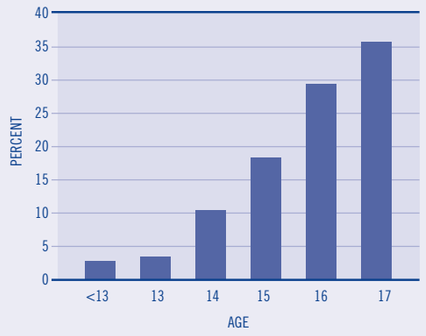
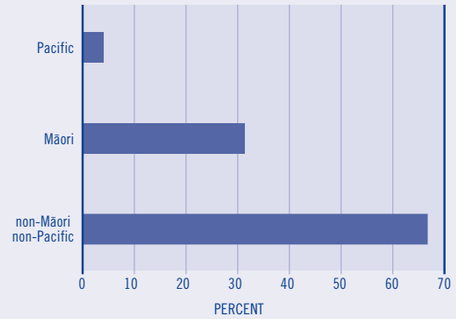
FIGURE 5: YOUTH UNDER 18 YEARS REGISTERING WITH THE QUITLINE BY AGE, JANUARY 2001 – OCTOBER 2004



Source: *Unpublished Quitline data, The Quit Group, 2004*

A higher proportion of young women (58 percent) than young men (42 percent) register with the Quitline, which reflects the pattern for all Quitline callers. Almost one-third of youth registering with the Quitline are Māori (31 percent), with four percent Pacific youth (Figure 6).

FIGURE 6: YOUTH UNDER 18 YEARS REGISTERING WITH THE QUITLINE BY ETHNICITY, JANUARY 2001 – OCTOBER 2004



Source: *The Quit Group, unpublished Quitline data, 2004*

SMOKING CESSATION USING MOBILE PHONE TEXT MESSAGING

A recent New Zealand smoking cessation trial involved 1,705 smokers who wanted to quit, were aged 16 years and over, and owned a mobile phone. The mean age of study participants was 25 years, with 36 percent aged between 16 to 19 years. Twenty-one percent of participants were Māori.

The study randomised participants to an intervention group that received regular, personalised text messages providing smoking cessation advice, support and distraction, or to a control group. All participants received a free month of text messaging as part of the trial. Quit rates at six weeks (not smoking in the past week) were higher in the intervention compared to the control group.[24]

 Code: FS004

The Quit Group
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Quit Me Mutu

Youth & Smoking

Factsheet

Prepared for The Quit Group

February 2005

www.quit.org.nz
Quitline: 0800 778 778

The Quit Group
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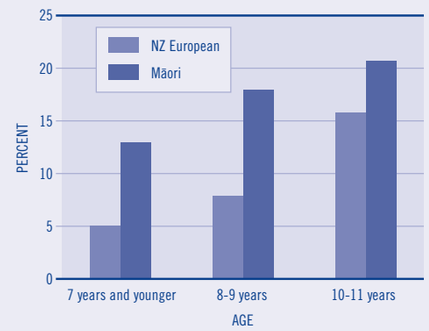
WHO SMOKES?

Adult smokers usually started smoking when they were adolescents.[1] Once smoking is established most smokers will smoke for approximately 40 years.[2] Half of young people who start to smoke and continue to smoke will die from a tobacco-related disease.[3]

Nearly two-thirds of young New Zealanders aged 14 to 17 years have tried smoking cigarettes.[4] This is similar to the proportion of young people who have tried smoking in Australia and in the United States,[5] but considerably higher than in a number of developing countries.[6]

Young people often first try cigarettes at a very early age (Figure 1) with Māori youth tending to start earlier than New Zealand European youth, overall. Children who start smoking at a young age are more likely to become regular smokers.[7]

FIGURE 1: AGE FIRST TRIED A CIGARETTE, 2002

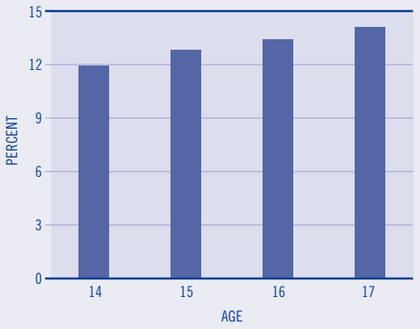


Source: *Darling H et al, 2004.*

In 2002, nearly 13 percent of New Zealanders aged 14 to 17 years smoked cigarettes daily (Figure 2).[4, 8] Between 1999 and 2002, the youth smoking rate decreased for all groups except Māori females and Asian males.[9]

