers.

Source: Yoo JE, Han K, Shin DW, et al. Association Between Changes in Alcohol Consumption and Cancer Risk. *JAMA Netw Open*. 2022;5(8):e2228544. doi.org/10.1001/jamanetworkopen.2022.28544

## The melatonin contained in beer can provide health benefits

Beer is a drink that is part of the diet of many peoples, it is a fermented beverage with a low alcohol content originating from cereal fermentation (barley or wheat) and contains melatonin. Melatonin is a molecule with a wide range of antioxidant, oncostatic, immunomodulatory, and cytoprotective properties.

A paper published in the journal *Science of Food and Agriculture* reviews the data supporting the idea that moderate consumption of beer, because of its melatonin content, is particularly useful in the diets of healthy subjects and in other physiological situations (pregnancy, menopause, old age, ...) through food products as functional tools.

In this perspective, the authors provide a background on the mechanisms of melatonin generation in beer, its concentrations, and its possible effects on health.

The paper concludes that melatonin contained in beer, as part of the diet of healthy individuals and in some special physiological situations, could act as a protective factor and improve the quality of life of those who drink it in moderation.

Source: Maldonado MD, Romero-Aibar J, Calvo JR. The melatonin contained in beer can provide health benefits, due to its antioxidant, anti-inflammatory and immunomodulating properties. *J Sci Food Agric*. 2022 Aug 25. doi.org/10.1002/jsfa.12179



## Associations between alcohol consumption and HDL subspecies

Alcohol consumption increases circulating high-density lipoprotein cholesterol (HDL-C), but HDL protein cargo may better reflect HDL function. Researchers from Harvard and the University of Copenhagen examined the associations between alcohol intake and HDL subspecies containing or lacking apoC3, apoE, and apoJ in a well-phenotyped cohort.

A cross-sectional analysis was performed of 2,092 Cardiovascular Health Study participants aged 70 or older with HDL subspecies measured in stored specimens from 1998-99. Associations between alcohol intake and apoA1 defined HDL subspecies lacking or containing apoC3, apoE, and apoJ, and circulating levels of total apoA1, apoC3, apoE, and apoJ were examined.

The study found that HDL subspecies lacking and containing apoC3, apoE, and apoJ were all positively associated with alcohol intake, with ~1% per additional drink per week or ~7% per additional drink per day. Total apoA1 was also

directly associated with alcohol consumption, with a 1% increase per additional drink per week. Total apoC3 blood levels were 0.5% higher per additional drink per week, but the association was driven by a few heavily drinking men.

The researchers conclude that alcohol intake was positively associated with HDL subspecies lacking and containing apoC3, apoE, or apoJ, and with total plasma apoA1. ApoC3 was directly, albeit not as robustly associated with alcohol intake. HDL protein cargo is crucial for its anti-atherosclerotic functions, but the study authors say that it remains to be determined whether HDL subspecies play a role in the putative association between limited alcohol intake and lower risk of coronary heart disease.

Source: Associations between Alcohol Consumption and HDL Subspecies Defined by ApoC3, ApoE and ApoJ: the Cardiovascular Health Study. *Curr Probl Cardiol.* 2022 Sep 10:101395. doi.org/10.1016/j.cpcardiol.2022.101395.

## Associations of combined healthy lifestyles with cancer morbidity and mortality among individuals with diabetes

Cancer has contributed to an increasing proportion of diabetes-related deaths, while lifestyle management is the cornerstone of both diabetes care and cancer prevention. A research team evaluated the associations of combined healthy lifestyles with total and site-specific cancer risks among individuals with diabetes.

92,239 individuals with diabetes but without cancer at baseline were included in the study from five population-based cohorts in the USA (National Health and Nutrition Examination Survey and National Institutes of Health [NIH]-AARP Diet and Health Study), the UK (UK Biobank study) and China (Dongfeng-Tongji cohort and Kailuan study). Healthy lifestyle scores (range 0-5) were constructed based on current nonsmoking, low-to-moderate alcohol drinking, adequate physical activity, healthy diet and optimal bodyweight. HRs for cancer morbidity and mortality, adjusting for sociodemographic, medical and diabetes-related factors, were calculated.

During 376,354 person-years of follow-up from UK Biobank and the two Chinese cohorts, 3,229

incident cancer cases were documented, and 6,682 cancer deaths were documented during 1,089,987 person-years of follow-up in the five cohorts. HRs (95% CIs) comparing participants with 4-5 vs 0-1 healthy lifestyle factors were 0.73 (0.61, 0.88) for incident cancer and 0.55 (0.46, 0.67) for cancer mortality, and ranged between 0.41 and 0.63 for oesophagus, lung, liver, colorectum, breast and kidney cancers. Findings remained consistent across different cohorts and subgroups.

This international cohort study found that adherence to combined healthy lifestyles was associated with lower risks of total cancer morbidity and mortality as well as several subtypes (oesophagus, lung, liver, colorectum, breast and kidney cancers) among individuals with diabetes.

Source: Zhang YB, Pan XF, Lu Q, Wang YX, Geng TT, Zhou YF, Liao LM, et al.. Associations of combined healthy lifestyles with cancer morbidity and mortality among individuals with diabetes: results from five cohort studies in the USA, the UK and China. *Diabetologia.* 2022 Sep 14. doi.org/10.1007/s00125-022-05754-x.



## Is alcohol consumption associated with a lower risk of cardiovascular events in patients treated with statins?

Alcohol consumption has long been associated with cardiovascular (CV) benefit, but it also has adverse potential. Statins are currently widely used for CV prevention. A group of researchers evaluated whether alcohol use is associated with lower CV risk in patients on statins.

Intermountain Medical Center cardiac catheterization laboratory medical records were searched for patients with a prescription history of statin use or non-use and a self-report of alcohol use or non-use. Alcohol and statin prescription data were available together with long-term major adverse CV events (MACE), including death, myocardial infarction, stroke, and heart failure hospitalizations in 1701 patients at primary and 3266 patients at secondary CV risk.

MACE rates were lower for primary prevention alcohol users than non-users not on statins

(adjusted hazard ratio [adj-HR] 0.50 (95% CI 0.33, 0.78), but not for those on statins (adj-HR 0.84, CI 0.54, 1.32). MACE rates for secondary prevention were not reduced by alcohol consumption either in statin non-users or users (adj HR 1.18, CI 0.85, 1.64; adj HR 1.08, CI 0.87, 1.35, respectively).

The researchers comment that these findings, together with other recent supportive studies, can help inform personal choices in alcohol consumption and professional society recommendations for CV prevention.

Source: Anderson JL; Le VT; Bair TL; Muhlestein JB; Knowlton KU; Horne BD, "Is alcohol consumption associated with a lower risk of cardiovascular events in patients treated with statins? An observational real-world experience", *Journal of Clinical Medicine*, Vol 11, No 16, 2022, Art No 4797, 8pp. doi.org/10.3390/jcm11164797

## Covid-19 and alcohol associated liver disease

The COVID-19 pandemic is having substantial impacts on the health status of individuals with alcohol use disorder (AUD) and alcohol-associated liver disease (ALD). AUD and ALD have both been impacted throughout the pandemic, with increases in alcohol use during the early stages of the pandemic, reduced access to treatment during the mid-pandemic, and challenges in managing

the downstream effects in the post-COVID era. A review focuses on how the COVID-19 pandemic has impacted AUD and ALD epidemiology and access to treatment, and discusses how to address this rising AUD and ALD disease burden.

