



Health Development Agency

Risk-taking behaviour in men

Substance use and gender

March 2003

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The HDA would like to acknowledge the contribution of the following in the preparation of this publication: Colin Francome, Edna Oppenheimer, Catriona Woolner and Suzanne Davies (School of Health and Social Sciences, Middlesex University) and the HDA research team, Seta Waller, Dominic McVey and Sally Taylorson.

Copies of this publication are available to download from the HDA website (www.hda.nhs.uk)

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ISBN 1-84279-148-6

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About the HDA

The Health Development Agency is a special health authority established in April 2000. Its role is to identify the evidence of what works to improve people's health and reduce health inequalities, and to work with professionals and practitioners across sectors to get that evidence into practice.

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Overview

Aims of the review

This review aims to:

- Examine the evidence on risk-taking behaviour in men (smoking, alcohol misuse and illicit drug use)
- Identify vulnerable groups
- Consider the importance of male gender roles and identities as a factor in risk behaviour
- Discuss the implications of the findings for prevention and intervention approaches aimed at improving men's health and reducing inequalities in health.

Review methods

The review focuses mainly on literature published in English between 1990 and 2000 with some sources pre- and post-dating the main time-span.

Appropriate electronic databases were identified and searched. These were:

- MEDLINE
- BIDS Social Science
- Psychlit
- Sociological Abstracts
- Agenda.

Databases at specialised libraries were consulted and the libraries used to identify additional published material:

- DrugScope
- Alcohol Concern
- ASH
- London School of Hygiene and Tropical Medicine.

These journals were systematically searched by hand:

- *Addiction* 1997-2001
- *Alcohol and Alcoholism* 1997-2001
- *British Journal of Medical Psychology* 2000-2001
- *Drugs: education, prevention and policy* 1997-2001
- *Journal of Health Psychology* 1999-2001
- *Journal of Social Policies* 1997-2001
- *Journal of Medical Ethics* 1997-2001.

Chain search (use of references in identified major publications) was used to identify additional current papers and any seminal studies prior to 1990 with an important bearing on the review.

There were a number of problems in conducting the literature search and writing this review. To begin with, searching on main keywords such as men, alcohol, (illicit) drugs, smoking etc located an enormous amount of literature, much of it useful in examining broader aspects of the variables associated with men's health, substance use and risk behaviour. Attempts to limit searches by inserting 'gender' as a keyword either identified very little or identified many items where the appropriate keyword was 'sex' rather than 'gender'. Research and discussion on the relationship between substance use, risk and gender was extremely sparse and studies have tended to control for sex rather than analysing the importance of gender.

Messing (1995, cited in Denton and Walters, 1999) argues that because gender is a proxy for the differences in the lives of men and women, it is never sufficient to simply control for sex in statistical analyses since this masks gender roles and prohibits a fuller understanding of the nature and influence of gender differences. Difficulty in selecting appropriate keywords to limit the search to papers where gender was an important element is likely to have resulted in the loss of some items.

The review, therefore, concentrates on up-to-date literature with a focus on the UK and presents a discussion of the issues rather than a systematic review of all available publications.

Outline of the review

The review consists of five sections.

The introduction provides an overview of men's health in general and illustrates the links between gender, health and risk behaviour. For the purposes of this review, 'risk-taking behaviour' is defined as the use of tobacco, alcohol misuse and use of illicit drugs.

The next three sections, on smoking, alcohol and illicit drug use, consider the extent and patterns of men's substance use and associated risk behaviours, identify vulnerable groups of men and discuss the evidence for the relationship between gender, risk and substance use. Each section has a conclusion that attempts to highlight the main findings.

The final section is a brief summary of the main issues with comments on the need for future research and the implications for policy and practice.

Introduction

Health and gender

Although fluctuations and differences in life expectancy for men and women are linked to changing social and economic structures, overall gender differences persist over time and space. In all developed countries there is at least five years' difference between the longevity of the two sexes. On average, women in the richer parts of the world live an extra six years compared to men; in poorer countries they live an extra three years. Mortality rates for children under the age of 20 have fallen dramatically in recent decades – but there is still a gender gap which favours girls. Morbidity studies indicate that men have a poorer prognosis than women for many diseases common to both sexes, possibly due in part to men's greater lack of concern about health, their reluctance to seek healthcare at an early stage and, according to some accounts, because male-only illnesses – such as prostate cancer – are often poorly treated (studies reviewed in Francome, 2000).

Examining the reasons why, overall, men have poorer health and lower life expectancy than women, Francome (2000) notes the influence of biological factors, lifestyle differences and problems with the male role:

'Most of the leading causes of death among men are the result of men's behaviours that leave men more vulnerable to certain illnesses.'

(Kimmel and Messner, 1995, cited in Francome, 2000)

Among the lifestyle factors that influence health, substance use has received increasing attention, not least by the World Health Organization in setting targets for health for the 21st century:

'Cardiovascular disease, cancer, and diabetes are the top three health problems ... and share common risk

factors – smoking, unhealthy nutrition, lack of physical exercise and heavy drinking.'

(comment in March 1998)

Men, as subsequent sections will show, are more likely than women to smoke, drink heavily and use illicit drugs. They are, therefore, more 'at risk' than women from harms associated with substance use. Differences between the sexes in use and misuse of substances are clearly demonstrated by the statistics; but to what extent is gender an important variable?

Risk behaviour, health and gender

Numerous publications have discussed ways in which male and female stereotypes influence child development even before birth (Hudson and Jacot, 1991). A process of gender stereotyping, begun early in life, continues through childhood (Strong and DeVault, 1986; Oakley, 1972). As noted by Strong and DeVault (1986):

'Parents manipulate their children from infancy onward. They treat a daughter gently, tell her she is pretty, and advise her that nice girls do not fight. They treat a son roughly, tell him he is strong, and advise him that big boys do not cry. Eventually, children incorporate their parent's views in such matters as an integral part of their personalities ... Toys are sex differentiated, dolls are considered appropriate for girls and cars for boys.'

(Strong and DeVault, 1986, p93)

According to Miedzian (1991), gender stereotyping results in a 'masculine mystique' just as much as in the 'feminine mystique' (Friedan, 1964), the masculine mystique being associated with a range of personality traits and social behaviours which have adverse

consequences for men's social roles and gender identities. The box below provides a fairly typical example of stereotypical male and female characteristics:

Gender stereotypes

Masculine

Inexpressive, aggressive, ambitious, analytical, assertive, successful, competitive, forceful, independent, dominant, strong personality, athletic and invulnerable.

Feminine

Expressive, emotional, childlike, gentle, compassionate, loyal, sensitive, tender, understanding, yielding, gullible, refined and warm.

Source: Moynihan, 1998, p1072.

Risk-taking fits well within the stereotypical male role, although, as Green (1997) notes, risk assessment and risk-taking are part of everyday, normal behaviour for both men and women. In discussing accidents and risk, Green comments:

'At one level, the individualisation of risk assessment, through which we are all responsible for managing our risk environments, is irresistible. To claim that we are responsible for our own safety is to claim a very basic social competence: that we are capable of "looking after ourselves" ... risk assessment is "a technique for constructing an appropriate social identity".'
(Green 1997, p187).

Green (1997) provides ample evidence of the complexity of issues surrounding risk-taking, gender and social identity. For instance, she notes that children's accounts of 'gender appropriate' risk-taking behaviour suggest that they are achieving a gendered identity through talking about risk even if not actually risk-taking.

Equally important are gender differences in the social expectations of risk-taking. Boys and men are expected, in most circumstances, to take greater risks than women and are given greater leeway in experimenting in and becoming involved in risky behaviours. Media accounts of the deaths of Everest climbers, for example, adopted different approaches (and different moral tones) to the analysis of male and female climbers' adequacy in risk management and to the legitimacy of their risk-taking (see Green, 1997, pp127-8).

Some social role theorists have attempted to explain how gender roles can influence risk-taking behaviour and, in turn, its effect on accident rates and health. One explanation, linked to gender stereotypes, is that the female role is characterised by communal qualities such as kindness, compassion, a concern for the welfare of others and the avoidance of harm to oneself. In contrast the male role is characterised by more active qualities such as chivalrous or heroic helping, a resistance to being influenced by others and a willingness to take risks (discussed in Jadack et al., 1995). Risk-taking, as Lupton (1999, p157) comments, is an integral part of 'gendered performances' whereby people, at an early age, learn to value and adopt socially approved behaviours.

There is a considerable body of research that examines the disadvantages of gendered socialisation towards women. But are men also disadvantaged? As a result of their roles as 'risk takers', it appears that men are more likely than women to experience adverse health and social consequences. For instance, evidence from the United States indicates that men are more likely to be murdered or become the victims of assault and that the judicial system is harsher towards men than towards women (Francome, 2000; Wright, 1998/9). The disadvantages of gender stereotyping to men's health are also evident from available research.

Health consequences

As mentioned earlier, most of the leading causes of death among men are the result of gendered behaviours. The propensity for males to engage in risk behaviours to a greater extent than females is indicated by the fact that frequently the deaths of older boys are due to accidents such as car crashes and firearm accidents (UNICEF, 1998). Furthermore, there is some evidence that young men have declining life chances related in large part to their role in society:

'The past three years have seen a rise in the number of boys failing at school, truanting, becoming involved in violence and crime. There has also been a sharp rise in the suicide rate of young men – and not just in Britain. In Australia it is the highest cause of death, even overtaking the road death toll.' (Katz, 1998, p8)

Health behaviour studies have shown that there are gender differences in perceptions of health status, help-seeking for health problems, the presentation of symptoms and a readiness to take health prevention

action. Internalised beliefs about appropriate 'male' and 'female' behaviour may influence the ways in which men interpret and respond to problems related to risk-taking behaviours. Generally, women are more likely than men to consult medical services (and other professional helping services), to present symptoms as psychological or emotionally based and to become involved in preventive activities. It has been argued that men are less concerned with their appearance and in turn their habits and general health.

The conclusion in one discussion was that the 'male gender role leads men to ignore their health needs' (Davidson and Lloyd, 2001). In another study, men who identified with more feminine traits were more likely to use the health service and showed more practical concern about their healthcare. The more 'macho' men were less concerned about their health (Moynihan, 1998). As Armstrong (1983) notes, such differences may be as much a product of social roles and social expectations of male and female behaviour as a result of differences in biological vulnerability or illness rates.

It is notable that gender differences persist even in the case of diseases and conditions which are specifically or predominantly male. For example, one researcher studying prostate problems reported that 'men generally tend not to talk about their health regarding it as women's territory'. Furthermore, observers reported that many men did not even tell their partners or family about prostate problems and a very high number had very little knowledge about where the prostate is and what can happen to it (Bernardes, 1997). Men often do not seek help until a disease has progressed and this is likely to influence mortality rates (eg in the case of survival from skin cancer; see: Boseley, 1999).