Quit Me Mutu

FIGURE 2: PREVALENCE OF DAILY SMOKING BY AGE, 2002

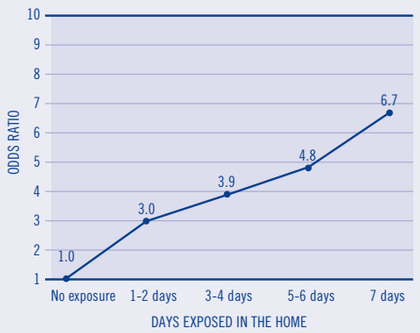


Source: *Darling H et al, 2004.*

There are many, often inter-related risk factors for smoking among young people. These include community level factors such as ease of access to tobacco products, low-priced cigarettes, and the social acceptability of smoking. Personal factors include risk-taking behaviour, and the amount of disposable income available to the young person. Risk factors within the family or home include parental smoking, the availability of tobacco products, household permissiveness that allows smoking, and a lack of clear rules or guidelines that prohibit smoking within the home. Young people who are exposed to secondhand smoke in the home are more likely to be active daily smokers than those who are not exposed (Figure 3).

Figure 3 shows responses to the question *"during the past seven days on how many days have people smoked around you in your own home"*. Young people who were exposed to secondhand smoke for one or two days were three times more likely to be daily smokers (odds ratio = 3.0) than those not exposed. Those exposed on all seven days were nearly seven times (odds ratio = 6.7) more likely to be a daily smoker.

FIGURE 3: ASSOCIATION BETWEEN EXPOSURE TO SECONDHAND SMOKE AT HOME AND DAILY SMOKING AMONG YOUTH, 2002



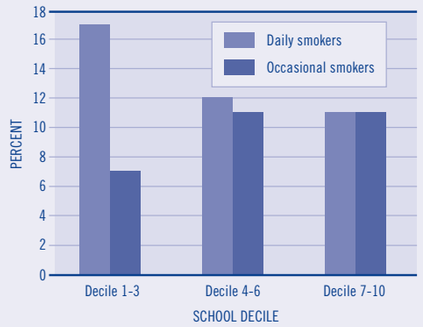
Source: *Darling H & Reeder A, 2003.*

Note: The odds ratio is a way of comparing whether the risk of daily smoking is the same or different between groups, in this example between those exposed to SHS at home and those not exposed.

The influence of friends on smoking behaviour can be either protective (prevent smoking) or risky (promote smoking).[10] The influence of friends appears to diminish with increasing age.[11]

Lower socioeconomic status is associated with increased risk of tobacco smoking.[12] In Figure 4, the proportion of young New Zealanders who smoked daily in 2002 is presented in relation to the socioeconomic decile of the school attended. Although school decile is only a proxy measure of personal socioeconomic status, decile one to three schools are sited in the most disadvantaged communities, whereas decile seven to ten schools are in the most advantaged communities. The percentage of youth smoking daily is highest in the lowest decile schools.

FIGURE 4: SCHOOL DECILE OF YOUNG SMOKERS, 2002



Source: *Darling H et al, 2004.*

HEALTH EFFECTS

Tobacco smoke causes many diseases and can affect nearly every organ in the body, reducing the general health of the smoker, regardless of age.[13] For young smokers, the physical damage that results from smoking begins during adolescence.

Around one third of 18-year-old smokers report adverse health effects from smoking.[14] Young people who smoke have an increased risk of respiratory problems and lower levels of overall fitness.[15] In addition to the immediate health effects of smoking, one of the most serious effects of experimentation with tobacco is the development of nicotine dependence, which, without intervention, results in long-term exposure to the harmful constituents of tobacco products, and increases the risk of premature mortality by up to 50 percent.[13]

WHAT IS NICOTINE DEPENDENCE?