Source: Deutsch-Link S, Curtis B, Singal AK. Covid-19 and alcohol associated liver disease. *Dig Liver Dis*. 2022 Aug 3;51590-8658(22)00586-2. doi.org/10.1016/j.dld.2022.07.007.

## Risk factors for problematic drinking in one's thirties and forties

Alcohol drinking and risk factors for problematic drinking may vary across a lifespan. A study aimed to identify risk factors for problematic drinking in men and women in their thirties and forties.

Alcohol drinking and potential risk factors for problematic drinking were assessed at ages 30, 34, 42, and 46 in the 1970 British Cohort Study. Multilevel models included 10,079 observations in 3,880 men and 9,241 observations in 3,716 women.

In men, formerly smoking, currently smoking, having a degree, having malaise, and having a mother who drank while pregnant were independently associated with increased risk of problematic drinking. In women, formerly smoking, currently smoking, being physically active in one's leisure time, having a degree, having

a managerial or professional occupation, having malaise, and having a mother who drank while pregnant were independently associated with increased risk of problematic drinking. In men and women, cohabiting as a couple was associated with decreased risk of problematic drinking. This study suggests that several risk factors may be associated with problematic drinking in men and women in their thirties and forties.

Policy makers should consider the role of modifiable risk factors in the prevention of problematic drinking.

Source: O'Donovan G, Hamer M. Risk Factors for Problematic Drinking in One's Thirties and Forties: A Longitudinal Analysis of the 1970 British Cohort Study. *Int J Environ Res Public Health*. 2022 Aug 26;19(17):10664. doi.org/10.3390/ijerph191710664. PMID: 36078379.





## Patterns and predictors of high-intensity drinking & implications for intervention

Efforts to intervene with subgroups at particularly high risk for alcohol use require information on factors that differentiate drinking intensity levels. An article summarises existing research and provides new findings on sociodemographics and risk factors that differentiate high-intensity drinking (HID).

The study was based on participants of the nationally representative 12th grade Monitoring the Future study who reported past 30-day alcohol use in 2018. Among past 2-week drinkers in 2019 bivariate associations between drinking intensity (moderate drinking [1-4 drinks for women/1-5 drinks for men], binge-only drinking [4-7/5-9 drinks], and HID [8+/10+ drinks]) and a range of sociodemographic characteristics, risk factors, and alcohol-related consequences were examined.

Results showed binge-drinking norms, social and enhancement drinking motives, nicotine vaping,

and use of limiting/stopping drinking and manner of drinking protective behavioural strategies differentiated all drinking intensity levels, lending support to HID and binge-only drinking having an overlapping risk profile. However, there were also risk factors uniquely associated with HID, including sex, college attendance, employment, HID norms, use of serious harm reduction protective behavioural strategies, family history of drinking problems, any cigarette or drug use other than marijuana, and depression symptoms.

Therefore, risk factors differentiate young adult drinking intensity. These results can inform efforts to adapt interventions for young adults who report HID.

Source: Patrick ME, Terry-McElrath YM, Bonar EE. Patterns and predictors of high-intensity drinking and implications for intervention. *Psychol Addict Behav.* 2022 Sep;36(6):581-594. doi.org/10.1037/adb0000758.

## Drinking among university students with a history of reading difficulties

An increasing number of students are entering university with reading difficulties-whether they be diagnosed or self-reported. Research demonstrates that university students who self-report a history of reading difficulties (HRD) have lower academic achievement and higher anxiety about academic performance as compared to peers without this history (NRD).

A study investigated the drinking motives and personality characteristics likely to increase risk of hazardous alcohol consumption among HRD vs. NRD undergraduates. Researchers identified 42 HRD and 54 NRD participants based on responses to a reading history questionnaire. Participants completed questionnaires assessing hazardous drinking, drinking motives, and alcohol-risk personality traits. Both groups reported similarly

high levels of hazardous drinking. HRD students reported drinking more to conform with peers, and less to enhance positive moods, than NRD students. HRD students also scored higher in the alcohol personality risk of impulsivity.

The results support a unique pattern of motives and personality risks among HRD students, a pattern that likely puts them at increased risk for sustained hazardous drinking, the authors comment. Clinical implications for preventing problem drinking among HRD undergraduates are considered.

Source: MacKay, E., Deacon, S., Elgendi, M.M. et al. Drinking among university students with a history of reading difficulties: motivational and personality risk factors for hazardous levels of consumption. *Ann of Dyslexia* (2022). doi.org/10.1007/s11881-022-00266-0

## Study comparing behaviours of e scooter drivers and cyclists in Norway

A new study in Norway has found electric scooter users are more likely to ride drunk and ride without a helmet than cyclists.

Norwegian researchers examined 3,000 emergency department attendances due to e-scooters and bicycles in Oslo since 2019. They found the rider was wearing a helmet in just 2% of accidents involving an e-scooter, compared to 66% of bike crashes. 40% of electric scooter users were intoxicated when they suffered injuries and more

than 60% happened at night. In comparison, less than 10% cyclists were drunk at the time of their accident and 40% were at night. The researchers called for strict alcohol bans for electric scooter riders and for them to be rationed at night time.

Source: Stray AV, Siverts H, Melhuus K, et al. Characteristics of Electric Scooter and Bicycle Injuries After Introduction of Electric Scooter Rentals in Oslo, Norway. *JAMA Netw Open.* 2022;5(8):e2226701. doi.org/10.1001/jamanetworkopen.2022.26701



## Attention bias and alcohol craving: Differential effects via biological sex and mood

Attentional bias (the tendency to pay attention to some things while simultaneously ignoring others) has been linked to alcohol use, mood, and alcohol craving, with key differences across different types of mood and biological sex. A study examined the relationship between mood and attentional bias as predictors of alcohol craving using ecological momentary assessment (EMA). Exploratory analysis examined these effects as a function of biological sex.

Sixty-nine participants from a Midwestern University carried a mobile device for 15 days and provided ratings of momentary mood (positive mood, anxious mood, and sad mood), alcohol craving, and attentional bias. Data were analysed with associations between craving, mood, and attentional bias examined at both the momentary and between-subjects levels.

Across assessments, positive and negative moods were positively associated with momentary craving, with attentional bias found to operate

differently between men and women. At the within-subjects level, increases in positive mood among men strengthened the attentional bias-craving association, while women showed stronger attentional bias-craving associations when positive mood decreased. At the between-subjects level, trait-like sadness led to positive attentional bias-craving associations for men, however, this was the opposite for women. Similarly, attentional bias-craving associations were positive and robust for men with trait-like positive mood but again the opposite was observed for women.

The findings highlight the importance and nuances of biological sex in the context of mood, attentional bias, and craving. Interventions targeting attentional bias and/ or emotion regulation may yield different outcomes for men and women, the researchers suggest.

Source: Katie R. Moskal et al, Attention bias and alcohol craving: Differential effects via biological sex and mood, *Alcoholism: Clinical and Experimental Research* (2022). doi.org/10.1111/acer.14894

## The impact of lower-strength alcohol products on alcohol purchases by Spanish households

In its action plan (2022–2030) to reduce the harmful use of alcohol, the WHO calls on economic operators to “substitute, whenever possible, higher-alcohol products with no-alcohol and lower-alcohol products in their overall product portfolios, with the goal of decreasing the overall levels of alcohol consumption in populations and consumer groups”.