A compounding factor is the response of services and health and social welfare professionals to men. Male-only illnesses are sometimes poorly treated (Mulley and Barry, 1998) and, more generally, attitudes towards men when they attend services are not always helpful. Oppenheim (1994) provides an illustration of the difference in approach to males and females, quoting a US medical doctor who explained why he was 'harder' on men than women when trying to get them to give up smoking:

'Perhaps men are more accustomed to hearing orders: from bosses, drill sergeants, police officers, coaches, team captains. When my platoon sergeant or baseball

coach threw a tantrum, I simply took the abuse and waited for it to pass. Men value bravado, and an important part of it is not letting other men see how much you hurt. True bravery (in male terms) means going out of your way to endure pain. Men climb mountains, get into brawls, go to war, drive unsafely, play football, and fight bulls. Although unhealthy, these take bravado and men like that.'
(Oppenheim, 1994, p2)

In considering men's use and problem use of substances, little research attention has been paid to the relevance of theories and insights derived from the broader health literature discussed above.

Substance use and gender

For all of the behaviours with which we are concerned – smoking, alcohol and drug use – there is a higher prevalence of male risk-taking behaviour than female.

The role of substance use and associated risk behaviour in male mortality and morbidity has been acknowledged in numerous studies (eg see references in Davidson and Lloyd, 2001; Newburn and Shiner, 2001). The association between alcohol and drug use, other risk behaviours and mental health problems is also well established in a growing body of literature on 'dual diagnosis' and its management (eg see special focus papers in *Drugs: education, prevention and policy*, 1999). Studies have also found an association between gender roles (perceptions of 'masculinity') and mental health, including a range of conduct disorders such as anti-social behaviours, sexual 'deviancy', aggressive and violent behaviours, schizophrenia and suicide (reviewed in Kilmartin, 1994). So there appears to be a close and complex association between risk-taking behaviour, substance use, health (physical and mental) and gender roles and identity.

It should be remembered, however – since it is particularly important for health development policy and practice – that perceptions of risk and risk behaviour differ between social groups. Perceptions of risk are located within social, cultural and moral frameworks and institutional structures which are by no means neutral or value free in their definitions of, and responses to, risk. (See Lupton, 1999 for a discussion of different theoretical perspectives on risk and risk behaviour). Men are not a

homogeneous group; ethnicity, social class, education, age and employment are likely to affect the development of gender roles and identities, patterns of substance use and help-seeking actions, making some groups of men more vulnerable than others to the adverse affects of risky behaviours (eg O'Donnell and Sharpe, 2000).

As media responses to the deaths of Everest climbers demonstrated, risk and risk behaviour are relative concepts. How risk is defined, assessed and measured varies greatly in the literature between different research studies and policy statements, between one country and another, and between lay and professional groups. However, despite such variations, men clearly emerge as 'risk takers' to a greater extent than women and there is some evidence to suggest that substance use – especially smoking and alcohol consumption – are more important determinants of health status for men than for women (Denton and Walters, 1999).

Conclusion

- Research on alcohol, tobacco and drug use often produces findings which differentiate by sex. However, this is not the same as looking at the importance of gender as an influence on risk-taking and on social attitudes and responses to male and female risk-takers and substance users. 'Gender' approaches need to take account of:
 - The ways in which societies construct the notions of 'man' and 'woman' and the traits and attributes which are commonly thought of as 'male' or 'female'
 - The different social roles and responsibilities expected of men and women
 - The different norms and values applied to male and female behaviours
 - The different social and situational contexts within which men and women live
 - The ways in which their location within social structures, institutions and networks influence beliefs, attitudes and behaviours and the choices and opportunities open to men and women.
- There is clear evidence of gender differences in responses to risk-taking, health and help-seeking for health problems. Male roles and social identities may themselves be 'risk factors' for higher rates of morbidity and mortality among men compared to women. This deserves more attention in preventive

approaches and (specifically) in developing responses to substance use and related problems.

- It is important to examine the relationship between risk behaviour, substance use and gender within a wider framework which recognises the influence of other socio-demographic factors, such as age or ethnicity, as well as the influence of social networks and social contexts of use on men's risk-taking behaviour.

The sections which follow on smoking, alcohol use and the use of illicit drugs illustrate the extent to which men are 'at risk' and discuss ways in which gender roles and identities may be related to risk-taking and substance use. Although the discussion will draw on international literature, the emphasis will be on the situation in the UK.

Smoking and risk

Adverse effects

The adverse effects of smoking have been well documented. For every 1,000 young persons who take up smoking, one will be murdered, six will die on the roads, and 500 will die before their time as a result of tobacco use (Department of Health, 1999b). In the United States and Britain, smoking is the most preventable cause of death and nine out of ten lung cancer deaths are caused by smoking. In the UK, the proportional impact of smoking is greater in younger age groups and in men, accounting for one in three male deaths in the 35-64 age group (Royal College of Physicians, 2000).

However, for many people smoking poses conflicts because they find it difficult to stop even though they realise it is a major health risk.

A report from a consulting firm was quoted in the *British Medical Journal* as saying 'cigarette smoking is a) cancer causing b) cancer promoting c) poisonous d) stimulating, pleasurable and flavourful' (Dyer, 1998). There are, of course, other experienced and perceived benefits to smoking – the relaxing effects, to cope with negative feelings and states, to socialise and so on. However, there is some debate in the literature regarding whether smoking or nicotine does, indeed, produce a positive effect on mood or cognitive performance (Royal College of Physicians, 2000). Whether there are significant gender differences in the reasons for smoking and in the

experience of smoking remains an important research question, especially in the light of Goddard's (1990) findings that, at a given level of consumption, girls appeared more likely to be dependent on cigarettes.

Prevalence of smoking: the risks for men

Worldwide there is an increasing health problem due to smoking. In the developing world 48% of males over the age of 15 smoke compared to 7% of females. These figures are likely to be minimum ones as self-reported estimates tend to be lower than those produced from sales (Graham, 1995). The World Health Organization has provided details of smoking habits for 38 countries: Russia had the highest proportion of male smokers (67%) followed by Turkey (63%), Fiji (59%), Estonia (52%), Poland (51%) and Bolivia (50%) (UNICEF, 1998). Countries where less than three in ten men smoked were Sweden (22%), New Zealand (24%), US (28%), UK (28%), Australia (29%) and Ireland (29%) (UNICEF, 1998).

According to ASH, in England and Wales the highest recorded level of smoking was in 1948, at 84% of men and 40% of women. According to Graham (1995) the male figure comprised 65% of men smoking cigarettes and the rest using other forms of tobacco such as a pipe or cigars. The male figure declined from this peak and the evidence for most recent years is shown in Table 1.

Table 1 Percentage of smokers in the population (England and Wales)

	1974	1978	1982	1986	1990	1994	1998
Males	51%	45%	38%	35%	31%	28%	28%
Females	41%	35%	33%	31%	29%	26%	26%

Source: www.ash.org.uk

The results show that the percentage of men smoking declined from 51% in 1974 to 28% in 1994 and since that time has remained constant. Smoking among women peaked at 45% in 1966 but then declined to 41% by 1974 and continued to decline, stabilising at just over a quarter of women smoking. Currently in England and Wales there are 13 million smokers and 13 million ex-smokers. There are also signs that those who do smoke are smoking slightly fewer cigarettes. In 1978 the average smoker consumed 18 cigarettes a day but this had fallen to 17 by 1988 and 16 by 1998 (ONS, 2000).

More detailed analysis of the situation in Britain reveals that the level of smoking varies by age, as in Table 2. The figures show that by the late 1990s it is in the age group 20-24 that smoking is most common. It declines in later years and in 1998 only 16% of over-60s were smokers. This figure is lower both because some people have ceased smoking and also because of differential death rates, which means that a higher percentage of smokers will have died.

Smoking varies according to educational level and social class (Wright, 1998; Royal College of Physicians, 2000). The percentage of men smoking in the 1940s was uniformly high across all the social groups except unskilled workers, who smoked cigarettes significantly less (Graham, 1995). People in the higher social classes were the first to stop smoking. Consequently there is now a strong social class gradient in prevalence. In 1999, 33% of men who were manual workers smoked in comparison to 21% of men who were in non-manual occupations (Lader and Meltzer, 2000). More detailed class background is given in Table 3, below.

The table shows that only 13% of men in the professional class 1 were smokers compared to over three times this percentage among social classes 4 and 5. The figures also show that in social classes 1 and 2 women are more likely to smoke than men. However, in social class 5, unskilled workers, male smokers outnumber females by a ratio of four to three. Research indicates that working class men are three times as likely to die of lung cancer as middle class men (Austoker et al., 1994). It has been estimated that among men smoking accounts for over half of the difference between the social classes in premature death (Richardson and Crosier, 2001).

Among the most socially deprived and vulnerable groups, the figures are higher with prevalence of smoking reaching over 70% and up to 90% in homeless people sleeping rough (Richardson and Crosier, undated). Rates of smoking among prisoners are also high. Richardson and Crosier (undated) report that 85% of male prisoners on remand and 77% of male prisoners sentenced are smokers.

In England there are regional differences in the extent of smoking. The 1998 General Household Survey found that 31% of men smoked in the West Midlands in contrast to only 24% in Anglia and Oxford and 25% in the South and West. It might be thought that regional differences might reflect social class structure. It is perhaps surprising, therefore, that in London the smoking level among men is 30%, slightly above the national average (ONS, 2000).

As with drug and alcohol use in general, data on smoking and ethnicity is sparse. The smoking level of Bangladeshis is particularly high at 45%. Prevalence for

Table 2: Percentage smoking by age group in selected years (England and Wales)

Age group	16-19	20-24	25-34	35-49	50-59
1998	31%	40%	35%	30%	27%
1996	29%	39%	36%	30%	27%
1988	28%	37%	36%	36%	33%
1978	34%	44%	45%	45%	45%

Source: www.ash.org.uk

Table 3: Percentage smoking by sex and social class, 1999 (England and Wales)

Social class	1	2	3A	3B	4	5
Men	13%	20%	23%	34%	39%	44%
Women	14%	24%	23%	28%	34%	33%

Source: Lader and Meltzer, 2000

other ethnic groups given by Richardson and Crosier (undated) is: Irish, around 40%; black Caribbeans, 35%; Indians and Pakistanis, around 25%; Chinese 15%.

Teenage smoking

Young people have been identified as a particularly vulnerable group and there have been problems in persuading young people not to smoke. One sub-target of *The Health of the Nation* (DH, 1992) targets was to reduce the prevalence of cigarette smoking in young people aged 11-15 by at least 33% by 1994.

In 1996, 28% of boys and 33% of girls were regular smokers (at least one cigarette per week) by age 15 (Royal College of Physicians, 2000). The General Household Survey found that between 1996 and 1998 the percentage of men aged 16-19 who had ever smoked rose from 31% to 36%. This is a significant rise which also occurred among young women (Lader and Meltzer, 2000). Although girls are now more likely than boys to smoke, there is considerable concern regarding the failure of preventive approaches to reduce the uptake of smoking.

There are many factors which influence the likelihood of young people smoking (parental role modelling, peer influence, the association of smoking with the transition to adulthood, the association of smoking with rebellion or a school counter-culture and so on).

The report from The Royal College of Physicians (2000), indicates a number of the main risk factors (see box below).

