

Youth Trends in Drinking

The Department of Health released a revised report on smoking, drinking and drug use among young people in England (2004) on the 15th April. The comprehensive survey of 10,000 pupils in 313 schools in England provides a snapshot of trends each year in drinking, smoking and drug use.

On the surface the figures look quite encouraging, with a noticeable decrease in drug use (down in the last year from 21% to 18% and in the last month from 12% to 10%). 32% of 15 year olds will have used drugs in the last year however and usage is slightly higher amongst boys than girls (11% cannabis, 6% volatile substances, 3% poppers). 4% is class A drug use.

Regular smoking amongst 11- 15 year olds remains static at 9% (down from 13% in 1996) and just 1% of 11 year olds smoke against 26% of 15 year old girls and 16% boys. Girls are more likely to be regular smokers than boys (10% against 7%).

Drinking amongst 11- 15 year olds offers a stable picture with 23% of that age group drinking some alcohol in the last week. Just 4% of 11 year olds will have had a drink in the last week against 45% of 15 year olds. Girls are now drinking as much as boys for the first time – and the weekly unit intake of this age group

is at 10.7 units - doubling since 1990 (5 units) but stable since 1998. 15 year olds drink 13 units on average a week, but their patterns of drinking are not analysed and one presumes these are consumed on one or two occasions a week.

So, the situation is stable for boys, girls continue to drink and smoke more but use less drugs than boys. Trends in the UK stand in stark contrast to those in France.

The sober French youth

IREB have released a comprehensive analysis of last years ESPAD findings for France. The survey questioned 16,000 pupils, aged between 12-18 in 2003 over their alcohol usage in the last 30 days. 90% of the group had drunk alcohol at some point in their lives, but 33% of boys and nearly 50% of girls are non-drinkers. Of the 18 year olds, 38% of girls and 26% of boys do not drink at all – both percentages increasing sharply since 1999.

In terms of beverage choice, cider and champagne are offered from an early age within the family context and beer and spirits increase in popularity as teenagers go out. Alcohol is associated with celebration amongst occasional drinkers, with 28% of young people drinking it once or twice during the month. By 18

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spirits are the most popular choice for girls in France.

USA

The National Institute of Health's study of youth drinking trends 1975-2002 assessed the drinking habits of 80,000 12-18 year olds. The study estimates that about 12% of 8th graders have had five or more drinks within the last two weeks and 29% of 12th graders (a decline from 32% in 1998). According to the study under age drinking has decreased substantially since the 1970s, but has remained at a plateau since 1990. White students are three times as likely as black students to binge drink (33% against 11%). Male 12th graders in 2003 were more likely to binge than females (34% versus 22%).

Interestingly the National Survey on Drug use and Health (NSDUH) report released on the 1st April found that 66% of 12-17 US youths used no alcohol in the last year and just 8% reported binge drinking and 2.6% heavy alcohol use. Further detailed statistics can be found via www.cdc.gov/mmwr/preview/mmwrhtml and www.oas.samhsa.gov/2k5/alcdelinquent

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Department of Health Smoking, Drinking And Drug Use Among Young People In England In 2004:

When last had a drink,	When last had a drink, by sex 1998-2004								
	1988 %	1990 %	1992 %	1994 %	1996 %	1998 %	2000 %	2002 %	2004 %
Boys									
During the last week	24	22	24	26	27	23	25	25	23
One to four weeks ago	19	15	12	14	15	15	13	14	14
One to six months ago	12	13	13	11	12	12	11	12	12
More than 6 months ago	11	15	12	10	9	12	11	11	10
Never had a Drink	35	35	37	39	37	38	40	38	41
Girls									
During the last week	17	20	17	22	26	18	23	23	23
One to four weeks ago	17	14	12	16	13	15	15	15	16
One to six months ago	13	13	14	12	13	13	11	12	11
More than 6 months ago	11	15	12	10	10	11	10	9	10
Never had a Drink	41	38	44	40	38	42	41	40	41
Both									
During the last week	20	21	21	24	27	21	24	24	23
One to four weeks ago	18	15	12	15	14	15	14	14	15
One to six months ago	12	13	13	11	12	13	11	12	11
More than 6 months ago	11	15	13	10	9	11	10	10	10
Never had a Drink	38	36	41	39	38	40	40	39	41

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SWEDEN

The Commission has taken Sweden to the ECJ demanding the tax difference between beer and wine to be solved. The issue has been run by the SSWS since 1998. After some debate, the wine tax was reduced by 18 %. This was, however, only 50 % of the needed reduction to get back to the situation in 1996, before the huge tax reduction on beer.

The needed reduction per litre on wine between 8.5 and 15 % abv is appr SEK 5. An alternative would be to increase the beer tax.

The Swedish state-run alcohol retailer Systembolaget is to set up a subsidiary whose aim will be to cut alcohol consumption. The as yet un-named subsidiary will also look to cut accidents and injuries that are alcohol related.

It has been reported that Systembolaget was to spend SKK100m (US\$14.1m) on the subsidiary over a five-year period.

NEW ZEALAND

New Zealand's self regulating procedure for alcohol advertising is to come under review. Associate health minister Damien O'Connor said the government had agreed that there were issues relating to the self-regulatory framework that needed to be looked at. In a statement he said: "Consequently, the Government has asked the Inter-Agency Committee on Drugs to look at options for a Government-led review." The move follows a rejected petition calling for an inquiry into the effects of alcohol promotion.

EUROPE

At a World Health Organization European Meeting in Stockholm in April it was reported that 600,000 people in Europe died of alcohol related harm in 2002. In Western Europe the consumption per capita was 12.9 litres in 2002, in Russia 13.9 litres, while the average figure over the world was 5.8 litres. Increased alcohol taxes, lower allowances, stronger rules for advertising and prevention work in road traffic, workplaces and health care are the main parts of a proposal to be discussed in Romania in September.

RUSSIA

President Putin has given his approval for Russia's law on the sale and consumption of beer. Last year he rejected an original bill that was deemed too draconian, as it outlawed consumption of beer in public. The new version allows consumers to drink in public but still forbids the sale of beer and beer-based products in children's educational institutions, medical organisations, on public transport and to underage children. Beer and beer-based products containing less than 0.5% of ethyl alcohol are not covered by the bill.

SPAIN

The Spanish authorities have once again reiterated their support for the country's wine industry and the health benefits of moderate wine drinking. Agriculture Minister Elena Espinosa expressed the government's support during a presentation of the results of new research conducted by Barcelona university hospital. The research into wine's health benefits on cardiovascular disease showed that moderate wine drinking had positive effects on preventing arterial lesions and thrombosis whilst also showing anti-inflammatory properties.

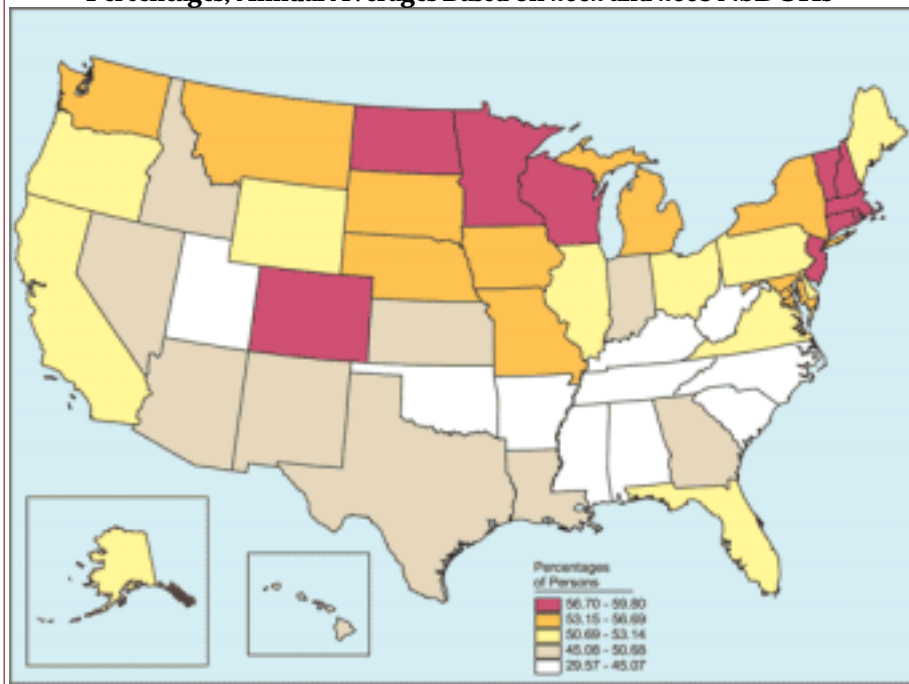
Elena Espinosa claimed that these latest findings may well help to recruit new consumers and open new markets provided quality improvements and clear statements on wine's health benefits were conveyed to consumers. The Spanish Agriculture Ministry has already distinguished itself in the past by funding the promotion of wine as part of a balanced diet and legally separating wine from other alcoholic drinks.