A paper published in the journal *Nutrients*, investigated substitution at the level of the consumer based on Spanish household purchase data. ARIMA modelling of market research data of 1.29 million alcohol purchases from 18,954 Spanish households was used to study the potential impact of lower-strength alcohol products on reducing household purchases of grams of alcohol between the second quarter of 2017 and the first quarter of 2022.

For households that recently bought either no-alcohol beer or wine (ABV  $\leq$  0.5%), the subsequent associated purchases of higher-strength beers and wines, respectively, and total grams of alcohol were reduced, the more so the higher the

volume of initial purchases of beers and wines. The introduction of 20% ABV variants of same-branded 40% ABV whisky and gin during early 2021 was associated with reduced purchases of grams of alcohol within all spirits and of total grams of alcohol as a result of switching from other spirits products to the 20% variants, although not associated with reduced purchases of grams of alcohol within all variants of the studied same-branded whisky and gin; instead, an increase was observed in this category.

With respect to Spanish household purchase data, the evidence behind the WHO’s call for substitution is substantiated. Further research across different jurisdictions is needed to provide ongoing monitoring of the impact of potential substitution on consumer behaviour and public health, including unintended consequences, with findings from research informing future alcohol policies at all levels.

Source: Anderson P, Kokole D. The impact of lower-strength alcohol products on alcohol purchases by Spanish households. *Nutrients*. 2022; 14(16):3412. doi.org/10.3390/nu14163412



## Health and household environment factors linked with early alcohol use in adolescence

A collaborative team led by researchers from the National Centre for Population Health & Wellbeing Research based in Population Data Science at Swansea University, looked at the relationship between childhood health factors, household environment and alcohol-related outcomes during adolescence using a two-stage approach.

The study findings suggest that factors including a child's hyperactivity and conduct disorder, a lack of family support, household dysfunction, parental use of alcohol, parental lack of interest towards young persons' alcohol use and adverse childhood experiences (ACEs) (e.g., child abuse and family disruption) could predict early alcohol use.

The relationship between preceding health events, household exposures and early alcohol use during adolescence was investigated using a two-stage approach. In stage one, a study population (N = 1,072) were derived from the Millennium Cohort Study (MCS) Wales. MCS data were first linked with electronic-health records. Factors associated with early alcohol use (at eleven years old or younger) were identified. In stage two, analogous risk factors from MCS were recreated for the whole population (N = 59,231) of children (born between 1998-2002 in the Welsh Demographic Service Dataset) using routine data to predict the alcohol-related health events in hospital or GP records.

Significant risk factors from stage two included poor maternal mental (adjusted odds ratio [aOR] = 1.31) and physical health (aOR = 1.25), living with someone with alcohol-related problem (aOR = 2.16), single-adult household (aOR = 1.45), ever in deprivation (aOR = 1.66), child's high hyperactivity (aOR = 3.57), and conduct disorder (aOR = 3.26). Children with health events, whose health needs are supported (e.g., are taken to the doctor), are at lower risk of early alcohol use.

The authors say that health events of the family members and the child can act as modifiable exposures and may therefore inform the development of prevention initiatives. Families with known alcohol problems, living in deprivation, experiencing child behavioural problems and those who are not taken to the doctor are at higher risk of early drinking behaviour and should be prioritised for early years support and interventions to target problem drinking in young people.

Source: Bandyopadhyay A; Brophy S; Akbari A; Demmler J; Kennedy J; Paranjothy S; Lyons RA; Moore S, "Health and household environment factors linked with early alcohol use in adolescence: a record-linked, data-driven, longitudinal cohort study", *International Journal of Population Data Science*, Vol 7, No 1, 2022, Art No 1717, 26pp. [doi.org/10.23889/ijpds.v7i1.1717](https://doi.org/10.23889/ijpds.v7i1.1717)

## Developing an alcohol and other drug serious game for adolescents: considerations for improving student engagement

Academics in Australia explored perceptions of alcohol and other drug (AOD) education and digital game design preferences among Australian adolescents with the goal of identifying key factors to promote engagement in an AOD serious game for Australian secondary school students.

For the study, the researchers conducted focus groups with 36 adolescents aged between 13 and 18 years. Participants described heightened engagement with AOD education that incorporated relatable and relevant real-life stories and interactive discussions. They also expressed a desire for learning to focus on practical strategies to reduce AOD harm and overcome social pressure to use AOD. Participants highlighted the importance of incorporating relatable characters and context-relevant scenarios in promoting engagement,

and identified social elements, player choice, and optimal challenge as important game design considerations.

A focus on meaningful realistic scenarios, relatable characters, relevant information and practical skills may promote high school aged students' engagement with AOD educational content. Game designs incorporating social elements and decision-making opportunities may be conducive to promoting engagement and enhancing learning, the authors say.

Source: Nicholas, J., Mills, B., Hansen, S., Bright, S.J., Boyd, H., Brook, L., Watson, J. and Hopper, L. (2022), *Developing an alcohol and other drug serious game for adolescents: considerations for improving student engagement*. *Australian and New Zealand Journal of Public Health*. [doi.org/10.1111/1753-6405.13287](https://doi.org/10.1111/1753-6405.13287)





## Smoking Drinking And Drug Use In England

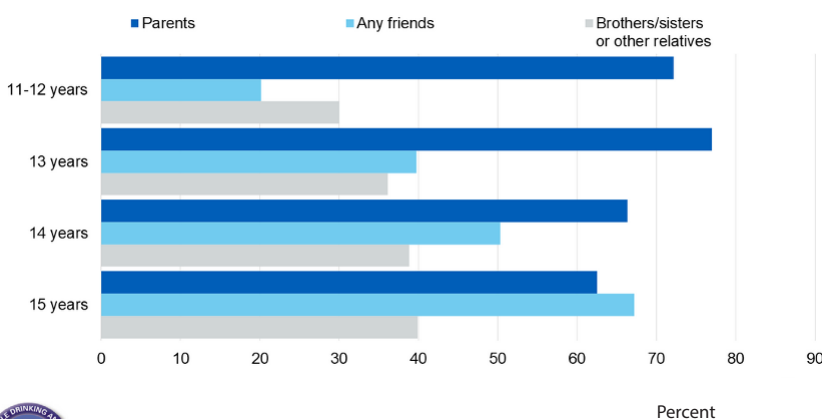
The latest Smoking, Drinking and Drug Use among Young People in England report was published September 6. The survey report is normally produced every two years, but due to the covid epidemic, it was delayed by an additional year.

Key findings from the survey are that there has been a decrease in the prevalence of smoking cigarettes; 12% of pupils had ever smoked (16% in 2018), 3% were current smokers (5% in 2018), and 1% were regular smokers (2% in 2018). Current e-cigarette use (vaping) has increased to 9%, up from 6% in 2018. 21% of 15-year old girls were classified as current e-cigarette users. 18% of pupils reported they had ever taken drugs (24% in 2018), 12% had taken drugs in the last year (17% in 2018), and 6% in the last month (9% in 2018). In 2021, 40% of pupils said they had ever had an alcoholic drink, compared to 44% in 2018. 6% of all pupils said they usually drank alcohol at least once per week, the same as in 2018.

Of pupils who obtained alcohol in the last four weeks, they were most likely to have been given it by parents (75%). Other common sources were to take it from home with permission (50%), and be given it by friends (46%). 8% said they had bought alcohol from a shop or pub in the last 4 weeks, with 15 year olds the most likely to have done so.