Risk factors associated with smoking in children

- Low educational achievement
- Living with parents who smoke (especially where two parents smoke) – effect especially apparent in girls
- Having siblings who smoke

Potential risk factors

- Low socio-economic status
- Having friends who smoke
- Having teachers who smoke

(Source: Royal College of Physicians, 2000)

The extent to which these factors are linked to gender requires further examination, especially in the light of changes in young women's smoking in recent years; but we can discern the influence of gender images on (and in) cigarette advertising and the importance of playing to self-image has been noted in the literature (Dyer, 1998).

Persuading and assisting people to give up smoking

The immediate and long-term benefits to ceasing to smoke are well documented (eg Famighetti, 1998). In Britain local family doctors are able to persuade about 5% of people to give up smoking each year by giving brief advice. This compares to a cessation rate of 1% in those not advised. The evidence indicates that the advice is more likely to be heeded when it stresses short-term benefits rather than the long-term dangers. It seems that more could be done by doctors to persuade people to stop smoking, for only 22% of smokers report that they have been advised to give up by their doctor (Austoker et al., 1994).

There is evidence that longer-term and more intensive courses are effective in helping people stop smoking and the use of nicotine patches seems to help some people. In a randomised placebo controlled trial it was found that one in five (19.4%) heavy smokers using a patch gave up smoking for at least three months compared to one in eight (11.8%) of the controls. About half of those abstinent at the end of the three months would be able to keep it up for a year (Yudkin et al., 1993). Another study found that 24% gave up after hypnosis, 14% after psychological methods including aversion, 11-12% after a nicotine patch or gum if they were self-referred, and 2% if advised to stop smoking by their doctor once (Francome and Marks, 1996). This latter figure is less than half the reported British cessation rate on doctor's advice.

An explanation of why nicotine patches are not more successful is that they normally provide less than half the plasma nicotine concentrations that a moderate to heavy smoker will receive from cigarettes. Doubling the dose of nicotine does not appear to improve abstinence rates in the longer term. However, results from studies of a combination of patches and gum together almost doubled the rates of cessation over a 12 month period (Stapleton, 1999). Reviewing the evidence, the Royal College of Physicians (2000) concluded that there was

ample evidence that nicotine replacement therapy was effective in helping smokers to quit. (Other approaches are reviewed in the same report but gender-specific findings are not examined.)

Self-image, smoking and young people

One crucial issue is finding appropriate methods of encouraging young people not to start smoking. A reduction in advertising could be a factor since the presence of advertising leads to cigarettes having a much more positive image than health messages would indicate they deserve. Another of the problems in preventing teenagers from starting smoking may be the presence of an anti-school or youth subculture. It may be that some groups of teenagers reject health education messages which are based on middle-class values of thinking for the future and restraint, in favour of a youth culture based on immediacy and enjoyment of the moment – a culture which tends to encourage smoking (Sugarman, 1973).

Scottish researchers have stated that it is crucial for health education programmes to be rooted within the reality of young people's lives and to take account of the complicated role that tobacco plays within it (Amos et al., 1997). This changes with age and is influenced by whether a young person is a smoker or a non-smoker:

- Gray and colleagues (1996) asked adolescents to project traits onto models in magazine pictures. The research identified a difference in perception according to age. Among the 12-13 year olds smoking was viewed as a negative activity. It was regarded as a group or gang-based activity and was related to delinquency, promiscuity and drug taking. It was an activity which distinguished a rebellious minority from the majority. However, among older teenagers (15-16 years olds) there was a more ambivalent and open minded attitude to smoking. They were more positive than the younger groups and saw benefits in smoking.
- Lynch (1995) proposed that non-smokers take a relatively simple position in the rejection of cigarettes. However, smokers have a much more heterogeneous view of the subject. Amos and colleagues (1997) found that smokers were much more willing to describe themselves as 'druggy' or say that they took drugs compared to non-smokers. Smokers were also more likely to say that they were wild and less likely to think they were healthy. Male smokers were inclined to rate themselves and their ideal as 'tough'.

The complex relationship between self-image and smoking led researchers in the Scottish study to state that the effectiveness of health promotion programmes has faced limitations because the nuances of the contemporary social world of the young have not been understood. They criticised an advertisement in a Scottish anti-smoking campaign for not taking account of youth culture. It showed two identical females except that the one on the right had a cigarette. The advert stated: '7 out of 10 guys prefer the girl on the left.' The researchers stated that while this may be true, the other 30% who prefer the smoker may well do so for good reasons and may reinforce the girl smokers' image of themselves as tough, rebellious non-conformists – appealing to some of the young men (Amos et al., 1997, p857). They made three suggestions for future health promotion campaigns:

- Anti-smoking campaigns should attempt to change young people's image of smoking away from a daring, rebellious and illicit act and one associated with drug use
- Programmes should try and exploit the fact that most people desire to be healthy and so abstinence should be promoted as a healthy state
- Campaigns should take account of the fact that self and inspirational images vary by age, gender and smoking behaviour.

Conclusion: smoking and gender

According to a report from the Royal College of Physicians (2000), nicotine addiction is closely linked to socio-economic disadvantage and is responsible for significant health inequalities. It is highest in semi-skilled and unskilled manual occupations with the difference between manual and non-manual groups widening in recent years. Although the widening socio-economic gap is especially evident among women, smoking remains a major factor influencing mortality and morbidity among unskilled and semi-skilled men. Other measures of relative poverty or deprivation (eg housing tenure, low educational achievement, being divorced or separated) are also independently associated with an increased risk of smoking in adults.

The links between smoking and ethnicity is an area which has received little research attention. Patterns of smoking in ethnic minority communities require further examination but there is evidence that some groups of

males – for example, Bangladeshi men – may be more vulnerable to taking up smoking. Future research should consider possible cultural and social explanations for differences in patterns of smoking in various ethnic groups. It would also be interesting to know more about the impact of smoking on second and subsequent generation ethnic minority children.

The effect of gender on the likelihood of being a smoker is changing; the prevalence of cigarette smoking in women is now at similar levels to that of men and, among younger people, females account for the majority of new young smokers (Royal College of Physicians, 2000). Despite expressed desire to quit smoking, only about 2% of those who attempt to do so succeed each year. Cessation rates for men and women were similar in the late 1990s (2.4% males; 2% females) but figures indicate that only about 50% of smokers stop smoking long term before the age of 60 (Royal College of Physicians, 2000). Clearly, there is a risk of smoking habits established in youth remaining into late adulthood and it is, therefore, crucial to direct preventive approaches at young people.

Despite the narrowing smoking prevalence gap between young men and women, gender issues remain important. Smoking is still associated with particular images with which young people identify – and young women may be challenging dominant ‘masculinities’ through their participation in risk-taking activities such as smoking (Lupton, 1999, p163). Preventive activities need to address the source of these images as well as target individual lifestyles and behaviours, and examine the relationship between gender identity, individual lifestyles and social structures.

Alcohol and risk

Alcohol consumption and the prevalence of hazardous drinking

Alcohol is 'our favourite drug' (Royal College of Psychiatrists, 1986), and widely used in most countries. Data on alcohol consumption worldwide has consistently found gender differences – simply being male entails a risk of running into problems with drinking! Men are less likely than women to be abstainers, more likely to drink above recommended levels, more likely to report alcohol-associated harms and more likely to become dependent on alcohol (Plant, M. L., 1990; Plant M. A., 1990; Grant, 1998; Newburn and Shiner, 2001).

In the UK, according to the General Household Survey (ONS, 2000), 7% of men and 13% of women reported that they were non-drinkers and 27% of men compared to 14% of women were drinking above recommended levels, with 6% and 2% respectively in the 'high' category.

Over 38% of adult males aged 16-74 years have been reported as 'hazardous drinkers'; that is, they engaged in alcohol-related risky behaviour such as becoming involved in arguments and fights – the majority of these males (53%) were aged 16-24 years old. (For further quantitative data on men's alcohol consumption, see Alcohol Concern, 2002.)

The health and social benefits of light to moderate drinking have been recognised. However, alcohol misuse contributes to a wide range of ill health and social problems including chronic conditions (such as liver cirrhosis, heart disease and strokes, cancer, gastritis); acute conditions (such as accidents in the home and in public places, assault, alcoholic poisoning); social problems (with family or work relationships, employment, crime etc). (For a more extended discussion and

Guidelines for 'sensible' drinking

Until 1995, assessment of alcohol-related risk was based on a measure of weekly intake of alcohol. For men, drinking <21 units a week and for women <14 units a week was considered to carry low risk of incurring alcohol-associated harm. Intakes between 22-50 units (men) and 15-35 units (women) were described as hazardous drinking and associated with 'intermediate risk'. Intakes of >50 (men) and >35 (women) were 'high risk'.

Many professionals, health promotion agencies and the general public still use the weekly measure. However, in 1995 the Department of Health issued new guidelines based on daily intake. In brief, it was stated that regular consumption of 3-4 units a day (men) and 2-3 units a day (women) would not accrue a significant health risk. Drinking consistently more would be associated with progressive risks to health. 'Alcohol free' days were recommended.

Defining a 'unit' of alcohol

The alcohol content of a given beverage is calculated from its percentage alcohol content by volume (%ABV). A 'unit' of alcohol is the amount contained in a half pint (284ml) of beer, a single glass (125ml) of table wine, a single glass (50ml) of fortified wine (for example, sherry), or a single measure (25ml) of spirits. A unit approximates to 10ml or 8g of absolute alcohol.

(Information summarised from: *Medical Students' Handbook: Alcohol and Health* (1998). London: Medical Council on Alcoholism.)

estimates of alcohol-related harms see Alcohol Concern, 2002).

There are, however, differences between men in the extent to which they are likely to drink in hazardous ways; patterns of drinking are linked to socio-economic,

cultural and contextual factors as well as to the individual lifestyles of men.

It is well known, for instance, that participation in some occupations and professions, particularly in those traditionally dominated by men, is associated with heavier and more harmful drinking (Raistrick et al., 1999). (Although changes in occupational structures, working conditions and the composition of the workforce mean that work-related drinking patterns may be constantly changing.)

Equally, there is a vast literature on the association between alcohol and other drugs and mental illness.

One analysis of psychiatric morbidity concluded that dependence on alcohol was 'associated significantly and independently with having a psychiatric disorder' (Farrell et al., 2001). Some studies have found young males with severe mental illness to be more at risk of drug and alcohol problems than young females (eg Menezes et al., 1996, UK sample) and depressed males to be heavier drinkers and have more severe drinking problems than females (eg Pettinati et al., 1997, US sample). At the same time, research indicates greater frequency of psychiatric diagnosis among alcoholic women than among alcoholic men (O'Hare, 1995). It is possible that some of the differences between men and women are due to differences in the presentation of symptoms (eg O'Hare 1995). An examination of the role of gender issues in the association between alcohol use and mental illness warrants more in-depth examination but is beyond the scope of this review.

As the examples above illustrate, differences between groups of men emerge from the literature, but few studies consider gender issues as part of the analyses. In the sections that follow a brief overview is provided of some areas of current concern and the different groups of men who may be affected by hazardous drinking, although the role of gender factors is not clear in most cases and, on the whole, has not been researched.