FINLAND

In 2004 the Finnish treasury lost almost 300 million euros from alcohol taxation. This was equal to 21.5 %. This is due to the Finnish tax cut in March and the increased private imports from Estonia. The loss is in line with the estimations.

Youth Trends in Drinking (Continued from Front Page)

**Alcohol Use in Past Month among Persons Aged 12 or Older, by State:
Percentages, Annual Averages Based on 2002 and 2003 NSDUHs**

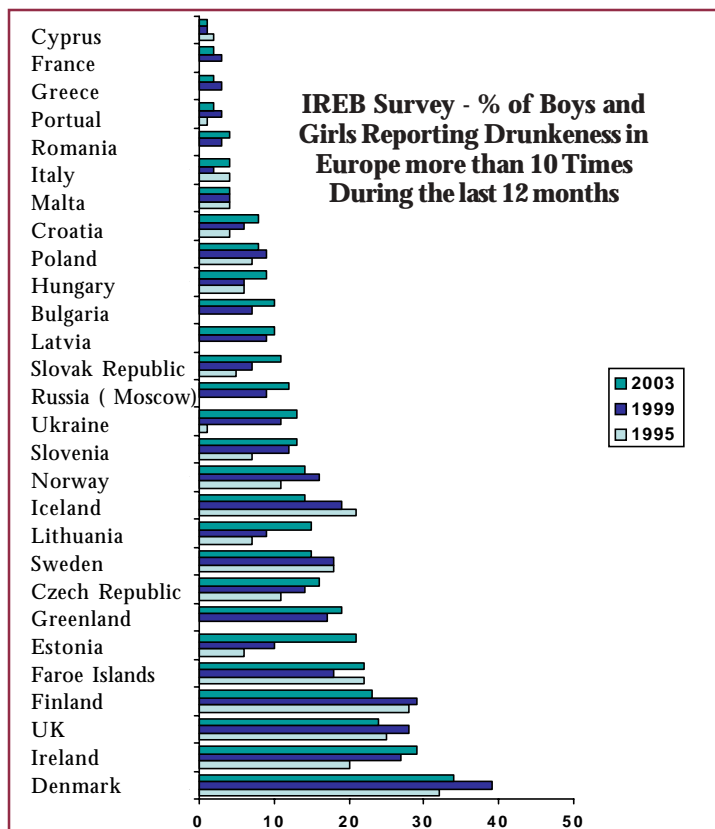


Drunkenness among young people in Europe

Denmark, Ireland, the UK and Finland lead Europe in the acceptability of drunkenness amongst young people – it hardly exists in Mediterranean countries such as Greece, Italy or France. There are signs that the UK boys in particular are sobering up at last with a sharp drop

of drunkenness from 30% in 1999 to 24% in 2003, whereas Ireland drunkenness continues to increase (see table).

For further sources of information, please visit <http://www.dh.gov.uk/PublicationsAndStatistics> and www.ireb.com. **There is a full analysis of world consumption trends on page 11.**



US Low BAC Developments

Several US states have introduced bills lowering the legal blood alcohol content level this year, often for subgroups of the population, like parents:

The Utah legislature passed a law establishing zero tolerance for anyone with a Drinking Under the Influence of Alcohol conviction(DUI). First offenders would not be able to drive with a BAC above 0.00% for two years; a second offense would impose zero tolerance for 10 years.

Legislation has been introduced in the New Mexico legislature to establish a 0.06% BAC for repeat offenders. Oregon is considering a bill that would lower the BAC for DUI offenders to 0.05% for 15 years after a conviction. North Carolina is debating a bill that would create a zero tolerance (0.00%) provision for anyone driving children; New York's Rep. Felix Ortiz (D-Brooklyn) has drafted legislation to lower the BAC to 0.06% for everyone. Maine has a bill that would set 0.04% BAC (half the current legal limit) as the new arrest threshold for everyone.

This latest spate of legislation builds upon previous year changes when Utah established a 0.05% BAC standard for repeat offenders with minors in the car, while in Virginia, legislators passed a law establishing a 0.02% BAC arrest threshold for those convicted of DUI in the past five years.

A spokesman for ABI commented that whilst many of these proposals are limited to certain portions of the population, such as parents, they are "wedge" issues and there is concern that once lawmakers establish that it is dangerous for a parent to drive at 0.02%, they may feel that no one should drive with a BAC above that level.

UK TV Ad Restrictions

The UK Portman Group is contesting proposed new rules that regulate the advertising of alcoholic products on television.

The proposals, they claim, will prevent the industry from making effective points about irresponsible drinking by producing hard-hitting commercials that portray the act in dramatic surroundings.

In particular, The Portman Group objects to a draft rule barring the depiction of drinking in an "environment that is hazardous". This, argues the group, could prevent ads being set in environments such as a desert or a jungle or even a balcony.

"If the rules relating to such advertisements are unduly restrictive, either the advertisements will lack impact or companies will decide not to produce them at all," the Portman Group said in a submission to media regulator Ofcom and its enforcer, the Advertising Standards Authority. "We consider that the [British Code of Advertising Practice] should not be used to deter drinks companies from producing effective campaigns designed solely to promote responsible attitudes and behaviour".

Allied Domecq Announces Sensible Drinking Message for UK Spirits Portfolio

Drinks group Allied Domecq has announced that from April 2005 it is to progressively introduce a sensible drinking message in addition to alcohol unit labelling to all its spirits and fortified wine brands sold in the UK.

In line with Allied Domecq's commitment to promoting responsible drinking through a process of education and information, the new labelling will include the total number of units in the bottle, the Government's daily-recommended number of units for men and women and will state how many units of alcohol are in a standard drink. In addition, they will also carry contact details of the 'drinkaware' website from where further information and support can be obtained.

On making the announcement Philip Bowman CEO of Allied Domecq said,

California Step Closer to AWOL Ban

The California Assembly Governmental Organization Committee has passed legislation that would ban the controversial "alcohol without liquid" (AWOL) device, which allows consumers to inhale alcohol by mixing alcohol with pure oxygen. The bill now moves to the full Assembly for passage.

The bill, AB 273, sponsored by Assemblyman Joe Baca, Jr., would prohibit the sale or use of these machines or devices. Penalties include a fine of US\$250 for the use of the machine and up to US\$25,000 for the sale these devices.

President of the Distilled Spirits Council, Peter Cressy, said: "We commend Assemblyman Baca and the Committee for keeping these irresponsible devices out of California and we urge other states to do the same."

In August last year, Spirit Partners announced that it has acquired the exclusive license to market the AWOL technology in the US. The company has denied that it is an irresponsible product, saying it was "simply a fun, new, exciting way for adults to enjoy alcohol in a responsible manner."

Beringer Launch a Wine for Women

Beringer has developed an early harvesting method to create a wine for the increasing number of health-conscious women. The wine called 'White Lie' has 25% fewer calories than regular Chardonnay and a lower than usual alcohol content of 9.8%. The wine will be priced at approximately US\$10 per bottle. The primary sales channel for the wine will be supermarket chains in 12 major markets throughout the US.

The product will benefit from two key market trends. Firstly, at-home entertaining occasions are expected to grow from 5,919m occasions in the US in 2003 to a projected 6,086m occasions in 2008. Secondly, single women comprise the most rapidly growing consumer target audience for wine. Single women are often key alcoholic drinks consumers and have increasing disposable income, due in part to a delay in having children. In 2003, consumption by women accounted for 52.5% of US wine market value.

US Consumer Attitudes to Wine

Morefocus LLC, an on-line publisher and research panel manager has released new information from its on-going Lifestyle Attitudes survey in the US. The preliminary results, show significant shifts in consumer attitudes to wine consumption. "The data suggest that the role of wine as an alcoholic beverage is taking secondary place to its health value in the minds of consumers," said Dr. Regan Carey, a senior Morefocus research director. "There is a definite shift to the European mindset. Of particular note, 86% of the US-based panel now agree or strongly agree that red wine, drunk in moderation, is beneficial to health...while 71% consider 'moderate consumption' to be two glasses per day."

Other results from the 10,000 sample survey include a change in preference from white wine to red. 77% of the panel participants preferred red to white, with 22% stating that they drink more red than white because of reports indicating that moderate red wine consumption helps prevent heart disease. 44% felt that guidelines for healthy consumption should be included on wine bottled labels.



