Tuberculosis in asylum seekers

Asylum seekers entering the United Kingdom through Heathrow Airport have a high prevalence of pulmonary tuberculosis and are more likely to contain drug resistant Mycobacterium tuberculosis isolates than the general UK population.

The issue of asylum seekers is universally controversial, with recent reports in the UK suggesting an inward flow of 2 million people in the next 10 years—a figure rejected by the government as inaccurate and by campaign groups as scaremongering.

All political asylum seekers seen by the Health Control Unit (HCU) at Heathrow Airport between 1995 and 1999 were categorised according to age, sex, smear and culture status, region of origin, and sensitivity of the M tuberculosis isolate.

A total of 55,276 asylum seekers were referred to the Heathrow HCU over the study period, of which 41,470 received a chest radiograph. Of the 441 subjects who had radiographs suggestive of pulmonary tuberculosis, 256 were sent to hospital for immediate assessment. The available records (two patients absconded and two records disappeared) revealed active tuberculosis in 100 patients and inactive or previously treated tuberculosis in 86 patients. The highest incidence of active tuberculosis was found in those arriving from Somalia, who had a incidence of 1047 per 100,000 screened.

Bearing in mind that those most at risk of subsequent infection—other asylum seekers and those in the new entrant community—are already vulnerable, these findings further emphasise the importance of primary screening in newly arrived political asylum seekers. (Thorax 2002;57:152–6)

Eruption disruption

The Soufriere Hills volcano on the Caribbean island of Montserrat has been erupting since 1995 but, despite repeated falls of volcanic ash on the island since then, most of the people who have remained there have not been exposed to sufficiently high concentrations to be at risk of developing silicosis. (Occup Environ Med 2002;59:323–31)

About 4500 of the original population of 12,000 people stayed on Montserrat after the initial burst of volcanic activity, and there were obviously concerns for their health—particularly after preliminary analysis of the ash showed unexpectedly high levels of crystalline silica, classified as a human carcinogen.

The authors undertook a sampling strategy designed to measure the exposure of both the general population and the groups within that population who were at a higher risk of exposure, such as gardeners, cleaners, and the police. They achieved this by using cyclone samplers to measure personal exposure to respirable dust and cristabolite, and direct reading instruments used to measure ambient air concentrations at fixed sites around the island and the concentrations associated with specific tasks.

The results show that the overall exposure of Montserrat islanders to ash from the Soufriere Hills volcano has not been sufficient to put them at risk of developing silicosis. However, a small group of people continue to experience high occupational exposure, giving them a long term risk of developing a mild form of the condition. It is for this reason that the authors recommend ambient air and personal exposure levels continue to be monitored for the foreseeable future.

Massachusetts sets standard

Increasing rates of youth tobacco use in Massachusetts were dramatically reversed after the introduction of a comprehensive tobacco control programme aimed specifically at youth smoking prevention. Tobacco Control 2002;11(suppl II):i14–19.

Researchers used data from the triennial Massachusetts prevalence study (MPS), which collects data on alcohol, tobacco, and other drug use across the state. The 1993 results found that youth smoking rates were increasing at a striking rate, giving rise to concerns that success in reducing adult smoking rates was being threatened by the emergence of a new generation of smokers. Greater emphasis was subsequently placed on reducing youth smoking in the state through activity in three broad categories: the passage and enforcement of youth access provisions in the community, school programmes aimed at increasing awareness of the harmful effects of tobacco, and a major state wide media campaign, including the use of celebrities to drive home the antitobacco message.

After some encouraging early results in 1996, the 1999 MPS survey provided an opportunity to evaluate the effects of an established programme among youth who had received sustained exposure. The results showed a significant decrease in all forms of youth tobacco use, with percentage declines in Massachusetts greater than, and in many cases double than, those achieved nationally.

The current climate of fiscal austerity has led to a reduction of tobacco control programmes in many states, but by demonstrating the effectiveness of this comprehensive community based youth prevention strategy, the authors present compelling evidence for the introduction of similar schemes across the country.