Ethnicity and cultural diversity

Research on drinking in black and Asian communities in the UK has recently been reviewed by Purser et al. (2001) who carried out a survey of 1,684 second or subsequent generation black and Asian men and women. (Black: African, African-Caribbean and black British; Asian: Indian Hindu, Indian Sikh, Bengali, Pakistani.) The study confirmed existing research in that a high proportion of the total sample were non-drinkers, 62% having consumed no alcohol in the previous year. However, there were differences between groups:

- Most Sikh men (71%) had consumed alcohol
- 87% of black men and 80% of black women were drinkers
- Heavy drinking was unevenly distributed between groups, and was especially heavy for black men (see Table 4). Among black men, the rate of very heavy drinking was higher than that reported by even the younger groups of males recruited to the 1996 General Household Survey (18-24 year old men: 12%; 25-44 year old men: 6%).

Purser et al. (2001) note, however, that previous studies have not found such high drinking levels among black men and that the results of their survey warrant further research.

For men in the study, religious identification emerged as a significant indicator of whether they drank or not. This was more important than other cultural or social factors and was associated with less risky drinking among those who did consume alcohol (the situation for women was more complex). Ethnic minority identity emerged as a strong force for many respondents (57% males, 53% females). The authors found some support for the suggestion that the likelihood of drinking might be associated with the perception of drinking as essentially a part of British or West Indian culture and less so as part

Table 4: Percentages of men who drank *fairly/very heavily in the last week by ethnic group

	Black	Indian Hindu	Indian Sikh	Pakistani	Bengali
Fairly heavily	34%	4%	24%	4%	5%
Very heavily	15%	2%	6%	0%	2%

Source: Purser et al., 2001, pii *Fairly heavily is more than 21 units; very heavily is more than 50 units

of south Asian cultures, but the association was not strong.

Overall, survey respondents emphasised the benefits rather than the harms associated with alcohol use. The authors noted that because concern tended to be associated with the occasional consumption of large quantities rather than with constantly high consumption, individuals were less likely to identify themselves as having a drink problem. Purser et al. (2001) suggest that professional concern should be targeted at the amount of alcohol consumed rather than at its frequency.

Respondents' reports on a range of 23 alcohol-related risks indicated that a considerable proportion (36% of male drinkers) had experienced seven or more risks in the previous year. Among the risks reported were:

- Sharing hypodermic needles (0.1%)
- Taking drugs they would not otherwise have taken (14%)
- Having unprotected sexual intercourse (30%).

Survey findings showed that:

'The greatest indicators of concern were related to single episode high consumption drinking and the number of risks reported after drinking.'

Again, more in-depth examination of cultural factors is called for. Another factor which appeared to influence risky drinking was the size of household in which men were living, with men in small households being more at risk. It was not clear from the results whether living in a small household, especially when linked to lack of religious identification, was indicative of a reduced social network which might be a cause or effect of heavy drinking. On the other hand, the data may simply indicate a group of young heavy drinkers who lack family ties and have money and leisure time. The study could not, however, explain what helped to sustain risky drinking and the authors suggest the need for further work to explore the influence of cultural events such as weddings and a tradition of male-only socialising.

Little attention has been paid to ethnicity and cultural diversity in research on young people's drinking. Respondents in the survey conducted by Purser et al. (2001) were young, 18-40 years of age, the majority being under 35. But the analyses did not distinguish

between age groups and the study was not set up to examine gender differences in depth. However, UK studies reviewed in Newburn and Shiner (2001) indicated the following:

- Compared to white youth, ethnic minority teenagers were less likely to report using alcohol or drinking frequently (Harrington, 2000)
- Young white and black drinkers appeared to have similar drinking patterns and drank more heavily than Asians (Measham, 1996). In some studies, differences between white and Asian drinking patterns have been 'stark' (Denscombe, 1995)
- Compared to whites and black African and Caribbean youth, Bangladeshi youth had the lowest level of substance use including drinking (Karlsen et al., 1998).

The findings from such studies need to be approached with caution. Most of the studies are small and have been conducted in different parts of the country. As Newburn and Shiner (2001) point out, some research has looked at the role of religion in the drinking patterns of ethnic minority groups but the results are inconclusive. (Although results from the survey by Purser et al., 2001 are notable.)

A considerable amount of work still needs to be done to understand the influence of factors such as religion, social class, peer networks and family influence on the drinking habits of different ethnic and cultural groups. Moreover, the possibility that different ethnic groups may hold different gender 'images' and the possible interaction of male image and substance use with some of the other variables mentioned above have not been explored. For a general discussion of youth, ethnicity and class and gender identity see O'Donnell and Sharpe, 2000).

Prisoners

Research indicates a higher prevalence of problem drinking in prison populations than in the general population and the role of alcohol as part of the 'problem package' affecting men and women sent to prison has been recognised in the literature. National statistics for England and Wales indicate that over half of male prisoners are hazardous drinkers in the year prior to entering prison (ONS, 1999, cited in Alcohol Concern, 2002). It is known that substitution of one drug for another (eg illicit drugs for alcohol) takes place while in

prison; that this can result in multiple drug use on release; and/or that return to problem drinking is commonplace. (Thomas and McMurrin, 1993; Blackburn, 1993; OPCS, 1995; Plant and Plant, 2000). However, there is little research on these issues or on the impact of problem drinking on rehabilitation and re-offending, or on the role of alcohol in the general health of newly released prisoners. Although it is unlikely that there will be gender factors specific to the prison environment, it may be that the prison context serves to reinforce male images or stereotypes which are conducive to heavy alcohol use and to adopting various forms of risky behaviour. This is an area where further research is required.

Socio-economic group and social exclusion

Although the heaviest male drinkers are in the higher income brackets, there is evidence to show that problem drinking is twice as common in the poorest socio-economic groups. One study found that men aged 25-39 in the unskilled manual group were 10 to 20 times more likely than men in professional classes to die from alcohol-related causes. Excess drinking is also higher among men who are socially excluded. Around 30% of homeless people are problem drinkers and around 40% of homeless men have been reported as 'high risk' drinkers (information from Alcohol Concern, 2002). (Note: the indicators of social exclusion often overlap with measures of socio-economic status, eg income, employment, education, housing.)

Alcohol and unsafe sex

It might be expected that when people drink alcohol they are less likely to practice safer sex, and there is considerable evidence to support this contention. An influential study to this effect was published as long ago as 1986 (Stall et al., 1986). The authors reported the results of a survey of gay men in the US. Those who had drunk alcohol or used cannabis at the time they engaged in sex were more likely to practise high-risk sex. Hingson and colleagues (1990) reported findings from a random survey of 1,773 adolescents which showed that those who drank more than five drinks a day were 2.8 times less likely to use condoms compared to abstaining adolescents. Hochhauser (1989) commented that drug use prior to sexual activity may well impair judgement and risks may be taken which would not have been

chanced if the participants were sober. Plant (1996) summarised the available evidence as indicating that people who are heavy drinkers or who are drug takers are more inclined to take risks during sex.

However, the association between alcohol use and unsafe sex has been the subject of considerable debate and it is accepted that a direct causal connection between alcohol use and unsafe sex has not been established. The importance of taking into account specific situations, immediate influences on sexual encounters and particular contexts within which safer sex does or does not take place is recognised (Alcohol Alert, 2002).

A study of households in San Francisco found consistently that among heterosexuals there was no relationship between alcohol use and risky behaviour. The apparent relationship disappeared or markedly diminished in strength once the frequency of sexual activity was controlled for. The survey found that:

'Sex is unsafe sex: total frequency of sex and total amount of risky sex are measuring essentially the same thing.' (Leigh, 1990, p208)

This research occurred at a time when residents of San Francisco were being 'bombarded' with information about HIV/AIDS. However, the researchers reported that most heterosexuals did not see themselves as being at risk. They did not therefore bother too much with safer sex activities whether they were using drugs or not. This contrasted with the situation for homosexuals who did perceive themselves to be at risk and therefore would need an excuse such as drugs to engage in unsafe sex (Leigh, 1990).

Disinhibition theory – the view that alcohol consumption leads to disinhibition and to unsafe sexual activity – has, therefore, been questioned as lacking in evidence (Plant, 1996). As Plant (1996) argues, research indicates that alcohol is a factor in sexual decision making, but it is too simple to suggest that alcohol use leads to unsafe sex. Indeed, such a suggestion could be counterproductive in that it diverts attention from other possibly more important factors and provides individuals with a reason for evading responsibility for sexual decisions. However, Plant (1996) points out that, apart from being a factor in unsafe sex, alcohol and other drugs may damage the immune system. Prolonged heavy drinking or alcohol-related liver disease have been shown

to be associated with reduced immunity and consequently greater risk of infection.

Confusion over the possible association of alcohol use and unsafe sex may arise, in part, from failure to ask the right questions. The tendency in research in this field has been towards quantitative studies which ask whether respondents used alcohol and had unsafe sex. Respondents are not generally asked if they were drunk at the time when unsafe sex occurred. Alcohol use could be masking the effect of drunkenness. Research needs to examine whether people are more likely to have unsafe sex when they have had a drink but are not yet drunk, when they have drunk to intoxication, or in both circumstances (John Imrie, personal communication).

Alcohol consumption and young men

Young people (18-24 years old) are the heaviest drinkers. By age 18, most young people (84%) have tried alcohol. Most 12-15 year olds (boys and girls) drink only occasionally, mainly in the home under parental or relatives' supervision. Young men are particularly at risk from heavy consumption and from engaging in drinking patterns (especially intoxication and binge drinking) which incur increased risk of harm. With the exception of ethnic minority teenagers who drink less, from age 16 boys are more likely to drink frequently and to drink to intoxication (Health Education Authority, 1992; Newburn and Shiner, 2001).

Among 16-24 year olds, around 37% of men drink heavily (8+ units per occasion) on at least one day a week (ONS, 1999). Around 42% of students have been found to regularly exceed recommended daily limits (Webb et al., 1996). Results from the 1999 European School Survey Project on Alcohol and Other Drugs indicate that high frequencies of drunkenness are mainly found in the Nordic countries and in the UK (Hibell et al., 2000). Among the 15 year olds surveyed, 33% of boys (27% girls) reported being intoxicated 20 or more times in their life and 30% of boys (26% girls) reported drunkenness 10 times or more during the previous 12 months. Similar figures (33% and 27%) were reported for a measure of 'binge' drinking (drinking over recommended levels three times or more in the previous 30 days). These young drinkers are, of course, under the age when they can legally buy alcohol, but recent studies have indicated the ease with which alcohol can be obtained – although,

especially under the age of 16, girls find it easier than boys (Goddard and Higgins, 1999; Honess et al., 2000; Willner et al., 2000).

Studies indicate that a small number of young people aged 12-15 (4%-6% boys and 2%-5% girls) exceed the adult limits for weekly consumption (Health Education Authority, 1992). Another source suggests that as many as 12% of 16-19 year old males and 18% of 20-24 year old males are dependent on alcohol (OPCS, 1995, cited in Raistrick et al., 1999). Research indicates a high co-incidence of alcohol and other drug use in mental illness, including among young people. One study, for example, reported that over 80% of adolescents with an alcohol disorder also had a psychiatric disorder (Rohde et al., 1996, cited in Raistrick et al., 1999). Alcohol is frequently present in young suicides (many of whom are males) – approximately one third according to some sources (Williams and Morgan, 1994, cited in Raistrick et al., 1999).