76% of pupil's said they usually drank at home (an increase from 66% in 2018). Drinking at someone else's home was the next most common at 42%. 29% said they usually drank at parties with friends, which has fallen from 40% in 2018. 67% of current drinkers said they usually drank with parents, and 52% said they usually drink with friends. Younger pupils who drank were most likely to say they usually drank with their parents, whereas older pupils were more likely to say they usually drank with friends.

Who current drinkers usually drink with, by age



8% of pupils had been drunk in the last four weeks. Of these pupils, the most common adverse consequence reported was feeling ill or sick (46%). 26% said they had vomited, 17% had an argument, 15% damaged clothes or other items, and 13% lost money or other items.

The most commonly held belief among young people was that pupils of their own age drank to look cool in front of their friends (74%). Other common beliefs were because their friends pressured them into it (66%), to be more sociable with friends (62%), and because it gave them a rush or a buzz (62%).

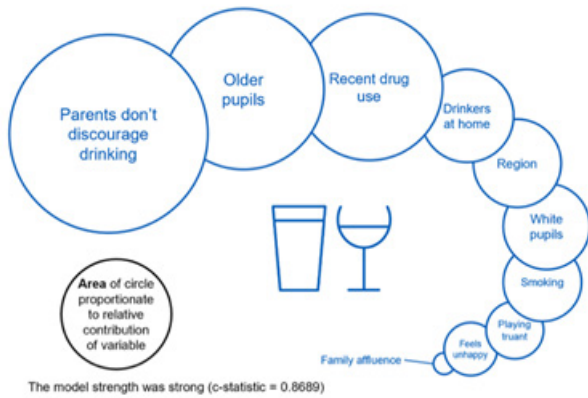
In 2021, 9% of pupils said they had consumed alcohol in the last week, with no significant change since 2016. The proportion increased with age, particularly after the age of 13; from 2% of 11-12 year olds and 4% of 13 year olds, to 10% of 14 year olds, and 20% of 15 year olds. White pupils were most likely to have had an alcoholic drink in the last week, with 11% having done so, compared to less than 4% for other ethnic groups. The prevalence of having had a drink in the last week was significantly lower in London (3%) than any other region. Prevalence in other regions ranged from 8% to 12%. Pupils who drank in the last week were most likely to have done so on Friday (36%), Saturday (68%) and Sunday (32%).

Pupils who lived with people who drank alcohol were more likely to drink alcohol themselves. Only 1% of pupils who lived with only non-drinkers had drunk alcohol in the last week, compared to 9% who lived with two drinkers, and 22% where they lived with three or more drinkers. Pupils who lived with people who drank alcohol were less likely to say their parents do not or would not like them drinking; 19% of pupils who lived with three or more drinkers, compared to 79% of pupils who lived only with non-drinkers.

The characteristics that might be associated with drinking in the last week were explored. 10 factors had a significant association with having drunk alcohol in the last week. It was estimated that having parents who don't discourage drinking had the strongest association, followed by age (being older), and recent drug use.



Factors associated with drinking in the last week



[digital.nhs.uk/data-and-information/publications/statistical/smoking-drinking-and-drug-use-among-young-people-in-england/2021#chapter-index](https://digital.nhs.uk/data-and-information/publications/statistical/smoking-drinking-and-drug-use-among-young-people-in-england/2021#chapter-index)

## Low calorie alcohol retailer Drinkwell secures £1m funding

Low-calorie alcohol retailer Drinkwell has received a £1m investment from a private investor that will enable it to grow its team while launching two new brands, Lean Brew IPA and Traces Wine. The products satisfy the consumer trend for low calorie drinks, with recent research from Mintel identifying a growing trend for low-calorie alcohol products, finding that 33% of drinkers pay close attention to the number of calories in drinks.

Reported in Drinks Business, Tom Bell, founder of DrinkWell, said: "In recent years the lower-calorie alcohol space has exploded in popularity, due to consumers becoming increasingly health conscious. The data backs up the fact that health and diet are really starting to take precedence amongst most consumers, which brands absolutely need to take note of if they want to not only survive but thrive in a rapidly changing market around lifestyle and wellness.

"While we're really seeing the health-conscious consumer segment grow, the data proves some are still unaware of quite how much sugar and how many calories are in the alcohol they're consuming, and the damaging impact this could be having on their bodies."

Following the investment, DrinkWell has plans to add several new features to its retail business, expand into the European market and invest in marketing to further build its brand.

## Scotland to consider restricting alcohol promotions

Scotland's First Minister, Nicola Sturgeon, gave a statement to the Scottish Parliament on the Programme for Government on 6 September 2022. She declared that the government will "introduce a new Public Health Bill to restrict promotions of less healthy food and drink, and consult on proposals to restrict alcohol promotions".

## Offenders targeted as part of Scottish drink and drug drive campaign

Over 290 offences were detected by Police Scotland as drivers under the influence of alcohol or drugs continue to be targeted. The Summer Drink and Drug Drive campaign ran from Monday 4 July to Sunday 17 July.

During the two week long intelligence led campaign, 585 roadside breath screening tests were carried out plus 152 roadside drug screening tests. As a result, officers detected 295 drink/drug driving offences during the campaign.

Chief Superintendent Louise Blakelock, head of road policing, said: "Police Scotland continue to target those who put themselves and others at risk by driving after consuming alcohol or taking drugs.

"There simply is no excuse for drink or drug driving. A number of drivers were reported to us by friends and family and I would encourage anyone with information about a driver who engages in this risky behaviour to contact police and help make our roads safer this summer."

## Spiking: what universities can do

Universities UK have produced a practice note to help universities address the issue of drink spiking. Written by Professor Nicole Westmarland, Director of the

Durham University Centre for Research into Violence and Abuse, with expert guidance and support from the Department for Education Spiking Working Group has been put together with the advice and support of students, campaigners, victims of spiking, the police, academics, and other experts.

[universitiesuk.ac.uk/sites/default/files/field/downloads/2022-08/spiking-what-universities-can-do-practice-note.pdf](https://universitiesuk.ac.uk/sites/default/files/field/downloads/2022-08/spiking-what-universities-can-do-practice-note.pdf)

## Student designed and informed campaign to #endspiking and promote safer nights out for freshers

The Alcohol Education Trust (AET) is a youth charity with 13 years of experience supporting young people age 11- 25 to make safer choices around alcohol and drugs. Having given oral and written evidence at The Home Office/House of Commons Inquiry into Drink Spiking in January and following a detailed survey of students in October 2021 when needle spiking hit the headlines, the charity have worked with students and student organisations to create a campaign to end spiking and help students make safer choices.

The Department for Education in the UK issued guidance this August for tackling drink spiking to universities following the recommendations of a working group that included Universities UK on drink spiking. This is in response to rising levels of spiking and spiking by injection experienced by students last year. Students organising for Sustainability (SOS -UK) and The NUS found in their survey of 2,730 students that 14% had experienced spiking or believed they had been spiked by drugs a third at a local nightclub or venue and a further third at a house party. In response to these findings and students asking for more advice on what to do, who to turn to (70% hadn't reported to anyone that they'd been spiked) and wanting spikers called out, the charity the Alcohol Education Trust has worked with a group of students to create an #endspiking campaign for freshers this year.