Tobacco contains many chemicals but tobacco dependence is generally attributed to just one of these: nicotine. Nicotine is a psychoactive drug. Psychoactive drugs act on the normal brain mechanisms that regulate consciousness, mood, and thoughts. The behavioural effects associated with smoking tobacco include reduction of anxiety and appetite suppression. Tolerance to the effects of nicotine develops over time, although these effects may differ between smokers.[1]

The human brain continues to develop during adolescence, which may explain why young people are particularly vulnerable to the effects of nicotine. The actual disruption of neurological functioning due to nicotine is more serious for adolescents than for adults. Starting to smoke at an earlier age is associated with an increased risk of developing nicotine dependence. Fifty-six percent of 18-year-old daily smokers in New Zealand met criteria for nicotine dependence.[14] It appears that adolescent nicotine dependence develops rapidly and young people do not have to smoke daily to become dependent.[16]

Youth cessation research has been hindered by the lack of appropriate, clearly defined definitions and reliable measures of youth dependence. Recently, the 'Hooked on Nicotine Checklist' (HONC) has been used widely as a measure of youth dependence.[16] The HONC measures focus specifically on the loss of personal autonomy with respect to control of nicotine intake. United States data suggests that young people develop symptoms of loss of autonomy rapidly and in response to a consumption rate of as little as two cigarettes per week.[16]

PREVENTION

There are two ways to reduce the prevalence of cigarette smoking among young New Zealanders: the first is to prevent initiation and the second is to facilitate cessation. In the area of youth smoking, more is known about preventing smoking uptake than about cessation, although this is still an evolving field of research. The most successful prevention strategies are those that are multi-faceted and appropriately designed for the target group.

Prevention programmes aim to modify risk factors, but since risk factors occur at different levels and in different combinations, variations in intervention are required. Increasing the price of tobacco has been associated with a reduction in youth smoking prevalence in other countries.[17] Restricting access to tobacco products has been shown to decrease smoking prevalence, but only when there is widespread retailer compliance.[18] Young people can, however, develop social sources for cigarettes, and the source of the cigarette may be related to the level of dependence; those experimenting with tobacco are more likely to obtain cigarettes from social sources; those who are dependent and use tobacco regularly are more likely to seek to purchase cigarettes from retail outlets.[18]

School-based educational programmes to prevent tobacco use have had limited success and appear to be dependent upon there being consistency between the health messages and the behaviour of others, such as teachers smoking.[19] Providing a totally smokefree environment at school may be an important initial strategy to help reduce youth smoking prevalence. A significant protective effect has been demonstrated in schools where there are enforced smoking restrictions.[20 21] Schools in New Zealand were required to be totally smokefree 24 hours a day, seven days a week from 1 January 2004.

Home environments that are smokefree and have clear guidelines about smoking have a protective effect against youth smoking. The smoking behaviours of parents are clearly linked to children's daily smoking. A study of the relationship between parental smoking cessation and the smoking behaviour of children, found that the risk of children smoking daily decreased by 25 percent if one parent quit, and by 39 percent if both parents quit, before their children were eight or nine years of age.[22]

CESSATION

The second way to reduce the prevalence of cigarette smoking among youth is to facilitate smoking cessation. Quitting smoking has immediate health benefits; it reduces the risk of diseases caused by smoking and improves general health and wellbeing.[1]

Cessation efforts during adolescence are rarely successful. The presence of a single symptom of dependence increases by almost 30 times the risk of failing an initial cessation attempt.[16] Most young smokers want to quit. In New Zealand, more than 40 percent of young current smokers, 14 to 17 years, want to stop smoking.[4] However, young smokers are often unrealistic about their ability to quit smoking. More than 70 percent of young New Zealand smokers (14 to 17 years) believe that they could quit if they wanted to.[4] This misperception about quitting is a finding that is consistent with studies internationally.[23]

The high prevalence of youth experimentation with cigarette smoking, the ease of developing nicotine dependence, and the adverse health effects, both immediate and long term, provide good reasons for offering appropriately targeted cessation services to young people.

Relatively little is known about what helps young people to quit. To date, research reports indicate limited success, although quit rates for intervention groups are double those of control groups.[15] Reviews of cessation programmes identify three key components for success: the programme must be accessible to youth; it must be developmentally appropriate; and it must be diverse and flexible, because young people are not a homogeneous group.[15]

USE OF CESSATION PROGRAMMES BY YOUTH

QUITLINE

A total of 3,305 youth under 18 years old registered to quit smoking with the Quitline between January 2001 and October 2004. Youth who register with the Quitline receive support and advice over the phone and they are mailed information about quitting. Some may also be eligible for receiving up to eight weeks of subsidised nicotine replacement therapy (patches or gum). This group of young people aged under 18 comprised 1.6 percent of all smokers registering with the Quitline during this time. Figure 5 shows the age distribution of these smokers, with almost two-thirds of them being 16 or 17 years old. Data are currently unavailable on the quit rates of this group using the Quitline.