Alcohol Consumption and Mortality Risk Association in Switzerland

The objective of a recent Swiss study was to estimate the health impact of alcohol consumption in terms of the number of deaths and person-years of life lost (PYLL) in Switzerland.

Three hypothetical situations were compared to the current situation. The study addressed the question of how many deaths and person-years of life lost would be avoided if (1) all individuals were abstainers; (2) all individuals were "low drinkers," (defined as up to 40 g/d (about 3 ½ drinks) for men and up to 20 g/d (just under 2 drinks) for women); and (3) abstainers remained abstainers but heavier drinkers reduced their intake to "low levels." Etiological fractions of alcohol-related health consequences by age and gender were applied to the officially reported numbers of deaths to estimate the total number of deaths and PYLL.

Results indicate that, depending upon the hypothetical situation, the estimated number of alcohol-related deaths varied between an overall net protective and an overall net causal effect: in situation (1), there would be 730 additional deaths in reference to the current situation (+ 1.2% of the total alcohol-related mortality in Switzerland), whereas in situation (2) there would be 3,460 fewer deaths (- 5.5%). Thus, the current situation in Switzerland would be preferable compared to a society in which no one drinks alcohol. A society, however, in which every individual

drinks at low levels would be preferable to the current situation. The corresponding figures for PYLL are 23,596 vs. 29,229 (6.4% vs. 7.9% of total PYLL).

The authors conclude that the hypothetical situation decisively impacts on the number of deaths attributable to alcohol. In contrast, it has much less influence on the number of alcohol-related PYLL. Thus, mortality is at least a questionable indicator of alcohol-related health outcomes. The study also indicated that more lives and PYLL were saved in the low-risk situation than in the abstinence situation. They state that public health policies should not concentrate on the promotion of abstinence.

Professor Curtis Ellison comments that there are three important factors that should be considered in interpreting their results: they did not adjust for the pattern of drinking, they attributed "alcohol-related diseases" to low levels of consumption, and the upper limits of alcohol included in the "low-drinking" category were fairly high. Had the authors been able to adjust for pattern of drinking, they would undoubtedly have shown much stronger reductions in death from CHD and other diseases for regular drinking (as week-end bingers, who do not show beneficial health effects, were included in their low drinker group). Further, whereas many studies show some increase in "alcohol-related

diseases" for drinkers reporting less than 40 g/d for men and less than 20 g/d for women, these increases are thought to be due to either under-reporting of actual intake or primarily binge drinking, as experimental and biologic studies generally do not show that such low levels of alcohol relate to cirrhosis, alcohol-related cancers, and other such conditions. Finally, up to 40 g/d for men and 20 g/d for women are considerably higher limits than advised in the US (up to 24 g/d for men and up to 12 g/d for women). "These factors suggest to me that regular, moderate intake of 1 to 2 drinks/day would surely lead to greater benefits in reducing mortality than those reported for situation (2) in this study," states Ellison.

The most important message of this paper is that public health recommendations should focus on encouraging low levels of alcohol intake, not abstinence. As the authors state, "Given its positive effect on overall mortality, clearly regular low-level drinking, not abstention, should be the objective of public health policy in many countries." Further, they point out that a message of moderation, rather than abstention, may be easier to communicate to heavy drinkers in attempting to get them to reduce their intake.

Source: Gutjahr E, Gmel G. Measuring the impact of some methodological options. *Eur J Epidemiol* 2005;20: 37-47.

Binge Drinking During Pregnancy

New evidence from the USA suggests that prenatal binge drinking is linked with heightened dangers of behavioural and mental problems in offspring at the age of seven.

A recent study assessed the consumption of alcohol consumption and drinking pattern of around 500 pregnant women to determine what effect drinking might have on their child. Alcohol consumption was assessed at each visit to the prenatal clinic and the children's intelligence quotients and behaviour were measured at the age of seven.

The researchers found no relationship with the mothers' total intake of alcohol

and the child's IQ level. However, the children who had been exposed to binge drinking while in the womb were 1.7 times more likely to have IQ scores in the mentally retarded range. They were also 2.5 times more likely to show clinically significant levels of delinquent behaviour.

"These results support the findings of other researchers who suggest that exposure to binge drinking has more deleterious consequences than the overall amount of exposure to alcohol during pregnancy," the researchers state. "Simply looking at the overall amount of exposure may obscure important

prenatal alcohol exposure effects. This may be one reason why several researchers have failed to find an effect of prenatal alcohol exposure on child cognitive and behavioural outcomes."

This study suggests that the amount of alcohol that is consumed per occasion may be a more critical factor than the overall number of drinks that are consumed per week.

Source: Prenatal Exposure to Binge Drinking and Cognitive and Behavioral Outcomes at Age 7 Years, *American Journal of Obstetrics and Gynecology* (2004), 191, 1037-43, Nordstrom Bailey B. et al.

Moderate Drinking Appears to Cut Diabetes Risk

The worldwide prevalence of diabetes is expected to increase by 37 percent between 2000 and 2030, according to a previously published report. It is believed that in many cases, the cause of this increasingly common disease in the United States is due to the lack of exercise and the high prevalence of obesity, as well as the normal aging of the population, researchers say.

Previous studies have linked alcohol consumption to a reduced risk of type 2 diabetes but reviews of these studies were inconclusive about the scope of the association and the incidence of the disease associated with heavy drinking. To clarify the association, Dr. Lando L. J. Koppes, of the VU University Medical Center in Amsterdam, and his team searched the literature for studies about type 2 diabetes and alcohol consumption

that were published between 1966 and July 2004. The studies, conducted in the United States, Japan, Finland, Korea, the Netherlands, Germany and the UK, involved a total of 11,959 cases of type 2 diabetes among 369,862 men and women who were followed for an average 12 years.

Altogether, the compiled findings revealed a U-shaped association between alcohol drinking and type 2 diabetes risk, such that the lowest risk of the condition was found among moderate drinkers and the highest risk occurred among nondrinkers and heavy drinkers. Body mass index, a measure of height versus weight, did not seem to affect the results.

Those who drank between 6 and 48 grams of alcohol per day, were about 30 percent less likely to develop type 2 diabetes than non-drinkers, the report

indicates. The risk of the condition among those who drank 48 grams of alcohol a day or more was similar to that among those who did not drink alcohol.

Previous researchers have reported a similar association between moderate alcohol drinking and a reduced risk of cardiovascular disease. The exact mechanism by which moderate alcohol drinking reduces the risk for either condition is unknown.

“With the expectation of more than 100 million new cases of type 2 diabetes in the coming two decades,..attaining prevention is the central challenge,” the authors of this report contend.

Source: Koppes LLJ et al. Moderate Alcohol Consumption Lowers the Risk of Type 2 Diabetes: A meta-analysis of prospective observational studies. Diabetes Care 2005;28:719-25.

Drinking Patterns and Body Mass Index in Non-Smokers.

The authors of a new study comparing drinking patterns and body mass index in non-smokers examined the relation between drinking patterns and body mass index (BMI) by pooling cross-sectional data from the 1997-2001 National Health Interview Surveys in the USA. Weighted analyses included 45,896 adult never smokers who were current alcohol drinkers. Height and weight were self-reported.

In adjusted analyses, alcohol quantity and frequency had opposite associations with BMI. As quantity increased from 1 drink/drinking day to = 4 drinks/drinking day, BMI significantly increased; in men, it increased from 26.5 to 27.5, and in women, it increased from 25.1 to 25.9. However, as frequency increased from low quintiles of drinking days/year to high quintiles, BMI significantly decreased; in men, it decreased from 27.4 to 26.3, and in women, it decreased from

26.2 to 24.3. In stratified analyses of frequency trends within quantity categories, BMI declines were more pronounced in women than in men, but all linear trends were inverse and significant. In all respondents combined, persons who consumed the smallest quantity the most frequently were leanest, and those who consumed the greatest quantity the least frequently were heaviest. The authors conclude that alcohol may contribute to excess body weight among certain drinkers.

The investigators found that, overall, consumers of larger amounts of alcohol were more obese. However, their most striking findings related to frequency of drinking. In non-drinkers their BMI was essentially the same as the lowest quintile of drinkers who consumed 1 drink/day.

Roughly, the lowest quintile is drinking rarely, the next quintile about once per

month, and the top quintile is drinking several days/week to daily. Regardless of the amount consumed, there is a strong pattern of decreasing BMI for increasing frequency of consumption. Further, within essentially every quintile of frequency of drinking, the BMI is lower for people consuming 1 drink/drinking day than those consuming more perdrinking day. For all subjects and for men and women separately, the decline in BMI is greatest among subjects consuming 1 drink/drinking day.