Over 80 Universities and FE settings such as Newcastle, Liverpool, Coventry, Oxford Brookes, Salford, Bath Spa, University of The West of England, University of East Anglia, Kings College London and Worcester are using the single use drink testing kits and awareness materials with detailed advice featured on the life-stuff.org website aimed specifically at under 25 year olds. Using the hashtags #endspiking and #spikersRpricks and supported with a Tiktok and Instagram campaign via @life\_stuff.Org, the charity hopes to reverse the trend in spiking and to raise the likelihood of catching perpetrators.

David Sidwick and Joy Allen – The Association of Police and Crime Commissioners Joint Addictions and Substance Misuse Leads commented, "For those who do fall victim to spiking, it is vital they report it to the police as soon as possible.

Victims should never feel ashamed or that it is their fault, and it is vital the police are aware so that perpetrators can be identified and brought to justice, and we can prevent others from falling victim to this heinous crime."

Helena Conibear CEO of the AET commented, 'We are really excited by the take up of this campaign and how determined the police and student welfare services are across the country to end spiking. Only by asking for a drink testing kit, a rapid urine test and reporting to the police via 101 and to student welfare can we ensure that more spikers will be charged and prosecuted.'

Designed by a 25 year old, informed by a student focus group the materials (free for universities and FE colleges) focus on the importance of calling out spikers and reporting incidents. Much better measures are now in place, thanks to the work of the police, good venues and universities including rapid urine testing kits, dedicated welfare staff, safe spaces at venues and drink testing kits. These measures will help ensure the prevalence of 1 in 10 students being spiked reduces (source: The Tab, SOS,-UK YOUgov and AET) and that more perpetrators are prosecuted.

The AET have produced a range of materials including give away keyrings, single drink testing strips, posters and credit card size take-aways to raise awareness of the importance of reporting drink spiking, noticing the signs, knowing where to go for help and support and what to ask for, sign posting to Preventing drink spiking & what to do if a drink is spiked [life-stuff.org/alcohol/drink-spiking/](https://www.life-stuff.org/alcohol/drink-spiking/)





## Evidence on food information – Empowering consumers to make healthy and sustainable choices

The European Commission's Joint Research Centre (JRC) has published the results of four scientific studies related to food information to consumers. It will use the findings of these studies as input for a proposal to revise the EU rules on the information provided to consumers as part of the EU's 'Farm-to-Fork' Strategy and Europe's Beating Cancer Plan. Labelling can help consumers make informed, healthy and sustainable food choices.

The JRC conducted four scientific studies to synthesise the current evidence on front-of-pack nutrition labelling, origin labelling and food information through other means than on labels as well as to analyse what is currently present on the market as regards the labelling of alcoholic beverages.

### Market analysis of the labelling of alcoholic beverages

Under the Regulation on Food Information to Consumers (FIC), alcoholic beverages containing more than 1.2% alcohol by volume are exempt from the obligation to display a list of ingredients and a nutrition declaration on the product label. Business operators can nevertheless provide these on a voluntary basis.

The JRC study found out that, in the EU-27:

The possibility for the voluntary provision of ingredients and nutritional information on the labels of alcoholic beverages has been taken up by the alcoholic beverage industry.

The beer industry stands out among the alcoholic beverages sector, with ingredient information on most (ca. 90%) beers on the market, and energy

information to a lesser extent (ca. 25 to 50% of beer products).

Ciders/perries and 'ready-to-drink' products carry comparable information in the EU. About half of the products hold ingredient information and up to 40% carry energy content information.

Information on ingredients or energy is found less frequently on spirits, and very rarely on wine products.

Label attributes re-directing consumers to off-label ingredients and nutritional information are uncommon.

[publications.jrc.ec.europa.eu/repository/handle/JRC129446](https://publications.jrc.ec.europa.eu/repository/handle/JRC129446)

The findings will feed into current and future food information policy making. They are notably contributing, alongside other factors, to the evidence base informing the impact assessment for the ongoing revision of Regulation EU No 1169/2011 on food information to consumers.

These findings will also support the preparatory work for the upcoming proposal of the European Commission for a legislative framework for sustainable food systems (FSFS) and for a sustainability labelling framework to inform nutritional, climate, environmental and social aspects of food product.

[joint-research-centre.ec.europa.eu/jrc-news/evidence-food-information-empowering-consumers-make-healthy-and-sustainable-choices-2022-09-09\\_en](https://joint-research-centre.ec.europa.eu/jrc-news/evidence-food-information-empowering-consumers-make-healthy-and-sustainable-choices-2022-09-09_en)

## Heineken Ireland partners with Free Now to encourage responsible drinking

Heineken Ireland has announced a partnership in conjunction with taxi app Free Now, to help promote the responsible consumption of alcohol on all occasions.

Launched in August and running until 18 September, the campaign offers consumers the chance to redeem a free €10 voucher with the Free Now app, on behalf of Heineken Ireland, to help encourage people to travel safely after drinking, while reminding consumers that 'when you drive, never drink'.

There will be 5,000 vouchers to be won by consumers in Dublin, Cork, Limerick and Galway. Consumers will be in with the chance of winning a voucher by logging on to [heineken.com](https://heineken.com) and entering their details.

Heineken 0.0%, launched four years ago and the company's is now focussing on ways of making draught pints of the zero brand available without compromising quality. Heineken is also trialling a more standard keg route for Heineken 0.0% in controlled locations.



## Proposed guidelines for alcohol consumption in Canada

In August, the Canadian Centre on Substance Abuse and Addiction (CCSA) published a final report on the latest update of Canada’s Low-Risk Alcohol Drinking Guidelines for public consultation. The publication follows two years of research and a review of more than 5,000 peer-reviewed studies.

In the introduction to the report, the authors state that Canada’s Guidance on Alcohol and Health is intended to replace Canada’s Low-Risk Alcohol Drinking Guidelines. Its focus is to provide people living in Canada with accurate and current information about the risks and harms associated with the use of alcohol. The guidance should help people to make well-informed and responsible decisions about their alcohol consumption. The authors say that a fundamental idea underlying this project is that people living in Canada have a right to know.

The Guidance on Alcohol and Health is also intended to form the evidence base for future alcohol policy and prevention resources, with a view to changing Canada’s drinking culture and curbing the normalization of harmful alcohol use in society. The production of the new guidance followed a rigorous and transparent approach to assess the impact of various levels of alcohol use on deaths and disabilities. The analyses were based on the most recent data and methods, which have evolved since the Low-Risk Alcohol Drinking Guidelines were released over a decade ago.