Definitional and methodological differences between studies mean that prevalence figures can vary and the above should be regarded cautiously. Nevertheless, the estimates indicate that there may be a group of young people who are particularly vulnerable to alcohol misuse and likely to continue harmful drinking into later life.

Evidence from a cohort of 49,464 Swedish military conscripts (1969-1970) suggested that adverse social background in itself was not indicative of high alcohol consumption (Andreasson et al., 1992). There was no association between 'father's drinking habits', 'social class', 'place of upbringing', 'parental divorce' or 'home wellbeing'. The only significant social risk indicator was 'good family economy' – where good family finances provided access to alcohol or the means to buy alcohol. However, contact with the police or child care authorities, poor school adjustment, truancy and poor emotional control were significant, and heavy alcohol use was related to smoking and narcotic use.

More importantly, the study was able to divide high alcohol consumers into a low risk group and a high risk group (five or more risk indicators, 23.5% of all high consumers). The high risk group had a high proportion of fathers who often drank alcohol, had contact with the police or child care authorities more than once, were truant once per week or more often, had low emotional

control, and used cannabis more than ten times a week (Andreasson et al., 1992).

We do not know the extent to which young men are more at risk of continuing to drink harmfully, although studies have suggested that the period of transition to adulthood is longer for males than for females (who tend to adopt family and parenting roles at an earlier age). This may be a factor in sustaining or reducing harmful drinking. Special efforts may be needed to identify young people particularly at risk of continued harmful drinking and to develop early intervention approaches to reducing alcohol-related harm for this group.

Predictors of continuing harmful drinking

There are no clear predictors of continued heavy drinking or 'risky' patterns of consumption. Even in age groups where there is heaviest drinking, most young men drink 'sensibly' most of the time and make decisions about the amounts they drink in relation to their drinking networks, different drinking contexts and other aspects of their lives (Harnett et al., 2000; Brain et al., 2000; Newburn and Shiner, 2001). The risks from heavy drinking and drunkenness are – at least on some occasions – balanced against the pleasures (Harnett et al., 2000). With the transition to adulthood, most young heavy drinkers modify their drinking habits and reduce the amounts they consume as they take on a range of occupational, family and social roles. Drinking styles change as young men 'learn' how to use alcohol safely. However, transition to adulthood has become an increasingly lengthy, diffuse process, more difficult for some young people than others. Failure to achieve transitional goals may incur increased risk of problem alcohol use and associated risk behaviours such as offending (Harnett et al., 2000; Royal College of Physicians and British Paediatric Association, 1995; O'Donnell and Sharpe, 2000).

The results of some studies indicate high levels of risky drinking among samples of young men living in deprived areas or in working class areas. For example:

- Moore et al. (1994) found that binge drinking was most prevalent among young men in manual occupations, educated only to secondary school level
- Measham (1996) reported that, among 15 year olds, heavier drinking, including binge drinking, was associated with living in a working class area

- Similarly, Harnett et al. (2000) found a high proportion (65%) of their sample of east London young men drinking at hazardous levels.

Such studies are not sufficient to argue the importance of social class on young men's drinking, and reviews of the literature have concluded that the evidence on the association between social class and harmful drinking by young people is inconclusive (Wright, 1999; Royal College of Physicians and British Paediatric Association, 1995).

However, a number of factors have been identified as associated with harmful drinking patterns in the under 25s that may indicate an increased risk of continuing problem and dependent drinking into later life.

Individual and lifestyle factors

Studies considering individual traits and personal circumstances suggest that alcohol misuse, anti-social behaviour, offending and crime share common developmental predictors (Newburn and Shiner, 2001; Raistrick et al., 1999; Foxcroft and Lowe, 1997; Graham and Bowling, 1995). These include:

- Disrupted family background
- Low parental supervision and/or poor communication with parents
- Poor performance at school/truancy/exclusion
- Having poor social skills
- Associating with delinquent peers
- Having been in care (or remand/prison)
- Having a history of behaviour inappropriate to age (eg drinking, sexual experience at a younger age than socially approved)
- Physical or sexual abuse in childhood
- Low psychological wellbeing (eg feeling depressed, anxious, low self-esteem)
- Having a risk-seeking personality
- Smoking cigarettes and the use of illicit drugs (a clear association of risk behaviours found in many studies).

Heavier users of alcohol are more likely than other drinkers to have criminal records or records of anti-social or delinquent behaviour. However, most studies agree that there is no proof of a direct causal link between alcohol misuse and adolescent delinquency or crime. The association between alcohol misuse and crime has been explained in a number of ways, indicating a complex

interaction between individual traits and personal circumstance, other drug use (and poly-drug use) and broader social, cultural and economic factors. The cumulative effect of risk factors is important (Foxcroft and Lowe, 1997).

For males, the following factors in particular have been found to be associated with alcohol use and other risk behaviours:

- Having delinquent siblings and being excluded from school have been noted as strong predictors of offending (Graham and Bowling, 1995)
- Being involved in 'delinquent' groups and feeling 'alienated'; where young male offenders (age 13-14) begin to misuse alcohol and drugs, they are likely to become embedded in a criminal lifestyle (Graham and Bowling, 1995). Excessive drinking is prevalent among 'delinquent youth' (Brain et al., 2000) and young people who are 'alienated' are more likely to be heavier drinkers
- Males appear to be under more pressure to drink (Honest et al., 2000)
- Males face greater expectations that alcohol will be accompanied by increased aggression and fighting
- Males are under pressure to adopt a 'macho' image in relation to alcohol use (Honest et al., 2000)
- Alcohol use is associated with, and is frequently used as an excuse for, bad behaviour, including aggression and offending (Honest et al., 2000).

Structural and cultural factors

Consideration of broader social, cultural and economic factors indicates the importance of:

- **Underage access to alcohol.** It is relatively easy for young people to buy or acquire alcohol, although at younger ages (12-15) boys find it more difficult than girls (Goddard and Higgins, 1999; Honest et al., 2000; Willner et al., 2000)
- **Drinking setting/venue.** Anti-social behaviour and offending (eg especially related to alcohol and aggression) may be exacerbated in particular drinking environments (eg noisy, overcrowded, poor/aggressive door and server approaches, availability of cheap/free drinks, tolerance of intoxication/aggression). (Raistrick et al., 1999; Graham and Homel, 1997)
- **Cultural norms and values** regarding drinking and drinking behaviour:

- Some males **choose settings** that conform to a particular image of masculinity that includes intoxication and disorderly or aggressive behaviour. Such individuals are likely to seek out environments which tolerate their behaviour, to drink with like-minded friends. This is more likely in some cultures than in others (Scotland, Finland, Australia, US) (Raistrick et al., 1999)
- Heavy alcohol use and intoxication is found in a significant minority of otherwise conventional, conforming young people (part of normal behaviour reflecting current norms and values among young people as 'psychoactive consumers') and is not necessarily indicative of delinquent, anti-social or non-conformist behaviour (Brain et al., 2000; Harnett et al., 2000)
- **Transition to adulthood** and changes in drinking styles between 12-24: for most young people, problem alcohol use and minor offending behaviour decreases with the transition to adulthood (entering employment, forming stable partnerships/marriage, children). Drinking styles change as young men 'learn' how to use alcohol safely. However, transition to adulthood has become an increasingly lengthy, diffuse process, more difficult for some young people than others. Failure to achieve transitional goals may incur increased risk of problem alcohol use and offending behaviour (Harnett et al., 2000).

Overall, the literature on factors associated with continuing heavy drinking and the development of dependency devotes more attention to risk factors than to protective factors. In particular, there are too few self-report accounts of young men's own decision making regarding when, where and with whom they will drink and their strategies for drinking safely. Information on 19-24 year olds is especially sparse, possibly because research access to this age group is difficult.

Conclusion: alcohol and gender

If we look at drinking practices across time and in different cultures, we find that in many cultures, alcohol has been associated with male status, privilege and authority roles and has sometimes played an important part in men's economic and political activities. Women, on the other hand, have often had restricted access to alcohol or were forbidden its use and have incurred heavy sanctions for drunkenness and excess alcohol

consumption (Plant, M., 1997). The use of alcohol and licence to drink to intoxication is, therefore, deeply rooted in expectations of male behaviour (O'Donnell and Sharpe, 2000).

In societies where most people drink, it is especially difficult for males to be abstainers – an undesirable image linked to being seen as 'weak' or 'sissy' (Dzialdowski, 1988; Crawford, 1984) – and in some groups, a 'real' man is still one 'who should be able to hold his liquor' (Klein, 1992; see also studies reviewed in Neve et al., 1997). Alcohol, like other drugs, also has economic and symbolic value. It functions as a symbol of earning power and social exchange and is significant as an expression of gender identity and gender position within society, peer groups and families. For example, Holmila et al. (1990), in a study of young couples in Finland and Estonia, found that male use of alcohol served to demarcate gender boundaries and gender-specific interests within the family.

The precise ways in which alcohol use interacts with gender factors is likely to vary over time for different groups of men and between different social contexts. There are, for instance, current debates over the extent to which there is 'convergence' between the drinking patterns of young men and young women (see discussion in Newburn and Shiner, 2001). However, gender differences in alcohol use and misuse are likely to reflect the different roles and positions held by men and women in society and current beliefs about 'proper' masculine and feminine behaviour (Neve et al., 1997; O'Donnell and Sharpe, 2000). Effecting changes in drinking behaviour requires understanding of these broader positional and normative influences on behaviour.

From a prevention point of view, in general, young men (like young women) often do not recognise their drinking as 'risky' and consequences (especially long-term health consequences) seem remote. Factors influencing drinking styles and drinking behaviours are likely to differ for early experimental drinking, for intoxication or binge drinking associated with public nuisance and minor offending behaviour, and for more dependent drinking styles. Studies need to examine young men's drinking styles in more detail to develop appropriate prevention approaches.

The available research indicates that prevention strategy needs to:

- Address both alcohol-specific issues and the wider family, and environmental and cultural factors that contribute to both problem drinking and anti-social behaviour/offending/crime
- In the case of young men, particular attention needs to be given to supporting positive alternatives to 'macho'/aggressive/heavy drinking male images and to images which sustain traditional 'patriarchal' views on authority and control relationships
- There is a need to examine how cultural factors and aspects of traditional lifestyles influence male drinking patterns, as well as recognition of harmful drinking patterns and readiness to seek help among different ethnic groups
- Prevention approaches might include:
 - Using young people's own accounts and perceptions of acceptable alcohol and alcohol-related behaviours, and safety strategies
 - Using interactive focus groups, with peer-led discussions to challenge anti-social drinking behaviour
 - Accepting that young people want to discover and make decisions for themselves and finding ways to support this in a positive direction
 - Examining the extent to which social structural factors and social control approaches to youth initiate, exacerbate or sustain problem behaviours including harmful drinking and drug use
- It would be valuable to know more about protective factors and the circumstances under which the effects of risk factors may be reduced.