The results from this paper suggests that to keep from gaining weight from alcohol, drink only a little at a time, but do it regularly.

Source: Breslow RA, Smothers BA. Drinking patterns and body mass index in never smokers. National Health Interview Survey, 1997-2001. Am J Epidemiol 2005;161:368-376.

Cardiovascular Properties of Red Wine

An recent article written by AC Cordova reviews the cardiovascular effects of wine and alcohol. Red wine and its polyphenolic content present many protective characteristics against cardiovascular disease. These are associated with their capability to prevent lipid oxidation, inhibit smooth muscle cell proliferation, modulate platelet adhesiveness, enhance HDL serum levels, and produce vasorelaxation.

Attempts to determine which of the 8,000 specific polyphenolic compounds known to exist in nature are responsible for these effects have been the impetus for a multitude of studies. Caffeic acid and protocatechuic acid seem to have the most potent antioxidant effects, resveratrol and quercetin have the highest activity in platelet adhesiveness modulation, and resveratrol may have the strongest antiproliferative potential. Additional research to determine the exact compounds and doses required, perhaps acting synergistically, to improve their cardioprotective effects is needed. It may be that the total spectrum of red wine phenolics is necessary, perhaps in the presence of ethanol. This combination has already been proved to share activity in modulating platelet aggregation and elevating the levels of

HDL cholesterol. Although phenolics may undergo chemical modifications once absorbed into the bloodstream, such as glycosylation, methylation, or glucuronidation, their availability and capability to exert biologic activity still remain. In this manner, red wine is capable of playing an important cardiovascular protective role.

The beneficial aspects of polyphenols do not seem to be limited to the cardiovascular system. Recent studies have found potential use in cellular membrane protection, delay of Alzheimer's disease progression, and also as an anticancer agent; it has been observed to have antiproliferative effects on various cancer cell lines including squamous cell carcinoma, human breast cancer, and different human leukemias.

The authors conclude that a better understanding of the health benefits of red wine and perhaps the specific polyphenolic extracts with the described properties is still needed. Meanwhile, the evidence is highly compelling that moderate and regular red wine consumption of one or two glasses per day can lower our risk of suffering from cardiovascular disease.

Putative Mechanisms of Red Wine's Cardioprotective Effects

- Inhibition LDL oxidation
 - Free radical scavenger
 - Metal ion chelator
 - Sparing of antioxidants (ie vitamin E, carotenoid)
 - Increase or preserve paraoxonase activity
- Inhibition SMC proliferation and vascular hyperplasia
 - Cell cycle arrest
 - DNA strand breakage
 - Decrease cyclin A expression
- Inhibition ICAM-1 and VCAM-1
- Inhibition PDGF
 - Inhibition P13-K and p38 MAPK
 - Inhibition MMP9
- Apoptosis
 - Inhibition platelet aggregation
 - Inhibition cyclo-oxygenase pathway
 - Inhibition thromboxane B-2 synthesis
 - Potentiate prostaglandin
 - Increase phosphodiesterases (cAMP,cGMP)
- Increase HDL
 - Increased apolipoproteins A-1 & A-2
 - C20:5 (omega 3)
- Vasorelaxation
 - eNOS expression
 - NO release

eNOS, endothelial nitric oxide synthase; ICAM 1, inter-cellular adhesion molecule 1;MMP, matrix metalloproteinase 9;P13-K, phosphatidylinositol 13-kinase;p38 MAPK, p28 nitrogen activated protein kinase;PDGF, platelet derived growth factor; VCAM 1, vascular cell adhesion molecule-1

Source: Cordova AC, Jackson LSM, Berke-Schlessel DW, Sumpio BE. The cardiovascular protective effect of red wine. *J Am Coll Surg.* 2005;200:428-439.

Mediterranean Diet Leads to Longer Life

A recent study lead by Antonia Trichopoulou has found that the Mediterranean diet is associated with longer life expectancy among elderly Europeans.

The Mediterranean diet is characterised by a high intake of vegetables, legumes, fruits, and cereals; a moderate to high intake of fish; a low intake of saturated fats, but high intake of unsaturated fats, particularly olive oil; a low intake of dairy products and meat; and a modest intake of alcohol, mostly as wine.

The study involved over 74,000 healthy men and women, aged 60 or more, living in nine European countries. Information on diet, lifestyle, medical history, smoking, physical activity levels, and other relevant factors was recorded. Adherence to a modified Mediterranean

diet was measured using a recognised 10 point scoring scale.

A higher dietary score was associated with a lower overall death rate. A two point increase corresponded to an 8% reduction in mortality, while a three or four point increase was associated with a reduction of total mortality by 11% or 14% respectively. So, for example, a healthy man aged 60 who adheres well to the diet (dietary score of 6-9) can expect to live about one year longer than a man of the same age who does not adhere to the diet.

The association was strongest in Greece and Spain, probably because people in these countries follow a genuinely mediterranean diet, say the authors. The authors conclude that adherence to a Mediterranean type diet, which relies on plant foods and unsaturated fats, is

associated with a significantly longer life expectancy, and may be particularly appropriate for elderly people, who represent a rapidly increasing group in Europe.

Source: Trichopoulou A et al. Modified Mediterranean diet and survival: EPIC-elderly prospective cohort study. *BMJ* doi:10.1136/bmi.38415.644155.8F



ADISTILLAD Alcohol Intake and Systemic Markers of Inflammation

C-reactive protein, or CRP, a measure of inflammation in the body, is being widely pushed as a new risk factor for cardiovascular disease. This study shows that the moderate intake of wine or beer is associated with a beneficial lowering of CRP, as well as of other markers of inflammation.

The authors state that anti-inflammatory effects of moderate alcohol consumption have been proposed to explain why moderate alcohol intake lowers coronary heart disease risk. They investigated the relationship between overall alcohol, beer or wine consumption, and markers of systemic inflammation in three different geographical areas in Europe.

Cross-sectional samples, each representative of the general population from Germany, Scotland, and France were studied. Alcohol intake was

assessed by standardized interview. Adjusted means of C-reactive protein (CRP), fibrinogen, white blood cell (WBC) count, plasma viscosity (PV), and albumin were calculated among categories of alcohol intake, and separately for beer or wine consumption, by multiple linear regression. Self-reported moderate daily alcohol intake up to 40 g was associated with lower concentrations of CRP, fibrinogen, PV and WBC count, compared to non-drinking and heavy drinking, even after adjustment for various potential confounders.

The authors conclude that moderate consumption of either wine or beer is associated with lower levels of systemic inflammatory markers in all three different European areas, suggesting that ethanol itself might be largely responsible for the potential anti-inflammatory effects of these beverages.

The most common marker of inflammation, CRP, is being widely promoted as a new risk factor.

This paper supports a role for moderate alcohol intake (either beer or wine, the only two beverages studied in this paper) in decreasing inflammation as one of its roles in preventing cardiovascular disease. This effect is in addition to beneficial effects of moderate drinking on blood lipids, oxidation, clotting factors, and arterial function.

Source: Imhof A, Woodard M, Doering A, Helbecque N, Loewel H, Amouyel P, Lowe GDO, Koenig W. Overall alcohol intake, beer, wine, and systemic markers of inflammation in western Europe: results from three MONICA samples (Augsburg, Glasgow, Lille). *European Heart J* 2004;25:2092-2100.

Genes and Breast Cancer

Researchers in Heidelberg, Germany have found that women drinkers who carry a particular form of a gene involved in the breakdown of alcohol have an increased risk of breast cancer.

Women in this genetic sub-group are more likely to develop the disease compared to those lacking this version of the gene. In addition, for women in the sub-group the consumption of even a small quantity of alcohol raises the blood concentration of oestradiol, the major female sex hormone. Elevated levels of oestradiol are known to be associated with an increased risk of breast cancer.

The research focused on a particular version of the gene that produces the enzyme, alcohol dehydrogenase (ADH), which initiates the breakdown of alcohol in the body. It is thought that the actual carcinogen responsible for some cases of breast cancer is not alcohol itself but acetaldehyde, to which it is converted by ADH. It is possible that a mutant version of the ADH gene might make an unusually active enzyme, which could produce acetaldehyde too quickly for it to be disposed of by the next enzyme in the chain. As a consequence, the

carcinogen could accumulate to abnormal levels, triggering the emergence of cancerous cells.

The investigators compared the ADH gene in 117 moderate drinkers with breast cancer and in 111 age-matched women with alcohol-related diseases (such as cirrhosis of the liver and pancreatitis) but not cancer. Moderate drinking was defined as an alcohol intake of 20 grams (2.5 UK units) or less per day. The results showed a significantly higher frequency of the abnormal gene in moderate alcohol consumers than in the women without cancer. The data indicated that women carrying the mutant gene were 1.8 times more likely to develop breast cancer than those with another version of the same gene.