Canada’s Guidance on Alcohol and Health consists of seven key takeaways:

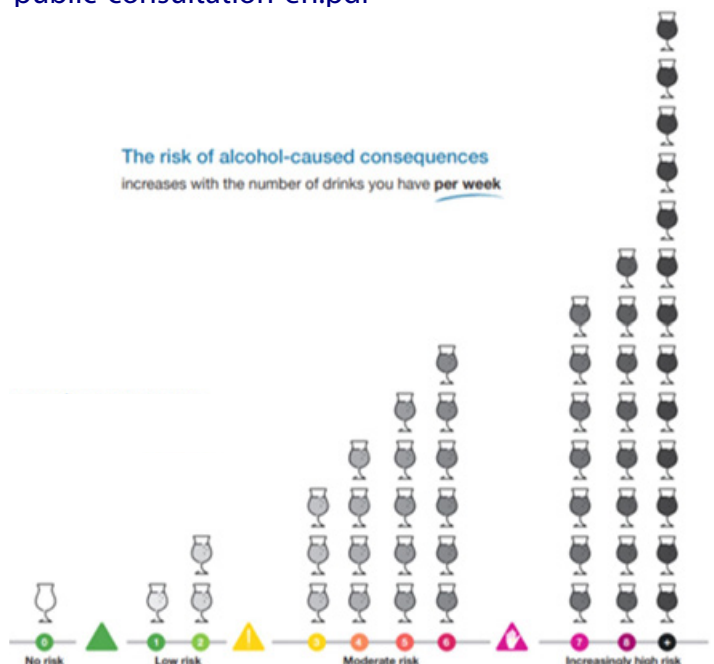
1. All levels of alcohol consumption are associated with some risk, so drinking less is better for everyone.
2. Among healthy individuals, there is a continuum of risk for alcohol-related harms where the risk is:
  - Negligible to low for individuals who consume two standard drinks or less per week;
  - Moderate for those who consume between three and six standard drinks per week; and
  - Increasingly high for those who consume more than six standard drinks per week.
3. On any occasion, any level of consumption has risks, and with more than two standard drinks, most individuals will have an increased risk of injuries or other problems.
4. Disproportionately more injuries, violence and deaths result from men’s drinking.
5. Above low levels of alcohol consumption, the health risks increase more steeply for women than for men.
6. It is safest not to drink while pregnant and during the pre-conception period.
7. For women who are breastfeeding, it is safest not to use alcohol.

The report authors comment that implementation of the Guidance on Alcohol and Health requires a cultural shift that, by and large, can only be orchestrated by governments through policies and collaboration with employers, healthcare providers and community stakeholders to make people aware and better at managing their risks.

Hence, the evidence reviewed and presented in the report should influence provincial and federal governments to implement alcohol policies focused on reducing alcohol-related harms and promoting health and wellness. Information and advice are useful and necessary for people in Canada, but an environment supporting healthier and more informed-behaviour choices around alcohol is an absolute pre-requisite for a healthy society.

The public consultation is open until September 23, 2022.

[ccsa.ca/sites/default/files/2022-08/CCSA-LRDG-Update-of-Canada%27s-LRDG-Final-report-for-public-consultation-en.pdf](https://ccsa.ca/sites/default/files/2022-08/CCSA-LRDG-Update-of-Canada%27s-LRDG-Final-report-for-public-consultation-en.pdf)



## Monitoring the Future panel study annual report

Monitoring the Future (MTF) is an ongoing research program conducted at the University of Michigan’s Institute for Social Research under a series of investigator-initiated, competing research grants from the National Institute on Drug Abuse beginning in 1975. The integrated MTF study includes annual surveys of nationally representative samples of 8th, 10th, and 12th grade students, as well as a subset of 12th grade students followed into adulthood from each graduating class. Repeating these annual cross-sectional surveys over time provides data to examine behaviour change across history in consistent age segments of the adult population, as well as among key subgroups.

The panel study now has over 108,000 individuals, with approximately 28,500 surveyed each year including young adults ages 19 to 30 and adults ages 35 to 60. These data, gathered on national samples over such a large portion the lifespan, are extremely rare and can provide needed insight into the epidemiology, etiology, and life course history of substance use and relevant behaviours, attitudes, and other factors. The current report is the latest in a series of publications dating back to 1986 and updated annually since then.

Amongst young people, aged 19 to 30, the most prevalent substances in 2021 were: Alcohol (81.8% use in past 12 months, 66.3% use in past 30 days), marijuana (any mode) (42.6%, 28.5%), vaping nicotine (21.8%, 16.1%), vaping marijuana (18.7%, 12.4%), cigarettes (18.6%, 9.0%) and other drugs (18.3% 7.5).

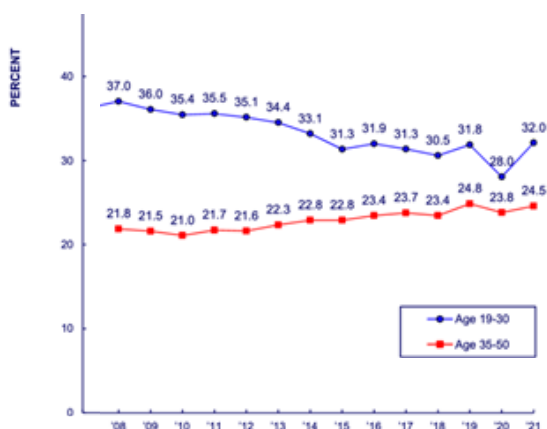
There were notable significant changes from 2020 to 2021 for alcohol with a decrease in daily drinking and an increase in binge drinking among young adults from 2020 to 2021, thereby returning to the pre-pandemic levels of 2019. In 2021, young adults had historically high prevalence levels of high-intensity drinking: In 2021, 13.1% of young adults had 10+ drinks in a row in the past 2 weeks, which was the highest recorded since it was first measured in 2005. In 2021, young adults had historically low prevalence levels of alcohol use with measures of drinking in the past 12 months, past 30 days, daily drinking, and binge drinking have been decreasing over the past 10 years.

For adults aged 35 to 50, the most prevalent substances used by adults ages in 2021 were: Alcohol (84.8% use in past 12 months, 71.4% use in past 30 days), marijuana (24.9%, 15.8%), cigarettes (14.5%, 10.4%), other drugs (11.2%, 5.5%). Notable significant changes from 2020 to 2021 included a 1 year change in daily drinking in 2021 which returned it to pre-pandemic levels (down from 12.0% in 2020 to 9.2% in 2021).

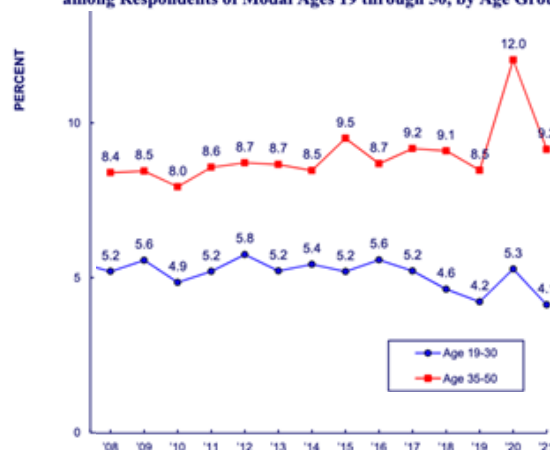
Longer-term trends among adults ages 35 to 50 in the past 10 years include: Alcohol use in the past 30 days and binge drinking in the past 2 weeks have also increased in the past 10 years (from 68.9% in 2011 to 71.4% in 2021 and from 21.7% in 2011 to 24.5% in 2021, respectively).

Source: Patrick, M. E., Schultenberger, J. E., Miech, R. A., Johnston, L. D., O’Malley, P. M., & Bachman, J. G. (2022). Monitoring the Future Panel Study annual report: National data on substance use among adults ages 19 to 60, 1976-2021. Monitoring the Future Monograph Series. University of Michigan Institute for Social Research: Ann Arbor, MI. doi.org/10.7826/ISR-UM.06.585140.002.07.0001.2022

**ALCOHOL**  
Trends in 2-Week Prevalence of Binge Drinking (5+ Drinks in a Row) among Respondents of Modal Ages 19 through 50, by Age Group



**ALCOHOL**  
Trends in 30-Day Prevalence of Daily Use among Respondents of Modal Ages 19 through 50, by Age Group





## Mandatory energy labelling in Australia and New Zealand

Alcohol producers could soon be required to add 'energy information' such as calories / kilojoules, following preliminary analysis by Food Standards Australia New Zealand (FSANZ).