Illicit drug use and risk

Definitions

In this section we are concerned with controlled drugs – psychoactive substances which are used illegally, such as heroin, cannabis, cocaine, ecstasy etc. (Alcohol is illegal in some countries but will not be discussed here.) The terms ‘drug use’ and ‘drug misuse’ or ‘problem drug use’ are not well defined in the literature.

The Working Party of the Royal College of Psychiatrists and the Royal College of Physicians (2000) provides the following definitions:

- **Drug use:** a neutral term that does not imply either the absence or presence of harm or hazard
- **Drug misuse:** drug use that is harmful or hazardous to the individual or others
- **Problem drug use:** implies that either the pattern of drug taking, or the route of administration, is causing significant physical, psychological or social problems for the user; generally implies greater harm than ‘drug misuse’
- **Dependence:** broadly equivalent to addiction, meaning that the user has adapted physically and/or psychologically to the presence of the drug and would suffer if it were withdrawn abruptly.

While these definitions have guided the writing of this section, it has not always been possible to be consistent as the source literature uses a variety of terms and meanings vary.

Overall prevalence

There is no precise data about the extent of drug use in the UK. However, large-scale population surveys provide the best estimates of drug use in the country.

Recent estimates suggest that there may be as many as 266,000 problem drug users, 202,000 problem opiate users and 161,000 drug injectors in Great Britain. Around a third of adults aged 16-59 in England and Wales have reported having used illicit drugs and solvents at some time in their lives (UK Drug Situation Report, 2000).

Data on drug use by people aged 60 and over is not systematically collected and there is very little research on this group – mainly because drug use is thought to be infrequent and therefore it would not be cost effective to carry out studies.

Estimates of drug use in age groups between 35 and 59 suggest that between 2% and 5% had used drugs in the previous year. In the older age group, 45-59, contrary to the general trend, there is no difference between men and women in levels of drug use (Stimson et al., 1998). Most research has concentrated on the younger age groups – people under 35 years.

Young people

Almost half of young people aged between 16-24 in England and Wales reported having ‘ever’ used drugs and in Northern Ireland around 40% of those between 16-29 have tried drugs (UK Drug Situation, 2000). Studies from Scotland suggest that as many as 60% of young men have tried drugs (Miller and Plant, 1996). A survey of a younger age group, 15-16 year olds in the UK, reported lifetime use of:

- Marijuana (39% males; 32% females)
- Other illicit drugs (13% males; 11% females)
- Inhalants (14% males; 17% females)
- Tranquillisers or sedatives without prescription (6% males; 3% females) (Hibell et al., 2000)

Prevalence and patterns of use among men

There is consistent evidence that men are more likely to be using drugs than women. Overall, men are 1.4 times more likely than women to have taken drugs in the last year or month. However:

- Sex differences in respect to 'lifetime' (ever) use is generally insignificant and is narrowest among the younger boys and girls (Hibell et al., 2000). However, the measure of 'ever used' includes people who have used only once or very infrequently and does not indicate pattern of use where sex differences become more important
- Sex differences widen with increasing age and the gap is widest among those in their mid-to-late 20s (Ramsey et al., 1999). For example, surveys of Glasgow youth, reported in 1996, found marked differences in the level of drug use between men and women aged 16-19; 41% of men reported having taken cannabis compared to only 19% of females (Carey et al., 1996 cited in Barnard, 1999)
- 'Lifetime' drug use is highest among males aged 16-29.

The British Crime Survey, conducted every two years by the Home Office, is designed to be representative of the general public in England and Wales. The sample size is about 10,000. Data from the British Crime Survey illustrate the different rates of drug use between men and women aged 16-59 for England and Wales, 1998 (see Table 5).

Table 5: Drug use by sex, age 16-59 (England and Wales, 1998)

	Ever/lifetime	Last year	Last month
Male	37.6%	13.7%	8.3%
Female	26.7%	7.8%	4.4%
Ratio of male to female	1.4	1.8	2.0

Source: British Crime Survey (Ramsey et al., 1999)

Table 6: Drug use by sex and age group in the last year and last month (England and Wales, 1998)

	Last year	Last month
<u>Age 20-24</u>		
Male	37%	24%
Female	22%	12%
Ratio of male to female	1.7	2.6
<u>Age 25-29</u>		
Males	29%	17%
Female	11%	6%
Ratio of male to female	2.0	2.8

Source: British Crime Survey (Ramsey et al., 1999)

Table 6 shows that men's drug use does not decline with age in the same way that women's drug use tends to decline as they reach their mid to late 20s.

Data on drug users presenting to services in England during the six months ending March 2000 (UK Drug Report, 2000) also indicate a predominance of men – a ratio of 3:1. The largest numbers are aged between 20-29. However, the patterns of drug use (in terms of main drug used) is broadly similar for men and women. The proportion of males and females reporting using heroin was 63% for both sexes and injecting behaviour was also broadly similar. Based on available information, it was noted that 47% of men and 42% of women had injected in the previous four weeks, although men were less likely to have shared their needles and syringes during the same period (19% of men compared to 25% of women). Cannabis was more likely to have been reported as the main drug of misuse by men (12%) compared to women (6%). Data from the Scottish Drug Misuse database are similar: In 1998/9, 69% of all those attending services were men and 57% of them were between the ages of 20-29.

Ethnicity

Research on drug use, particularly from the US, shows a strong association between ethnicity and problem drug use. However, information on ethnicity in the UK is rather

sketchy and published studies are largely of Asian and black groups. There is evidence to suggest that drug use is less common among ethnic minority groups than whites (Ramsey and Spiller, 1997) and one study conducted in four cities estimated that around a third of black respondents had used drugs compared to half of white respondents (Leitner et al., 1993). However, as Patel (2000) argues in the case of South Asian groups (Indian, Pakistani, Bangladeshi), drug use and problem use among minority groups is often overlooked for a variety of reasons including deep-seated stereotypes which perpetuate a range of 'myths' regarding the reasons why some ethnic minority groups have low rates of problem drug use.

Addressing the stereotypes, Patel points out that ethnic minority communities tend to be clustered in some of the most deprived inner-city areas in England. These communities have a high percentage of young people, a high rate of unemployment and poverty and poor access to health and social care facilities. They are also over-represented in the criminal justice system and subject to racism. All of these factors place young people at greater risk of drug use. (This applies mainly to young men, although Patel notes that the situation of young women may be changing.)

Research indicates that different ethnic groups are likely to favour different types of drugs (eg cannabis in African and African-Caribbean communities: Perera et al., 1993; khat among Somali groups: Griffiths et al., 1993; heroin smoking among young Asians: DH, 1999a). However, the picture is constantly changing and use of a variety of substances is reported by ethnic minority groups. For example, a street survey of young Asian and white males in Scotland was conducted to provide some baseline information. Findings indicated that Asian males had, overall, less exposure to drug use than white males but, controlling for exposure, there were few ethnic differences in attitudes and extensive drug use was revealed in this study. Although the use of illegal drugs by Asian males was less frequent than that of similarly aged white males, their use was nevertheless significant. Over 40% of young Asians interviewed had used cannabis, nearly a third had used amphetamines, and a fifth had used ecstasy; 15% had used LSD and one in ten had tried magic mushrooms.

Reviewing the issues and the evidence on drug use in Asian groups, Patel (2000) noted the following:

- Heroin and cannabis are the most commonly used drugs by young Asians (especially Pakistani and Bangladeshi males)
- There appears to be a growing use of recreational drugs, especially centred around bhangra events – originally a daytime Asian rave or disco which has moved to evenings, often involving students
- The use of a range of solvents and crack cocaine has been evident among some community groups
- Injecting is a major issue in places where there are Asian heroin users.

However, as Patel (2000) suggests, comprehensive demographic profiling of communities is lacking. Asian communities (as well as other ethnic communities) are diverse and strategic planning of prevention and intervention approaches needs a good profile of the target community.

Given the paucity of the published literature and the lack of sufficient methodologically rigorous studies, it is difficult to draw conclusions about drug use and ethnicity. Furthermore, there is a danger that inappropriate conclusions may lead to, or reinforce, stereotypes. As in the case of alcohol use, it is likely that gender roles and identities have some part to play in the use of drugs among males and that gender factors may differ between different cultural groups. Again, this is an area which requires a more in-depth examination of the literature (including a considerable amount of 'grey' literature).

School age male users

There is considerable evidence about drug use among young people in the UK. In a study of drug use, smoking and drinking among young teenagers, information was obtained from more than 9,000 children in 340 schools throughout England in the autumn term of 1999 (ONS 1999). The study indicated:

- There was little difference between boys and girls' drug use (aged 11-13) in the percentage who had used drugs in the previous month or in the previous year. (Only 1% of 11 year olds had used drugs in the last year.) However, difference in rates of use become more pronounced at ages 14-15 with slightly more boys using drugs than girls (13% compared to 12%). The researchers suggest that although the difference

was not statistically significant the fact that similar differences between the sexes was also evident in a previous study in 1998 suggests that it may be a real difference

- For those who have used drugs there is little difference between boys and girls in the frequency with which they used the drugs
- There is little differences between boys and girls in the choice of drugs. Most used cannabis; of those who used drugs, 92% of boys and 90% of girls used cannabis. Slightly more boys than girls who used drugs used cocaine (10% compared to 8% of girls). However fewer boys than girls had used glue (18% of boys compared to 25% of girls)
- There is evidence that that the gap between rates of cannabis use become most pronounced in the mid-teens; 45% of boys compared to 33% of girls reported having tried cannabis (see also Currie et al., 1997)
- Ethnic groups were equally represented among boys and girls who used drugs
- Boys were slightly more likely than girls to have used drugs recently
- Boys were much more likely than girls to have paid for their drugs (the last time they used) – 49% of boys compared to just 28% of girls had done so.

Surveys of about 5,000 secondary schoolchildren in England and 3,500 in Scotland and 1,300 in Wales in 1998-9 indicated that boys are slightly more likely to report drug use than girls. For example, a study in Wales, (Waddon and Baker, 1999) suggested significant differences between young males and females. Among males, 17.5% said that they had used illegal drugs, while among females 15% made the same claim. The majority used cannabis or magic mushrooms.

For the individual, drug use entails risks of adverse physical and mental health and of harmful social consequences. There is a vast literature on this but, again, very little in-depth examination or discussion of the relationship between gender and risk. The sections that follow summarise some of the main issues.

Health and social consequences of drug use

Drug use carries risks of morbidity and mortality for men and women and these have been well documented.

Mortality

Risk of early mortality related to drug use may be due to several factors including accidental death, deliberate suicide and overdose, and numerous diseases of which HIV/AIDS and hepatitis are most prominent.

All the UK data sources (ONS, General Register Office Scotland and General Register Office in Northern Ireland for the years 1990-1999) indicate that there is a trend for deaths to be male-dominated. Male deaths in 1998 and 1999 outnumbered female deaths by over two to one. The majority of deaths occurred among 20-24 year olds (UK Drug Report, 2000).