The second part of the study was an investigation into the effect of drinking on the concentration of oestradiol in the bloodstream. Eight pre-menopausal women consumed a small quantity of alcohol at various points in their cycle. The subjects' oestradiol levels were then measured over the following two hours, and compared with those in women not ingesting alcohol. The outcome was a 27-

38% higher level of the hormone among the drinkers. Because of the known link between raised oestradiol concentrations and the risk of breast cancer, this evidence augmented the message emerging from the first phase of the study.

The investigators conclude that even moderate drinkers who carry a gene producing the abnormally active version of the ADH gene face a heightened danger of alcohol-associated breast cancer. They suggest two possible reasons why chronic alcohol abusers do not appear to have an increased risk of the disease. Such women may die, as a result of other conditions stemming from their addiction, before they are able to develop breast cancer. Alternatively (or in addition) a decrease in the number of ovulatory cycles, linked with ovarian failure, infertility and early menopause, could mean that they are less exposed to oestradiol.

Risk Factors in Alcohol Associated Breast Cancer: Alcohol Dehydrogenase Polymorphism and Estrogens. *International Journal of Oncology* (2004), 25, 1127-1132, Coutelle Cet al.

**AIM was established in 1991 to communicate about sensible drinking and health.
AIM has worldwide support from all sectors of the beverage alcohol industry.**

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AIM – Alcohol in Moderation was founded in 1991 as an independent organisation whose role is to communicate ‘The Sensible Drinking Message’ and to act as a conduit for information from the industry, its associations and relevant medical and scientific researchers, legislation, policy and campaigns.

AIM Mission Statement

- **To promote the sensible and responsible consumption of alcohol**
- **To encourage informed debate on alcohol issues**
- **To communicate and publicise relevant medical and scientific research in a clear and concise format via AIM Digest and the AIM Research Highlights**
- **To publish information via the ‘AIM Gateway to Sensible Drinking and Health’ website containing a unique archive of research on moderate drinking and health – comprehensively indexed and fully searchable**
- **To publish information to the consumer on sensible drinking and health via the ‘Drinking and You’ website based on national government guidelines with sections for the UK, USA, Canada, Spain, France Sweden and Germany**
- **To distribute AIM Digest without charge to the media, legislators and researchers involved in alcohol affairs**
- **To direct enquiries from the media and others towards full and accurate sources of information.**

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Swings and Roundabouts

An Analysis of Consumption Trends by Helena Conibear

Britain (and Ireland) continue to buck the trend in Western Europe in our love affair with alcohol, in spite of relatively high alcohol prices and taxation in comparison with most of Europe. Britain has risen to number seven in the world in its per capita alcohol consumption, overtaking France for the first time in 2003. Ireland now has the 4th highest per capita consumption in the world just behind Luxembourg, the Czech Republic and Hungary. The trend otherwise in Western Europe, the USA and Australasia is more of static consumption per head in the 21st century. The balance of power between beverage type, is as ever, fluid.

The increase in consumption in the UK has been overwhelmingly driven by wine. Per capita consumption has grown 180% to 20 litres per head (of pure alcohol) in the last 20 years (320% in Ireland from a smaller base). Spirits popularity has fluctuated between 1.3 and 1.8 litres in the same period, whereas beer has declined, only growing slightly again in 2002/3. We are still way behind the 'traditional' wine producing countries in the amount of wine we drink however (Italy 47.5 litres a head, France 48.5 and Spain 30.6), which may account for why both Mintel and Vinexpo forecast that Britain will become Europe's largest consumer of wine by 2008 – a prophecy that looks optimistic and foresees growth above current trends in both volume and value. Recent predictions from Wine Intelligence forecast 3% growth in wine by volume per annum (against 6% year on year 2003/4) in the UK over the next decade with prices failing to keep pace with inflation.

Girl power in Britain

Not only is growth in drinking led by wine, but it is women driving the drinking and brand choice. More women now drink wine than men (69% versus 62% according to Mintel) in Britain though both sexes drink similar quantities at home (but women make 70% of wine purchases in supermarkets).

The real difference is in the on-trade where women consume a greater amount of wine than men. Datamonitor predict that young people will go out three times a week by 2008 and more drinkers are going out in the week than ever before 'the more affluent, mid-life singles, "the 'Bridget Jones' generation of working women with time and money to spare for luxuries such as wine - has undoubtedly played a significant part in boosting sales" according to Mintel.

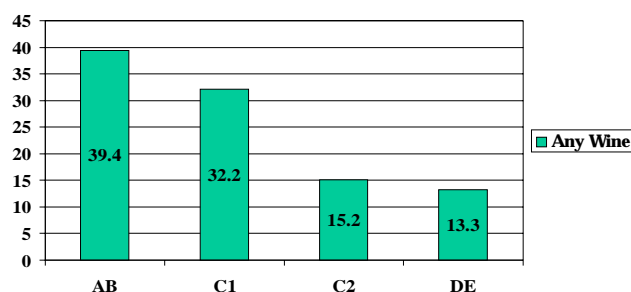
There is also a general trend, confirmed by the Wine Trade Action Group's research, for people to drinking more at home before going out. Some believe the bag in box market will grow with the drinking at home culture increasing. The Bergerac wine trade board is promoting use of the bag-in-box (3, 5 and 10 litres) to a tune of 1.5 million-euro with the take home market in mind.

Women's affair with wine may account for new categories like low carb wines such as Brown Forman's One 9 (few analysts expect this category to grow significantly) as well as the growth of rose and the sparkling wine sector. Dominated by Cava (54% of sales and growing), off trade sales of non champagne bubbly were up by 8% in 2004 against total light wine growth

of 5% and more premium brands are appearing as well as Australian sparkling Shiraz.

The inexorable growth of wine in Britain led to the Wine Trade Action Group commissioning a paper to discover as to whether wine is contributing to Britain's 'binge drinking' culture, "we found that wine plays an insignificant role in male binge drinking" said Mike Paul, Chairman of WTAG "but this is not true for women. Women quite frequently start off an evening with wine at home, as a mood enhancer and then may well share a bottle with friends in a bar. They then tend to move on to other drinks later in the evening".

**Wine Drinking: By Social Grade
Penetration of Weekly Drinking, %**



Source: Drinks Pocket Book 2005

Across the channel?

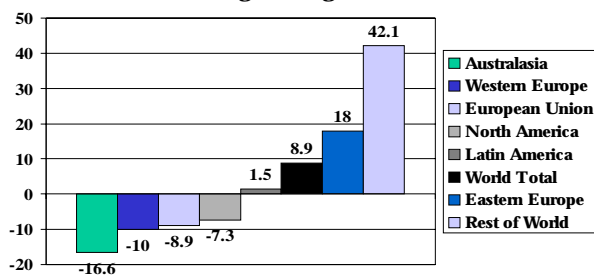
It could be argued that the amount of wine drunk needed to decline in France, Italy and Spain – whose populations drank over 90 litres a head in 1980, since then, wine consumption has fallen by 45% in Italy, 54% in Spain, 38% in France. The Spanish Government has become concerned at the move away from wine by it's youth in favour of beer and is now working hard to promote wine as the beverage of moderation. Spain's Agricultural Ministry is funding the promotion of wine as part of a balanced diet and has legally separated wine from other alcoholic drinks. The image of wine has been damaged by the growth of the 'botellon' or street drinking parties by the youth of Spain, where the preferred beverage is red wine mixed with coke, or beer. Spain's per capita consumption has stabilised at 10 litres a head of pure alcohol per capita over the last ten years however.

Italy and France have spearheaded the decline in alcohol consumption in Western Europe (6.9 litres and 9.3 litres of pure alcohol a head by 2003). France, in spite of proactive campaigns and government lobbying by the industry, continues to be hit by a tough government agenda against drink driving and the Loi Evin and consumption is expected to continue to fall. Italy is at last recording a slight growth of 2% in wine consumption in 2004. This was confirmed by the country's farmers union in March - wine sales grew by 8 million bottles and 3% in value last year. The spirits market has collapsed however, to under half a litre a head and 23% of Italians do not drink at all, overall consumption is well below France, Spain and the UK at just 7 litres a head. The trend for

teetotalism is spreading in other countries too, 26% of Britons now don't drink (Drinks Pocket Book 2005), and according to the Institut de recherches scientifiques sur les boissons, 38% of young French women do not drink.