A proposal to amend the Australian and New Zealand Food Standard Code to require the energy labelling of alcohol entered the assessment phase in April 2022, with consultation of the industry and others occurring between June and July. The public consultation is due to open in late September.

FSANZ is likely to decide whether to change its Code to require calorie labelling for alcoholic beverages in mid-March 2023 and if approved, a notification to the Food Ministers' meeting would follow later in March. In the event that there is no further review is requested, FSANZ anticipates 'gazetted' or acceptance into the code in the middle of 2023.

[foodstandards.gov.au/code/proposals/Documents/ELAB%20-%20Admin%20assessment%20report.pdf](https://www.foodstandards.gov.au/code/proposals/Documents/ELAB%20-%20Admin%20assessment%20report.pdf)

## Alcohol.Think Again One Drink campaign showing impressive results

In Australia, The Alcohol.Think Again One Drink campaign, which informs and empowers the community to have alcohol-free pregnancies, is showing impressive results and making future parents think before they drink.

The 'One Drink' campaign, funded by the Western Australian Mental Health Commission and developed in collaboration with Cancer Council WA, aims to inform adults across WA that there is no safe level of alcohol during pregnancy and that women who are pregnant or planning a pregnancy should not drink alcohol. The campaign messages are consistent with the National Health and Medical Research Council's Australian Guidelines to Reduce Risks from Drinking Alcohol.

The campaign aired for an initial six-months from January to June 2021 and was disseminated state-wide using television, radio, out-of-home (e.g., billboards, shopping centre ads), and online media (e.g., Internet banner ads and social media).

To evaluate the impact of the campaign, George Institute researchers analysed data from 889 respondents, approximately two-thirds female, one-quarter of which were either pregnant or planning a pregnancy. Two-thirds of respondents were in the 26-45 year age group, there was an even spread across socioeconomic status, and one-quarter resided in regional or remote areas.

As a result of campaign exposure, a large majority of respondents said they were more concerned about drinking during pregnancy (85%) and most female respondents said they would be much less likely to use alcohol during a pregnancy (83%). One-third of female respondents (33%) reported that after seeing the campaign they had decided

not to drink alcohol at all while pregnant. Just over half the sample (54% and 53% of those pregnant or trying to conceive) indicated that the 'One Drink' campaign had taught them something new.

The findings, published in the lead up to International FASD Awareness Day on September 9, suggest that information about how alcohol reaches and affects the fetus and strategies for avoiding alcohol in social situations, could further support intentions to abstain.

Source: Pettigrew, S, Booth, L, McCausland, T, Kennington, K, Miller, M, Bowden, J, et al. Evaluation outcomes of an alcohol and pregnancy campaign targeting multiple audiences. *Drug Alcohol Rev.* 2022. [doi.org/10.1111/dar.13541](https://doi.org/10.1111/dar.13541)



## A world history of women and alcohol

The Guardian features an interview with Mallory O'Meara who has recently written a book 'A World History of Women and Alcohol'. O'Meara traces women's involvement with alcohol back to its origins and finds that women have not only been drinking since alcohol was invented, but they've also been making and serving it since the beginning too.

[theguardian.com/lifeandstyle/2022/aug/21/women-were-the-very-first-brewers-yet-the-history-of-alcohol-comes-with-a-double-shot-of-sexism](https://www.theguardian.com/lifeandstyle/2022/aug/21/women-were-the-very-first-brewers-yet-the-history-of-alcohol-comes-with-a-double-shot-of-sexism)

## Gen Z: Drinking less, but what about alcohol-related harm?

Wing See Yuen from the University of New South Wales in Sydney presented at the NDARC Webinar series on Thursday 8 September 2022. This webinar, which is available to watch online, explored recent changes in young peoples' experience of alcohol-related harm and how these harms develop in adolescence. Since the early 2000s, young people have been drinking less alcohol, and many are choosing not to drink at all. However, it is unclear whether this means that young people are now experiencing fewer harms related to alcohol use.

The one-hour webinar addressed the following questions: Have alcohol-related harms decreased in young people since the early 2000s? Of these recent generations of young people, who is still experiencing alcohol-related harm? How do alcohol-related harms develop and escalate in these recent generations of young people?

[ndarc.med.unsw.edu.au/resource/gen-z-drinking-less-what-about-alcohol-related-harm](http://ndarc.med.unsw.edu.au/resource/gen-z-drinking-less-what-about-alcohol-related-harm)

## Isle of Man changes measure sizes for alcohol

In the Isle of Man, the volume of some measures for alcohol sold in pubs, clubs and restaurants will be reduced in September.

Measures for spirits are to be changed from imperial to metric measures, in line with England and Wales as it has become increasingly difficult for licensees to get hold of imperial measuring equipment.

Under the changes, a measure of spirits will be reduced by 34ml to 25ml and although the legal measures for wine will remain at 125ml and 175ml, the deregulation of less than 75ml will allow for smaller quantities to be served at events like wine tastings.

Measures of fortified wine sold by the glass will also be reduced to "promote sensible drinking", the Office of Fair Trading (OFT) said. Madeira, port and sherry will be sold in 50ml or 70ml measures, instead of the current 125ml and 175ml.

The trading standards body is calling for licensees to "prepare and alter prices accordingly".

## The proportion of Australians who drink alcohol falls in the past year

New data from Roy Morgan's Alcohol Consumption Report shows the proportion of Australians who drink alcohol dropped by 1.8 percentage points to 67.9% in the 12 months to June 2022.

While wine is still Australia's most popular drink the number of Australians drinking it dropped by 1.7 per cent points from a year ago. Beer also lost ground in the last 12 months down 2.3 percentage points on a year ago and spirits were down 2.8 percentage points.

While the number of Australians drinking beer, wine and spirits declined, sales of RTDs – driven by the popularity of hard seltzers – increased by 3.2 percentage points.

Roy Morgan CEO Michele Levine said: "Although the 'big three' alcohol types of wine, beer and spirits are all down on a year ago the consumption of wine and spirits is still well above pre-pandemic levels. Wine remains the most popular alcoholic drink with 44.6% of Australians adults drinking wine in an average four weeks. By age, those most likely to be drinking wine are aged 65-79 (51.1%), however only people aged 50-64 have increased their wine consumption from a year ago, up by 1.2 percentage points.

"A deeper look into the RTDs market shows the increasing popularity of seltzers over the last few years is continuing to drive the increasing consumption of RTDs generally. 'Hard seltzers' began to hit the Australian market in significant numbers in 2019, just before the pandemic struck, and these newer alcoholic products are still attracting an increasing array of customers.

"Although beer did enjoy an increase in consumption during the last two years only 33.3% of Australian adults now drink beer in an average four weeks. The decline in beer drinking since 2005 has been more sustained than any other type of alcohol and the early signs are that the short-term pandemic impact on beer drinking has not been enough to halt the long-term trend.

[roymorgan.com/findings/australian-alcohol-consumption-declines-from-pandemic-highs-of-2021-but-consumption-of-rtDs-at-a-record-high](http://roymorgan.com/findings/australian-alcohol-consumption-declines-from-pandemic-highs-of-2021-but-consumption-of-rtDs-at-a-record-high)



## Global Healthy Ageing & Prevention Index to track progress and drive action

Over the coming year, the International Longevity Centre UK (ILC) will create the Healthy Ageing and Prevention Index, which will track, for the first time, how healthily countries across the G20 are living and ageing, and the impact on the economy and environment.