Suicide and deliberate or accidental self-harm

Suicide and deliberate self-harm among drug users in the UK is more common among males than females. Research on suicide trends among notified addicts in the UK over a 25 year period based on a cohort of 69,880 cases found that 82% of a total of 298 recorded suicides were males. The majority of cases were between ages 15-34. Drug overdose accounted for about 45% of all suicides and hanging for 31%. Suicide by hanging was about three times more likely to occur in males than in females (Oyefeso et al., 1999). Deaths associated with volatile substances were also more common among males than females (Taylor et al., 1998). Furthermore, when comparing suicide rates among notified addicts and the rest of the population, the risk of suicide was calculated as four times higher for male addicts and 11 times higher for female addicts aged between 15-54. (However, note that there has been an overall decline in suicide rates among drug addicts over a 25 year period.)

In a study of 724 patients (36% men and 23% women) presenting to a general hospital with deliberate self-harm, 200 were substance abusers (including alcohol and drugs). The drug users were more likely to be living alone

Table 7: Deaths (among 20-24 year olds) in the UK (1998); compiled from UK Drug Report (2000)

Year	England and Wales		Scotland		Northern Ireland	
	Number	M:F ratio	Number	M:F ratio	Number	M:F ratio
1998	2,922	2:0	449	2:1	40	1:0.5
1999	–	–	492	2:3	50	2:3

Source: General Register Office, Scotland; General Register Office in Northern Ireland; Office for National Statistics, London

and to be unemployed and many had received previous treatment for their substance abuse; males were more likely than women to attempt suicide (Hawton et al., 1997). Overdose, on the other hand, may be more common among women drug users. A study of self-reported overdose among 312 current injecting drug users in London found that, although the experience of overdose was common (38%), men were less likely to report overdoses (Powis et al., 1999).

Psychiatric morbidity

Drug users are vulnerable to other psychiatric disorders and frequently display co-morbid psychiatric symptoms. It is not always clear whether the symptoms are a cause or a result of drug use. Overall, however, there is little evidence that male drug users are more likely than women to experience psychiatric morbidity. Several studies have addressed this matter.

For example, in a UK study of 1,075 adults (74% men) of whom 90% were opiate dependent, it was found that one in five reported psychiatric symptoms. Results of psychiatric tests indicated that 16.7% of men and 25.4% of women experienced the highest severity of psychiatric symptoms. These were generally elevated among opiate users who also used benzodiazepines, alcohol and stimulants (Marsden et al., 2000).

However, results from studies elsewhere indicate that the relationship between psychiatric disorder, substance misuse and gender may be more complex and may demand, for instance, closer examination of the association between different types of drugs and different categories of psychiatric condition. For instance, in a study of multiple drug use and depression among 55 African-Americans, depression was found to be significantly higher for men than for women for all types of drug use but highest when the use of cocaine or crack was involved (Wang et al., 1997).

Hepatitis

Both hepatitis B and hepatitis C can be transmitted by needles and recently hepatitis C has been identified as a major public health problem. Hepatitis C is believed to affect a majority of drug injectors. For instance, the prevalence among injectors has been found to be 85% in London, 77% in Glasgow and 59% in East Anglia. Hepatitis B can also be transmitted sexually, posing a risk to non-injecting partners (Royal College of Psychiatrists and Royal College of Physicians, 2000).

Tables 8 and 9 present figures for the incidence of hepatitis C between 1992 and 2000. In England and Wales, incidence of Hepatitis C for both males and females rose by 4.7% over that period. Looking at differences between age groups, hepatitis C is most common in the 15-44 age group and the highest incidence is recorded among those aged 25-44.

Table 10 shows notifications for hepatitis B from 1990 to 1999, again indicating a similar rise for men (51%) and women (52%) over that time. As shown in Table 11, intravenous drug users (IVDU) accounted for 31% of notifications in 2000.

Greater numbers of males compared to females contract hepatitis B and hepatitis C. In 1999, 66% of the 5,745 people notified as having contracted hepatitis C were males and 59% of those with hepatitis B were males (PHLS AIDS and STD Centre – Communicable Disease Surveillance Centre, and Scottish Centre for Infection and Environmental Health, www.phls.co.uk).

HIV/AIDS

In 2000 there were over 3,654 reports of new diagnoses of HIV infection in the UK. Nearly 63% of these were in men and of those around 3% were acquired through injecting drug use (PHLS AIDS and STD Centre – Communicable Disease Surveillance Centre, and Scottish Centre for Infection and Environmental Health, www.phls.co.uk).

Data from the Scottish Drug Misuse Database indicates that at the end of 1998, from a total of 362 injecting drug users with AIDS, 72% were men. Among injecting drug users who had died of AIDS, 211 were men and 78 were women. By the end of 1998, 1,210 injecting drug users were HIV infected and of these, 70% were male.

Studies which examine factors associated with HIV infection and other blood borne infections in drug users demonstrate that multiple, complex factors are involved. However, although greater numbers of men are infected, research provides no clear evidence that heterosexual male drug users are more likely than female users to become HIV positive or contract other infections. There are a number of behaviours which increase the risk of infection and sometimes the risks associated with drug use are indirect and emerge from the lifestyle and behaviour of drug users. It is necessary to consider ways in which gender factors may increase or decrease those risks.

Table 8: Hepatitis C laboratory reports – England and Wales, by sex, 1992-2000*

	1992	1993	1994	1995	1996	1997	1998	1999	2000*
Male	160	297	570	1,206	1,798	2,197	3,016	3,785	3,354
Female	74	129	249	419	690	800	1,327	1,751	1,569
Not known	7	9	20	42	56	61	140	209	185
TOTAL	241	435	829	1,167	2,544	3,058	4,483	5,745	5,108

*Provisional. Source: Laboratory Reports to CDSC. Last Updated: 1 May 2001

Table 9: Hepatitis C laboratory reports – Northern Ireland, by sex, 1994-2000

	1994	1995	1996	1997	1998	1999	2000
Male	21	33	18	13	17	16	29
Female	18	21	8	10	11	5	17
Not known	2	4	3	3	10	2	4
TOTAL	41	58	29	26	38	23	50

Source: Laboratory Reports to CDSC Northern Ireland. Last updated: 9 May 2001

Table 10: Hepatitis B notifications – England and Wales, by sex, 1990-1999

	1990/91	1992	1993	1994	1995	1996	1997	1998	1999
Male	260/280	280	362	322	387	401	444	578	510
Female	175/208	209	219	206	236	212	286	306	339
Unknown	0/0	0	0	0	0	0	0	2	15
TOTAL	435/488	489	581	528	623	613	730	886	864

Source: Laboratory Reports to CDSC Notifications of Infectious Diseases. Last updated: 30 August 2000

Table 11: Acute hepatitis B infections – percentage IVDU. Laboratory reports – England and Wales, by risk group, 1990-2000*

	1995	1996	1997	1998	1999	2000*
IVDU	147	166	192	251	231	193
Total	614	569	652	843	725	619
% IVDU of total	24	29	29.5	30	32	31

*Provisional. Source: Laboratory Reports to CDSC. Notifications of Infectious Diseases

Risk factors

Some main risk factors are noted below.

Sharing injecting equipment

Risks from sharing injecting equipment have received much attention in the literature and, since the link between HIV infection and sharing has become clear, in many countries drug injectors have significantly altered their behaviour and adopted safer injecting practices (Judd et al., 2000). At the same time, the results from studies are inconsistent and injecting drug use accounts for the largest – and growing – proportion of AIDS cases in Europe (Judd et al., 2000). For example, a study conducted in the Netherlands found that participation in needle exchange or methadone programmes and knowledge of risk factors were not significantly related to a reduction in high risk drug behaviour (Franken and Kaplan, 1997). The importance of not sharing needles is still not always taken on board; as Youngson (1995) comments:

'Unfortunately, many heroin addicts give little weight to the risks when their only preoccupation is to get a fix.'

(Youngson, 1995, p156)

UK researchers warn that the current low prevalence of HIV among young drug users should not provide a rationale for any move away from the public health, harm reduction approaches which have helped to achieve a reduction in the risks of HIV (Judd et al., 2000).

Gender and sharing

The evidence on gender as a risk factor for HIV infection among injecting drug users is equivocal. A number of studies in the UK have suggested that women rather than men are more at risk of sharing injecting equipment and so more vulnerable to the risks of infection (discussed in McKeganey, 1998). It is hypothesised that, as drug injection carries a greater stigma for women than for men, women may be more reluctant to reveal their drug use or attend services where clean injecting equipment is made available. Especially, if they are mothers, women may be concerned that disclosure of their drug taking will cast doubts on their mothering capacities. Male drug users, it has been suggested, do not experience similar fears. However, studies from New York show that men and women are equally likely to attend needle and syringe exchange schemes (see discussion in Stimson

et al., 1998). It seems likely that men and women hold different perceptions of the risks of contacting HIV (Jainchill et al., 1999) but this requires further investigation to consider the relevance of gender issues in risk perception and risk behaviour regarding injecting. For example:

- Injecting behaviour occurs within different social contexts
- Availability of injecting equipment and the users' access to equipment are variable
- Users' knowledge and understanding of the risks involved in sharing equipment are crucial factors in risk-taking.

These and other cultural and situational factors are likely to interact with gender but have received little research attention.

Homelessness

Studies of the homeless suggest that they are subject to numerous health risks. Certain street-based lifestyles may pose higher risks than others. One study of cocaine use among African-Americans found that homeless cocaine users reported significantly more unprotected sex and more partners than men who did not use cocaine. The study found that, controlling for other risk factors, men who used cocaine were three to four times more likely to exchange money for drugs and were at high risk of HIV infection (Kalichman et al., 1998).

Drug use and unprotected sex

The link between substance use and unsafe sexual practices is well established in the literature and there has been concern to explain the apparent lack of behavioural change even when the risks are known and understood.

For instance, a study in North Carolina, considered 30 members of each of three groups of young people aged 12-18 years with an overall average age of 14.8 years. One group was made up of those with an acknowledged chemical dependency, one group had psychiatric problems and the third group were controls made up of children of employees at a hospital and matched for age, gender and socio-economic status. The results showed that substance users were more likely to admit to engaging in vaginal intercourse without a condom, anal intercourse without a condom, intercourse with a prostitute and intercourse with a

stranger than either the psychiatric group or the controls. This difference was not due to lack of knowledge and 93% of the substance abusers agreed with the statement 'using a condom during sex can lower the risk of getting AIDS'.

In trying to explain the gap between knowledge and actual behaviour, the researchers suggested that young people often feel a sense of immortality which leads them to engage in impulsive, high risk behaviour. A second possibility is that the lack of impulse control often seen among drug users predisposes to both substance use and risky sexual behaviour. Third, this group may engage in risky behaviour while under the influence of drugs.

However, the link between drug use and unsafe sex is not always sustained in the research. Reviewing the evidence for North America, Simeon et al. (1996) state that some studies have found marijuana to be linked with unsafe sexual practices but that others have not found such a link. They put the reasons for the inconsistency of the findings down to the difference in prevalence of unsafe sexual practices and use of marijuana. The study by Simeon and colleagues, set in Jamaica, found that males who smoked marijuana before sex had twice the risk of contracting STDs than men who did not smoke. The researchers felt this was possibly because marijuana use impaired judgement. However, their research could not confirm this.