Sharon Nagel, Editor of La Journee Vinicole is uncertain as to the future for wine in France: "Although, as you know, over the past few decades the French have been drinking less and less wine, the latest figures point to an increase over the five months from August to December 2004. As for future trends,Drink-driving legislation and how well it is enforced as well as a whole host of restrictions come into the equation and are very difficult to forecast. Currently the Health Minister is mulling enforcement of new legislation on warning labels for pregnant women: will this have an impact on how much wine they drink? Later on this year, sulphite labeling will be introduced. Will this put people off? On a more positive note, the industry is currently assessing various ways of recruiting new consumers, including reducing alcohol content in wine (which has increased by 2° over the last forty years) or perhaps even producing a fermented grape drink with an ABV lower than the official minimum entitling it to be called wine. Through the use of reverse osmosis a 6° proof drink which has a taste profile similar to wine has been pioneered in Bordeaux".

**Change in Total Alcohol Consumption by World Region
(Percentage Change 1990-2003)**



Source: World Drink Trends 2005

Boom predicted in the USA

According to Vinexpo, the largest growth markets over the next four years are expected to be the US (+28%), UK (+15%) and South Africa (+21%). The USA has the advantage of half a million new consumers coming of legal age each year, whereas Europe, including the UK has a shrinking population of young people. It is worth mentioning demographics here as Britain's population has grown by 4 million since 1980, fuelled by immigration, to 60 million, whereas Italy's population has grown by just 1.5 million and Spain has a population of just 40 million).

Wine consumption totalled 278 million 9 litre cases in 2003 in the US (according to Wine Business monthly). Imported wines formed 26% of that. The main growth was from Australia and South America at the expense of France and Italy). Consumption is predicted to grow to 410 million cases by 2008 (Gomberg, Fredrikson and Associates), which is ironic as we have seen California uproot 100,000 vineyard acres in 4 years, but the balance of supply and demand is now much better.

In value terms, the importance of the US is even more marked. By 2008, Vinexpo predicts that the country will be spending \$24bn on wine, some 20% of the world's total, and nearly as much as France, the UK and Italy combined. Biggest growth will come in the \$5-10 and \$10+ categories, both of which are

forecast to rise by 17% over the next four years. 40% of adult American still do not drink at all, a shrinking percentage.

Chris Wirth from the Wine Institute commented on the estimates: "While I cannot speak as to the accuracy of the Vinexpo figures, the recent market reports I have seen seem to confirm the trends they mention. The US consumption growth seems to be coming from the continued increase in numbers wineries in both California and the rest of the US. In addition to the growth of wineries in the US and the increasing awareness of wine in each individual state, is a decline in beer consumption and the comfort level of younger adult consumers with wine which is new for their generation. I also think the aggressive marketing from other countries to gain market share in the US is increasing awareness of wine and the different varieties available".

According to Vinexpo, Wine's growth internationally is coming from high value rather than high volume markets. The value of the UK market is predicted to rise by 19% over 4 years, and indeed the average bottle price has broken the £4 barrier at last and stands at £4.15, Wine Intelligence warns however, that the average bottle price in Britain has risen by 2% over the last decade, failing to keep pace with inflation, with prices predicted to continue to decline in real terms.

Spirits

The international growth in spirits over the next four years is predicted to be around 12% (Euromonitor), or twice the rate of growth of the previous four years. Value growth is expected to be even higher, at 15%. Asia is driving the spirit growth (20% predicted) and already accounts for nearly 60% of the world's spirits consumption. The Americas are expected to see steady if unspectacular growth, while Western Europe is generally in decline (with the exception of Britain of course).

Vodka continues to experience runaway success, especially in the premium sector and now accounts for 18% of world spirit consumption, there was a 19% increase in sales between 1999 and 2003 in the US. Russia continues to be vodka's biggest volume market, accounting for 50% of world sales, but this is declining and Putin is planning to regulate spirits further in Russia in a bid to tackle alcohol misuse.

Spirits drinkers are still overwhelmingly 'mature' throughout western Europe - (48% are over 55 in Germany, 46% in the UK, 40% in Sweden and 37% in France). The 45+ group are the fastest growing in spending power - wanting high price and high quality.

In France whisky is highly fashionable (1.7 litres per head) and growing, whereas traditional drinks such as Pastis are declining. It is expected that spirits sales will be affected by government and self regulation and responsible drinking initiatives in Ireland (where spirit consumption fell by half a litre a head between 2002/3) and France specifically.

Britain

According to Datamonitor, the UK spirits market was worth over 9 billion in 2003 (the average adult Briton spends £152 on spirits a year and drinks 3.7 litres), the market is forecast to grow at a modest 2% a year over the next four years.

ARTICLES

Whisky, although dominant among spirit sales in the off trade, has lost out to white spirits in the on trade as it is not seen as a good mixer for cocktails.

Premium and prestige spirits brands such as Grey Goose, Chivas Regal and single malts in general are growing at the expense of blended whisky (which still accounts for a third of spirit consumption at 1.2 litres a head). This is reflected in Bombay Sapphire's success, with 25% growth in sales in 2003 and Grey Goose against a decline for Gordons. Vodka enjoyed a 29% increase in sales the UK with a further 11% growth forecast (IWSR).

RTD's

The RTD market in the UK and Ireland is in steady decline. (There was a further 8% drop in volume sales in 2004). This category but should not be underestimated, however, as the it is still worth over £300 million. New trends such as Bacardi Diet lemon and Hypnotiq are a new 'twist' and may arrest the decline, although the European Commission and WHO hold RTD's accountable for appealing to young drinkers (actually accountable for between 5 and 9% of underage consumption

according to Alcohol Concern) and they will continue to be a target for higher taxation and regulation.

Young men – still beer

Beer is still the Nations favourite drink by far (see chart below 84% beer drunk against 16% wine, although wine accounts for 30% value according to Wine Intelligence). Specifically the British males' favourite drink. . In the UK beer consumption plummeted between 1980 and 2000 but rose to 179 pints per head in 2004 (BBPA figures) compared to 174 in 2001. Ales continue to decline but lager and premium brands are increasing sales and it is expected that boutique beers will grow in popularity.

Summary of Consumption by Beverage Type, 2003 (Litres)

Country	Spirits*	Beer	Wine
Algeria	-	1.4	e 0.5
Argentina	e 0.3	e 35.7	34.6
Australia	e 1.2	e 91.5	e 20.4
Austria	e 1.4	110.6	e 29.8
Belgium	1.4	96.2	23.0
Brazil	e 1.5	e 49.7	e 1.9
Bulgaria	e 2.1	e 7.9	e 21.3
Canada	2.2	67.8	11.0
Chile	e 1.8	e 25.0	e 18.0
China	e 3.0	e 19.4	e 0.2
Colombia	e 1.8	e 40.1	e 0.4
Cuba	e 1.4	4.0	e 1.9
Cyprus	e 3.9	e 60.0	e 17.8
Czech Republic	e 3.8	e 157.0	e 16.8
Denmark	e 1.1	96.2	e 32.6
Estonia	e 1.3	e 75.0	e 3.4
Finland	e 2.1	80.2	e 26.3
France	e 2.4	35.5	48.5
Germany	2.0	117.5	23.6
Greece	e 1.6	e 40.4	e 33.8
Guyana	e 1.7	e 20.1	-
Hungary	e 3.5	e 72.2	e 37.4
Iceland	e 1.2	e 55.8	e 12.0
India	e 0.2	e 0.8	-
Republic of Ireland	2.0	141.2	15.2
Italy	0.4	30.1	47.5
Japan	e 3.6	e 27.3	e 2.9
Latvia	e 6.1	e 36.6	e 3.6
Luxembourg	e 1.6	e 101.6	e 66.1
Malaysia	e 0.1	e 12.7	-
Malta	e 0.7	e 39.7	e 22.3
Mexico	e 0.7	e 46.9	e 0.2
Morocco	-	e 3.6	e 1.4
Netherlands	1.5	78.7	19.6
New Zealand	1.6	72.8	19.1
Norway	e 0.8	e 50.5	e 12.4
Paraguay	-	e 43.7	e 1.3
Peru	-	e 15.0	e 1.1
Poland	e 1.3	e 79.0	e 11.9
Portugal	e 1.4	e 58.7	e 42.0
Romania	e 2.0	e 67.0	e 23.0
Russia	e 6.2	e 32.8	e 8.6
Singapore	e 0.5	e 22.7	e 1.1
Slovak Republic	e 3.5	e 88.4	13.0
South Africa	0.8	e 56.0	8.6
Spain	e 2.4	78.3	e 30.6
Sweden	e 0.9	54.2	e 16.6
Switzerland	1.6	58.1	40.9
Taiwan	e 0.7	e 27.5	e 0.5
Thailand	e 3.1	e 24.3	e.
Tunisia	-	e 11.2	e 2.8
Turkey	e 0.4	e 9.8	e 0.8
Ukraine	e 0.3	e 2.0	e 0.4
United Kingdom	1.8	101.5	20.1
Uruguay	e 1.1	16.7	e 33.3
USA	e 1.9	81.6	e 9.5
Venezuela	e 0.5	e 82.1	-
Vietnam	e.	e 12.1	-