Bringing together data on life expectancy, health outcomes and the broader societal impacts of the economy and environment, the Index will map how countries across the G20 fare in promoting healthy ageing, preventative health and tackling health inequalities, and provide an opportunity to share best practice.

David Sinclair, Chief Executive of ILC said: "it's clear that we're living longer but not necessarily healthier lives. In an ageing world and as inequalities are on the rise, we need to focus spending on preventative healthcare. From vaccines to screenings to management of existing conditions, there's so much we can do to keep people healthier for longer."

Global data analysis by ILC, the UK's specialist think tank on the impact of longevity on society, has found that:

- By 2050, the proportion of people aged 50 and over will increase by 11 percentage points, resulting in 40% of the G20 population being aged over 50.
- G20 citizens aged 50 and over collectively lived 118 million years with disabilities in 2019 due to largely preventable diseases.
- Across the G20, preventable conditions cost economies 1.02 trillion USD in yearly productivity loss among those aged 50-64 – this is roughly equivalent to the estimated loss in global worker income for the first half of 2021 as a result of COVID-19.

Alongside the Index, ILC will be working with like-minded international, third-sector and business leaders and holding a number of international events, including alongside the G20 in India and the G7 in Japan next year to shape the debate on healthy ageing and prevention. India's G20 presidency in particular will be an opportunity to put healthy ageing on the international agenda, as countries emerge from the pandemic.

## 2022 MCA Symposium on Alcohol & Health

The next 2022 Medical Council on Alcohol (MCA) symposium will take place on 16 November and will focus on the theme of alcohol and health.

Dr Ewan Forrest will consider how to reduce deaths from alcohol-related liver disease, and Dr Elena Dimova will present on the findings of a qualitative study that explored the experiences of Minimum Unit Pricing among people experiencing homelessness and street drinking, and the support services that work with them in Scotland.

[m-c-a.org.uk/events/2022\\_symposium\\_programme](http://m-c-a.org.uk/events/2022_symposium_programme)

## The Northwest Territories' liquor laws

In 2020, the Government of the Northwest Territories (GNWT) Department of Finance began a comprehensive review of liquor legislation in the Northwest Territories (NWT) in order to identify how liquor laws can be modernized, streamlined and responsive to the needs of NWT residents.

The Review's findings in the form of 66 recommendations for Liquor Administration, Community Control, Advertising, Local Liquor Delivery, retail, licensing, manufacturing as well as education and enforcement were published in September.

[fin.gov.nt.ca/sites/fin/files/resources/recommendations-liquorlegislationreview.pdf](http://fin.gov.nt.ca/sites/fin/files/resources/recommendations-liquorlegislationreview.pdf)

## The Art of Drinking campaign

AB InBev have introduced The Art of Drinking - four simple things that anyone (of legal drinking age) can do to practice Smart Drinking and moderation. The Art of Drinking tips include: Alternating a no alcohol beer every other round, drinking a glass of water between beers, eating food while you drink, and pre-ordering a taxi to take you home.

[ab-inbev.com/news-media/smart-drinking/the-art-of-drinking-four-ways-to-help-make-every-experience-with-beer-a-positive-one/](http://ab-inbev.com/news-media/smart-drinking/the-art-of-drinking-four-ways-to-help-make-every-experience-with-beer-a-positive-one/)





**AIM – Alcohol in Moderation was founded in 1991 as an independent not for profit organisation whose role is to communicate “The Responsible Drinking Message” and to summarise and log relevant research, legislation, policy and campaigns regarding alcohol, health, social and policy issues.**

### **AIM Mission Statement**

- To work internationally to disseminate accurate social, scientific and medical research concerning responsible and moderate drinking
- To strive to ensure that alcohol is consumed responsibly and in moderation
- To encourage informed and balanced debate on alcohol, health and social issues
- To communicate and publicise relevant medical and scientific research in a clear and concise format, contributed to by AIM’s Council of 20 Professors and Specialists
- To publish information via [www.alcoholinmoderation.com](http://www.alcoholinmoderation.com) on moderate drinking and health, social and policy issues – comprehensively indexed and fully searchable without charge
- To educate consumers on responsible drinking and related health issues via [www.drinkingandyou.com](http://www.drinkingandyou.com) and publications, based on national government guidelines enabling consumers to make informed choices regarding drinking
- To inform and educate those working in the beverage alcohol industry regarding the responsible production, marketing, sale and promotion of alcohol
- To distribute AIM Digest Online without charge to policy makers, legislators and researchers involved in alcohol issues
- To direct enquiries towards full, peer reviewed or referenced sources of information and statistics where possible
- To work with organisations, companies and associations to create programmes, materials or policies that communicate responsible alcohol consumption messages or work to reduce alcohol related harm.

### **AIM Social, Scientific And Medical Council**

**Helena Conibear**, Executive and Editorial Director, AIM-Alcohol in Moderation, UK

**Professor Alan Crozier**, Research Associate, Department of Nutrition, UC Davis, US

**Professor R. Curtis Ellison**, MD, Professor of Medicine, Section of Preventive Medicine & Epidemiology, Boston University School of Medicine, Boston, MA, US

**Harvey Finkel MD**, Clinical Professor of Medicine (Oncology and Haematology), Boston University School of Medicine, US

**Professor Adrian Furnham**, Professor in Psychology and occupational psychology, University College London, UK

**Giovanni de Gaetano, MD, PhD**, President, IRCCS Istituto Neurologico Mediterraneo NEUROMED, Pozzilli, Italy

**Tedd Goldfinger FACC, FCCP**, President, Desert Heart Foundation, Tucson, University of Arizona, US

**Lynn Gretkowski MD**, Obstetrics and Gynaecology, Faculty member Stanford University, US

**Professor Dwight B. Heath**, Anthropologist, Professor Emeritus of Anthropology, Brown University, US

**Professor OFW James**, Emeritus Professor of Hepatology, Newcastle University, UK

**Arthur Klatsky MD**, adjunct investigator at the Kaiser Permanente Northern California Division of Research, US

**Ellen Mack MD**, Oncologist

**Professor JM Orgogozo**, Professor of brain science, Institut de Cerveau, University of Bordeaux, France

**Stanton Peele PhD**, Social Policy Consultant, US

**Prof Susan J van Rensburg MSc, PhD**, Emeritus Associate Professor in the Division of Chemical Pathology, Tygerberg Hospital, University of Stellenbosch, South Africa

**Dr Erik Skovenborg**, Scandinavian Medical Alcohol Board

**Creina S Stockley PhD, MBA**, Principal, Stockley Health and Regulatory Solutions; Adjunct Senior Lecturer, The University of Adelaide

**Arne Svilaas MD, PhD**, Chief Consultant, Lipid Clinic, Oslo University Hospital, Oslo, Norway.

**Professor Pierre-Louis Teissedre, PhD**, Faculty of Oenology–ISVV, University Victor Segalen Bordeaux, France

**Dag Thelle MD, PhD**, Senior Professor of Cardiovascular Epidemiology and Prevention, University of Gothenburg, Sweden; Senior Professor of Quantitative Medicine at the University of Oslo, Norway

**David P van Velden MD**, Dept of Pathology, Stellenbosch University, Stellenbosch, South Africa

**David Vauzour PhD**, Senior Research Associate, Department of Nutrition, Norwich Medical School, University of East Anglia, Norwich, UK