Many studies have highlighted the risks of HIV to intravenous drug users who engage in unprotected sex, so compounding risk exposure to the disease.

It has been found that male injectors are more likely to have non-injecting female sexual partners, compared with female injectors, who mostly have injecting partners. Moreover, research indicates that female drug users are likely to share injecting equipment with their male partners (discussed in Stimson et al., 1998). Numerous studies have confirmed these findings. For example, a study of Irish intravenous drug users (Dorman et al., 1997), which examined the behaviour of some 185 IDUs, found that 56% shared injecting equipment and 62% lent their equipment to friends. An examination of their sexual behaviour revealed that women were at somewhat higher risk of HIV infection than men; 50% of men and 63% of women had never used condoms with regular partners. Furthermore, as mentioned above, the majority of male IDUs had non-using partners while the converse was true for female IDUs.

Similarly high figures for sexual risk behaviour were reported in a study by Dolezal (1999). It was found that 95% of the HIV negative men had unprotected sex and furthermore that this was the case with 73% of those who were HIV positive over a four-year study period. On average the HIV negative men had unprotected sex once a week while HIV positive men had unprotected sex two or three times a month. However, over the four years of the study, they also found that both the HIV positive and HIV negative groups reduced the frequency of unprotected sex and increased abstinence and monogamy. It was not clear from the study how much of the unprotected sex by HIV positive men was with HIV negative women and so put the women at risk (Dolezal, 1999).

Dolezal et al. (1999) argue that intervention studies indicate that IDUs do accept safer sex messages but that sexual behaviour appears more resistant to change than behaviour surrounding drug use. However they noted that there were reasons to expect risky sexual behaviour to decrease over time. First, continued information through the media, health education programmes and drug treatment programmes may lead to behavioural change. Second, as time passes individuals will increasingly know someone who is HIV positive or may even have lost a friend or acquaintance to AIDS (77% of the men in their study knew someone who had AIDS or had died of it). Third, the process of assessing sexual behaviour may well raise the awareness of respondents and lead to people reducing risky behaviour.

Conclusion: illicit drug use and gender

As already noted, boys are more likely than girls to continue using drugs into adulthood and some drug use, notably cannabis use among young men, is becoming increasingly widespread in the UK and seen as a normal part of recreation (Parker et al., 1998).

As with the use of alcohol, more attention has been given to risk factors than to examining factors which may protect against drug use or the continuing use of drugs after experimentation. The influence of religion as a protective factor has received some attention. There is evidence that young people who are religious are less likely than others to experiment with drugs. In a study of about 4,000 post-secondary school students in Scotland (of whom around 950 were males), a higher proportion

of students who were not religious used tobacco, marijuana, amphetamines and ecstasy compared to students who were very religious. The authors concluded that, for this sample, having strong religious commitment was associated with less substance use (Engs and Mullen, 1999). However gender differences in the influence of religion and religiosity on drug use have not been noted.

A number of explanations have been offered for the gender difference in adult drug use. It has been suggested, for example, that as with other social behaviours, girls tend to mature earlier than men. The drop off of both 'ever' and 'last year's' drug use is highest for women between their mid- to late-20s reflecting their changing life stage options with perhaps more emphasis on child rearing (Graham and Bowling, 1995; Ramsey and Percy, 1996, cited in Ramsey and Spiller, 1998; British Crime Survey, 1999).

Drawing on learning theory, continued use of drugs has been seen as based on a learning process, during which young people discover how to enjoy the drug (eg see the classic study by Becker, 1973). Learning and use may take place within specific social settings or groups which are likely to influence both drug use and related risk behaviours.

Research in the UK has indicated that young men are most likely to come into contact with drugs on the street or at school and that continuing, harmful use may be linked to structural exclusion or marginalisation from school, the labour market, the family and the 'consumer society' (Collison, 1996). For some young men, use and continuation of drug use may centre on issues of masculinity, transitions into adulthood and carving out a masculine identity in circumstances where achievement and success in a highly competitive consumer society seems unobtainable.

In a study of young male offenders, Collison (1996) notes how street life can provide a degree of trust and security which 'obviates some of the uncertainties and insecurities of being male on the margins of society' and how heroin can act as a source of male (street) cultural capital. Linked with crime, drugs become a crucial part of the irregular economy in poor communities and open participation in the economic infrastructure and the alternative gendered opportunity structure of marginalised communities.

Studies from the US provide similar explanations based on structural disadvantage and exclusion from access to adopting 'traditional' male identities or carrying out

'traditional' male roles (Dunlap, 1995; Bourgois, 1996). In some instances, drug use and criminal involvement become a method of fulfilling traditional male roles and responsibilities as family breadwinner and protector (Dunlap, 1995). In other instances, unable to adapt to changing role expectations and gender opportunities, young men's participation in the drug economy becomes linked to a 'predatory street culture' where 'marginalised men lash out against women and children they can no longer support economically nor control patriarchally' (Bourgois, 1996).

This review has not examined the vulnerability of children in drug using families (including heavy alcohol use), although the literature clearly indicates the importance of family situation and environment as a risk of perpetuating a vicious cycle of harmful drug and alcohol use. The risk is especially acute when linked with social deprivation and exclusion. As Gilman (2000) comments:

'In theory, drug addiction can effect anyone without regard to race, class, gender or age. In practice, drug addiction embraces a disproportionate number of the socially excluded.' (Gilman, 2000, p23)

Gilman points out that there is a tendency to over-react to recreational drug use and under-react to drug misuse or addiction and it is the latter which is 'highly discriminatory' in its link with unemployment, social exclusion and social deprivation. Tomorrow's drug addicts, argues Gilman, will come from the areas of highest social exclusion and it is towards those groups that prevention efforts must be directed.

Between prevention efforts aiming to change wider social structures, attitudes and behaviours and interventions targeted at achieving individual change, Gilman proposes a series of preventive interventions to address the harmful 'micro processes' which the socially excluded experience and which often result in addiction. Through using 'joined up' multi-agency approaches:

'We can engineer micro interventions that act as protective factors against the risk factors.' (Gilman, 2000, p22)

As in the case of tobacco and harmful alcohol use, prevention and intervention efforts need to take into account the role of social structural and cultural factors as much as individual factors on men's illicit drug use.

End note: men, risk behaviour and gender

Men as risk takers

There is clear evidence that, as a group, men are more likely than women to use tobacco, alcohol and illicit drugs. They are at greater risk than women of increased mortality and morbidity related to substance use and of experiencing harms associated with substance use.

The most vulnerable groups: substance use and inequality

The most vulnerable men are in the lower socio-economic groups, where we find a higher prevalence of tobacco and heavy alcohol use (and possibly problematic illicit drug use):

- Nicotine addiction is closely linked to socio-economic disadvantage and is responsible for significant health inequalities. It is highest in semi-skilled and unskilled manual occupations with the difference between manual and non-manual groups widening in recent years. Other measures of relative poverty or deprivation (eg housing tenure, low educational achievement, being divorced or separated) are also independently associated with an increased risk of smoking in adults
- There is some indication that involvement in exclusively male leisure events and in social contexts dominated by men (homeless men on the streets, in prison) increases the risk of alcohol misuse and illicit drug use.

Although there is insufficient evidence to indicate clear regional or area vulnerability, the effects of the wider social environment warrant attention and it is important to consider the extent to which individual lifestyles and opportunities are linked to community factors. In particular, the relationship between substance use and problem use, inequalities in health and the socio-

economic status of geographic localities has not been studied. Speculatively, there may be considerable differences between the experiences of substance use and harmful use, and responses to substance use, and of men living in 'deprived' areas compared to men in better off communities. Most importantly, in better off communities, youthful substance use may be less likely to result in continued or harmful use as adult lifestyles and opportunities open up. In more deprived localities, the development of harmful substance use may contribute to a cycle of social and health inequalities at individual, family and community levels.

It is, therefore, important to examine the relationship between risk behaviour, substance use and gender within a wider framework which recognises the influence of other socio-demographic factors, such as age or ethnicity, as well as cultural differences between groups of men and the influence of social networks and social contexts of use on men's risk-taking behaviour.

Gender and substance use

There is clear evidence of gender differences in responses to risk taking, health, and help seeking for health problems. Male roles and social identities may themselves be 'risk factors' for higher rates of morbidity and mortality among men compared to women. This deserves more attention in preventive approaches and (specifically) in developing responses to substance use and related problems.

Previous sections have outlined some of the ways in which gender identity and gender roles appear to influence men's substance use, their responses to harmful use and their readiness to adopt preventive and help seeking measures.

There are clear links between gender roles and identities, socio-cultural factors and patterns of substance use. Different male images and stereotypes – the traditional ‘macho’ images and the newer ‘laddish’ images – to mention just two examples, are linked to cultural and social factors such as class and ethnicity and are likely to influence patterns of substance use and problem use.

There is sufficient, if patchy, evidence to indicate that links between gender-based images, risk taking and substance use may be especially strong for some groups of men. In particular, men who have ‘lost’ their traditional roles and traditional male routes to achievement, and whose social status and social locations make it difficult to adjust to new roles or take advantage of new opportunities, may be especially at risk of harmful substance use.

Prevention and intervention efforts need to consider the role of social structural and cultural factors as much as individual factors on men’s use of tobacco, alcohol and illicit drugs. Individual beliefs and behaviours are rooted in social contexts, and the effects of control measures (both criminal justice and treatment) may serve to reinforce marginalisation and the adoption of ‘anti-authority’ alternative lifestyles rather than reduce drug use and associated risk behaviours.

The above issues have received little research attention but they are potentially crucial in targeting appropriate prevention and intervention efforts.

In conclusion, alongside efforts to address problem substance use in the population as a whole, attention needs to focus on reaching men – the heaviest consumers.

Implications for policy and practice

- Research on alcohol, tobacco and drug use often produces findings which differentiate by sex. However, this is not the same as looking at the importance of gender as an influence on substance use and on social attitudes and responses to male and female substance users. Examination of gender issues should be built into research programmes and consideration of gender issues should be built into policy formation and implementation strategies.

- Within that, there is a need for research to:
 - Increase understanding of the factors associated with harmful use by the most vulnerable groups, in particular looking at the effects of structural and community deprivation on substance use and continuing problem use
 - Investigate links between cultural factors and harmful substance use by men in different ethnic groups
 - Investigate different images of masculinity and examine their relationship to harmful substance use and to other socio-economic and cultural factors
 - Consider the extent to which prevention and intervention efforts are successful in reaching different groups of men and effective in addressing harmful substance use among the most vulnerable groups in particular
- Research and prevention approaches might focus to a greater extent on investigating protective factors (which may be gender associated) and developing preventive responses designed to strengthen protective factors as well as responses aimed at reducing the risks of problem substance use
- In prevention efforts, attention needs to be given to supporting positive alternatives to ‘macho’ aggressive/heavy drinking male images and to images which sustain traditional ‘patriarchal’ views on authority and control relationships.

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