Spirits are represented in terms of pure Alcohol Source: World Book Trends 2005

Change in Total Alcohol Consumption 1970-2003

Rank	Country	2002-2003	1980-2003	1970-2003
1	Brazil	0.4	234.1	463.0
2	Paraguay	1.8	99.6	277.6
3	Cyprus	-0.9	89.6	174.5
4	Colombia	0.3	5.3	129.4
5	Turkey	-1.4	42.5	116.7
6	Venezuela	-3.4	21.6	85.9
7	Finland	2.9	25.2	83.7
8	Rep.of Ireland	..	47.1	83.6
9	UK	0.1	31.5	80.1
10	Iceland	7.5	39.9	70.9
11	Tunisia	12.0	44.1	58.0
12	South Africa	-2.4	23.1	51.5
13	Greece	-1.5	-24.5	46.1
14	Japan	0.7	19.5	41.9
15	Mexico	-0.2	63.9	41.1
16	Denmark	0.4	4.1	39.7
17	Cuba	-13.0	-16.6	38.8
18	Netherlands	-1.1	-11.0	38.1
19	Uruguay	0.3	-3.3	36.1
20	Russia	1.7	40.7	34.1
21	Czech Rep.	2.1	14.6	31.0
22	Romania	-4.5	1.8	29.6
23	Luxembourg	5.5	15.5	26.3
24	Hungary	2.8	-2.2	25.1
25	Norway	0.5	-5.2	22.2
26	Poland	1.8	-23.3	19.6
27	Canada	1.8	-16.4	14.2
28	Morocco	16.0	33.3	12.3
29	USA	0.8	-17.7	1.7
30	Slovak Republic	-3.3	-15.5	1.6
31	Germany	-2.2	-10.8	-0.5
32	Belgium	..	-18.7	-1.3
33	Portugal	-0.6	-13.0	-2.7
34	New Zealand	-1.4	-29.0	-10.4
35	Chile	6.5	-29.6	-9.6
36	Australia	-1.4	-24.7	-10.6
37	Austria	1.1	-15.3	-11.3
38	Spain	3.9	-26.7	-13.8
39	Sweden	-0.7	-14.2	-14.9
40	Switzerland	0.4	-17.0	-15.9
41	Bulgaria	-7.4	-42.2	-25.6
42	France	-10.1	-37.4	-42.7
43	Argentina	-2.1	-46.4	-47.2
44	Italy	-6.8	-46.7	-49.8
45	Algeria	30.0	-59.2	-55.8

Source: World Drink Trends 2005

Those girls again

11% of beer is now estimated to be drunk by females (BBPA) – and this offers a tremendous challenge to the producers to capture the affluent, independent female without losing their core male appeal.

New developments such as lower alcohol beers and low carb beers may appeal to the female drinker - the alcohol free beer market is at under 1% of sales and has zero penetration of the under 25's market. Coors, commenting on their development of C2, believe this is due to taste and hence have developed a beer at 2% which they hope combines good flavour and low alcohol. The runaway success of the 'light' beer market in the USA (that is in calories and carbs rather than in alcohol) might take off in Britain, but Euromonitor forecasts that 'light beers' and low carb beers will reach a peak (from a tiny base!) in 2005. The light beer sector now commands 27% of the total US beer market of 249 million hectolitres in 2004 (Beer Institute figures).

Female friendly initiatives in the UK include an improvement in beer glasses (1/3 pint, and Belgium stemmed glasses) and 'food' beers (beer to dine for) etc showing some imagination creeping into the market.

A rise in niche beers is forecast, again led by the US, but Europe continues to be dominated by the big four brewers (Anheuser Busch, SAB Miller, Heineken and Inbev) who have 25% of sales. The EU is forecast to see growth of 1.7- 2.4% over five years overall, driven by the premium category (Euromonitor).

Growth markets for beer are Russia benefiting from heavy investment and upgraded breweries (up 35% 1980 – 2000, at the expense of Vodka, which still accounts for 90% of Russian spirits consumption (according to Datamonitor), Latin America and Asia. The market for beer has grown by 62% in China over 5 years from a low base, and it is already the largest beer market in the world (estimated to account for 22% global beer sales by 2009). China offers huge potential as per capita consumption is a just 4 litres per head (World Drink Trends) but has remained static since 1999 for wine and spirits. The balance between beer wine and spirit consumption should alter in favour of wine, however, as the government is encouraging its consumption (with tax cuts and incentives) above beers and spirits which are made of grain and are needed for food (Reuters).

Traditional wine drinking countries such as France, Italy and Spain have seen strong growth in beer consumption since 1980 when it represented just 10% consumption, driven by its popularity with youth. Growth remains strong in Spain at 78 litres a head, and Italy (30 litres), but has declined to 35.5 litres a head in France (from 40 litres in the 1990's).

Per capita consumption trends

It is important to put these figures in perspective in per capita terms. The per capita consumption of wine in the US is at 9.5 litres (2003, source World Drink Trends), a level not enjoyed since the 1980's. Beer consumption is declining (90.8 litres in 1990, to 82.8 in 2003) and spirit consumption has stabilised in the last decade at 1.9 litres (pure alcohol) per capita according to World Drink Trends 2005.

In the UK, beer and spirit consumption levels are similar to the US (1.8 litres spirits, 100 litres beer) but a much higher wine consumption at 20 litres per capita per annum.

The downward spiral?

As the table shows, the overall picture of alcohol consumption is far from rosy for producers. Total alcohol consumption in the traditional wine producing countries in Western Europe such as Spain, Italy and Portugal shows signs of stabilising after 20 years of decline with the exception of France. The trend in the 21st century with many countries, however, is of

Declining consumption 1980 – 2000	Current trend 2002/3
Belgium – 29%	wine still falling by 9%
Australia – 23%	now stable
New Zealand – 28%	wine up 13% beer and spirits still falling
USA – 18%	wine up 16% and beers stable
Canada – 18%	wine beer and sprits all growing
Portugal – 52%	beer and wine still falling and per capita 10.6 down to 9.7
UK + 31%	mainly from wine and female drinkers, beer is growing again slightly after a decline of 15% over 20 years to top 100 litres per head
Ireland + 47%	second biggest beer drinking nation in the world, ahead of Germany at 147 litres after the Czech Republic at 155 litres.

increasing stability of per capita consumption of pure alcohol - this includes the USA (6.8 litres), Australia (7.2 litres), New Zealand (6.8 litres) Germany (10.2 litres), the Czech Republic (11 litres), Russia (8.7 litres), the Netherlands, Austria and Denmark but the balance of beverage choice continues to fluctuate within these figures with the consumer, as ever, willing to try out new alternatives in the playing field.

The question remains, for how long will the mature markets of Britain and Ireland continue (or perhaps be allowed) to expand? Both Governments are working hard to reduce their 'binge drinking culture' with detailed Alcohol Strategies, while recognising the economic contribution that the thriving on trade culture makes to the economy. Irish consumption is already levelling off whereto Britain?

With thanks to the BBPA, The Wine Institute, World Drink Trends, Coors and La Journee Vinicole Further sources of figures include Mintel, AC Nielson, Datamonitor, Euromonitor, Wine Intelligence, Wine Business Monthly, the International Wine and Spirits Record and Vinexpo.

Copies of World Drink Trends 2005 and the Drinks Pocket Book 2005 can be obtained via WARC, PO Box 69, Henley on Thames, Oxon RG91GB EMail info@warc.com Tel: 00 44 1491 411000

The Third International Wine and Heart Health Summit

Review by Elisabeth Holmgren

Over 200 physicians from around the world attended the 3rd International Wine & Heart Health Summit held at the Silverado Country Club & Resort in Napa, California. The Summit was co-sponsored by Desert Heart Foundation and the Wine Spectator.

The two-day symposium brought together an impressive faculty of physicians, scientists and epidemiologists to discuss the health effects of the daily consumption of wine, beer or spirits on improved cardiovascular health.

Tedd M. Goldfinger, DO, FACC Chairman of the International Wine & Heart Health Summit emphasized in his opening remarks that the research delegates from around the globe act as important ambassadors for the promotion of a healthy lifestyle. He reiterated that in light of the emerging science, *“It is prudent for physicians to discuss the harmful effects of alcohol with their patients, while at the same time, not discourage a potentially healthy practice of wine in moderation with meals.”* In fact, the presentations from many world renowned experts revealed that research often reports more pronounced cardiovascular benefits among wine drinkers. At the same time, however, many investigators increasingly explained that this may be due to wine drinkers’ overall healthier lifestyles.

This article presents some of the key statements made by some of the presenters who concentrated on the subject of wine, alcohol and cardiovascular health.

R. Curtis Ellison, MD from Boston University School of Medicine outlined how wine has been considered the ‘healthiest of beverages’ since ancient times until the 20th century. Through Prohibition in the USA, essentially no research was done on alcohol and health for many decades. In fact, in 1974, the Framingham Heart Study was blocked by the National Institute of Health from publishing findings showing striking reductions in coronary heart disease (CHD) deaths from moderate drinking. This was triggered by concerns that such information might foster abuse. As the research on moderate wine, beer and spirits consumption and potential

coronary heart disease benefits emerged, the scientific, media and policy communities acknowledged the reported lifestyle benefits to the public.

Ellison explained, *“The mechanisms of such protection have been extensively studied: they include beneficial effects of alcohol and/ or wine polyphenolic substances on blood lipids, lipid oxidation, coagulation, fibrinolysis, arterial endothelial function, ventricular function, inflammation, and glucose metabolism.”* He outlined the recent research developments demonstrating potential benefits for subjects who already have developed CHD by showing fewer recurrent infarcts and repeat percutaneous cardiac interventions, as well as overall lower death rates for moderate drinkers. In addition, Ellison presented an overview on studies that found protection from alcohol on the risk of cognitive decline, on all components of the metabolic syndrome and the possible protection against weight gain. In the closing statement, he emphasized that *“For the first time in decades, wine and other alcoholic beverages, in moderation, are now being considered an important part of a ‘healthy lifestyle.’”* Lending even more scientific support to this trend, Ellison outlined the recent research that has also shown the importance of the pattern of drinking, with the most favorable effects being seen from the daily consumption with meals.

Serge Renaud, PhD from Segalen University in Bordeaux presented an overview of the findings from the Lyon Heart Study. The important findings demonstrate how nutrition and lifestyle habits can lead to better health and increased life expectancy. In fact, according to Renaud the evidence is stronger than ever that a healthy diet that includes wine and specifically red wine is the main protector against coronary heart disease. Specifically, findings from the Lyon Diet Heart Study illustrate the potential: importance of a dietary pattern that emphasizes fruits, vegetables, breads and cereals, and fish, as well as alpha-linolenic acid as found in vegetable oils such as flaxseed and canola oil. Traditionally, the diet also includes moderate amounts of alcohol. Renaud

reiterated that *“it would be short sighted to not recognize the enormous public health benefit that this diet could confer with adoption by the population-at-large if the findings are confirmed.”* He and other experts have long encouraged US public health organizations such as the American Heart Association to take these important findings into account when providing messages to the public.

Arthur Klatsky, MD, Senior Consultant in Cardiology from the Kaiser Permanente Medical Program in Oakland presented findings on beverage choice and coronary heart disease (CHD) risk.

Klatsky explained that in the past decade most relevant reports of beverage choice differences have been cohort or case control studies with data about individuals. He stated, *“While not unanimous, these data support the probability that CHD is lower in wine drinkers than in beer and liquor drinkers”.* He further added that *“several reports from countries with no preponderant beverage choice such as Denmark and the US show that other lifestyle habits such as drinking patterns, socio economic status, diet, and smoking habits are more favorable for wine drinkers.”* Klatsky explained that this is a fact often used to challenge a causal hypothesis with respect to observed beverage choice differences in CHD risk and added that it can not be ignored that *“numerous reports of non-alcoholic compounds in wine, especially red, with hypothetically beneficial actions against athero-thrombotic disease offer biological plausibility to additional benefit of wine.”*

Most significantly, Klatsky presented data from the world renowned Kaiser Permanente study, outlining that data collected in 1978-1985 among 129,000 persons supplied information about total alcohol intake and frequency of drinking beverage types. Recent studies include all beverage choice data as frequency variable in analyses with results indicating the independent relationships of the beverage types. Data collected in 1997 showed lower risk of CHD hospitalization for both beer and wine frequency than liquor, and a 2003 report

robustly showed lower risk related to frequency of wine drinking for total mortality and CHD death. New data about heart failure risk also reveal wine frequency to be associated with reduced risk. Klatsky further added that in none of these studies was there a difference for drinkers of red and white wine. In his closing statements, Klatsky explained, “It is now clear that frequent wine drinkers have lower risks than beer or liquor drinkers. However, it remains unresolved whether this is due to non-alcoholic wine ingredients, drinking pattern or traits associated with wine drinking.”

These findings from the Kaiser Permanente study have also been echoed through ongoing results from the Copenhagen Centre for prospective Population Studies such as the Copenhagen City Heart Study. **Morton Gronbaek, MD, PhD from the Danish National Institute of Public Health**, spoke on the subject of alcohol and cancer and specifically breast cancer, colon and rectal cancer which are of increasing concern in populations around the globe. He presented data on alcohol intake, drinking patterns and risk of postmenopausal breast cancer “showing a monotonic increase in the risk of breast cancer among postmenopausal women with increasing average daily intake of alcohol, and this relationship with alcohol intake did not depend on drinking frequency.” Furthermore, Gronbaek addressed the relations between amount and type of alcohol and colon and rectal cancer. He explained that their study provides evidence of a causal relationship between alcohol and rectal cancer. However, he outlined the exact data demonstrating that “The carcinogenic effect of alcohol on rectal cancer appears to be reduced when wine is included in alcohol intake.” According to Gronbaek and his colleagues, “This suggests an anticarcinogenic effect of wine, consistent with the findings of experimental studies.”

Francois Booyse, MD from the University of Alabama at Birmingham provided an overview of his ongoing research addressing the molecular basis for the health benefits of wine. He and his team of experts have found that wine components—

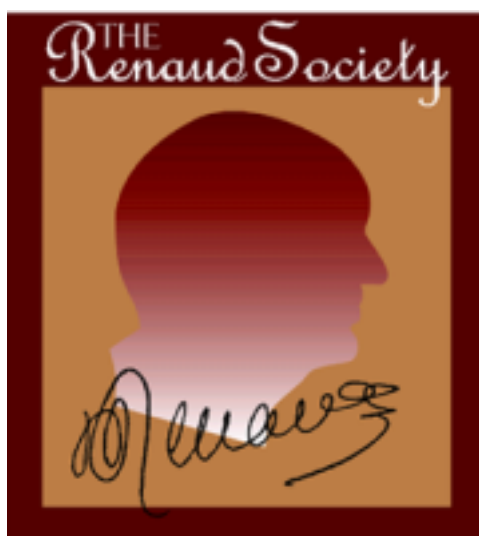
alcohol and individual principal polyphenols—can exert a diverse array of biological effects on systemic circulatory components and myocardial function. Specifically, his team has conducted ongoing studies with cell culture/ animal models combined with state-of-the art methods such as microarray gene analysis that are used to delineate the molecular basis and mechanisms by which individual wine components activate endothelial cells at the cellular, molecular and gene levels to increase and sustain their clot dissolving potential. Booyse explained, “The combined ability of wine components to simultaneously increase systemic fibrinolysis, in conjunction with the described suppression of the coagulation system and platelet function, will be expected to provide substantial cardio protection by reducing the overall risk for early initiation of thrombosis and atherogenesis, as well as the later CAD-related atherothrombotic consequences of myocardial infarction, stroke and CAD-related mortality.”

This cutting-edge research will be of major significance over the years to come as it is a fundamental cornerstone for lending more evidence to the potential health advantages of moderate drinking. Last year, AIM developed a major website section on this ongoing research and you can learn more about it by visiting www.aim-digest.com

There were several other presentations by media, industry and other experts which provided other interesting aspects on wines from around the world. The last discussion featuring the ‘Physicians in Wine Panel- A Blend of Medical Practice & Wine Culture’ underscored the importance of the ongoing research findings on moderate wine, alcohol consumption and health. Overall, it was emphasized that messages on the moderate and responsible enjoyment of wine and alcohol should be maintained as an important educational component.

Towards this end, Tedd Goldfinger outlined how the **Desert Heart Foundation launched The Renaud Society**. He explained how the Society has been named for the ‘iconic pioneer in the field of wine and health’ and hopes to expand its ‘network of physicians interested in the pleasures of wine and a healthy way of life’. The Renaud Society will offer a regular newsletter, annual special events, as well as trips and tours to wine regions around the world. To learn more about the different activities of the Society, please write to

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