Alcohol misuse and pancreatic cancer

Adding to a number of studies that have tried to address the relation between alcohol intake and risk of pancreatic cancer, a survey of 175,000 Swedish alcoholics found only a small excess risk for pancreatic cancer, that could even be attributed to confounding by smoking. (Gut 2002;51:236–9)

Commonly diagnosed at an advanced stage, pancreatic cancer affects 200,000 people annually worldwide and has a low survival rate. It is estimated that about 10% of cases are attributable to inherited genetic susceptibility and, while there are known risk factors (such as pancreatitis, smoking and type II diabetes), the role of alcohol in the aetiology of the disease remains unclear.

The authors conducted a large population based cohort study on data from the Swedish Inpatient Register, analysing the risk among patients admitted to hospital for alcoholism, alcoholic and non-alcoholic chronic pancreatitis, and alcoholic and non-alcoholic liver cirrhosis. First year observations were excluded and relative risks were expressed as standardised incidence ratios (SIRs) with the general Swedish population as reference.

Alcoholics demonstrated a modest risk for pancreatic cancer (SIR 1.4),
while initial differences between alcoholic and non-alcoholic chronic pancreatitis patients (SIR 2.2 v SIR 8.7) decreased with follow up, indicating that reversed causation from undiagnosed cancers may be responsible for most of the excess risk. The increased risk of pancreatic cancer in alcoholic liver cirrhosis patients was also modest, at 1.9 SIR, and no significant excess risk was found in those with non-alcoholic liver cirrhosis.


**Risk factors for aneurysmal SAM**

Smoking cigarettes, drinking coffee and having high blood pressure are significant independent risk factors for aneurysmal subarachnoid haemorrhage (SAH). (J Neurol Neurosurg Psychiatry 2002;73:185–7)

Aneurysmal SAH has a high morbidity and lethality despite recent advances in treatment and therefore, with an annual incidence of roughly 1 in 10 000 people, accurate prediction of risk factors is essential. This has proved difficult because of possible selection bias in retrospective studies and the rarity of SAH in prospective studies. To bypass these problems, the authors used data from a prospective, single centre, population based health survey in Tromsø, Norway, to identify 26 aneurysmal SAH patients (from a total of 27 161 people). Four age and sex matched controls were picked from the study for each of the patients, and the characteristics compared.

The results showed that the proportion of current smokers was significantly higher in patients (73.1%) than in controls (41.3%), and that mean systolic blood pressure was higher in patients (154.0 (32.5)) than in controls (136.3 (23.3)). High coffee consumption, of more than or equal to five cups a day, was also more common in patients (85% v 59%) and mean systolic blood pressure followed the same pattern (154.0 (32.5) v 136.3 (23.3)). Serum cholesterol concentration, serum high density lipoprotein concentration, and body mass index all had no significant impact. While cigarette smoking and hypertension have previously been suggested as possible risk factors for aneurysmal SAH, the effect of coffee consumption represents a new and interesting observation that requires further investigation.

**Visual acuity in the older British population**

Visual impairment is common in the older British population and gets worse with advancing age, particularly in women. (Br J Ophthalmol 2002;86:795–800)

Although several studies have examined the prevalence of visual impairment and blindness in the population, few have done so for the older segment of society until now. As part of a nationwide trial on the assessment and management of older people in the community, a visual acuity test was conducted in a representative group of 14 600 people aged 75 years and over. Low vision was defined as binocular visual acuity of <6/18–3/60, and blindness as <3/60.

At ages 75–79, 6.2% of the cohort were visually impaired, and 0.6% were blind. These figures rose steadily with each age group, until at age 90+ 36.9% were visually impaired, and 6.9% were blind. After controlling for age, women had a significant excess risk of visual impairment, at an odds ratio of 1.43. The measure of visual impairment used was conservative, and had the American standard been used (binocular visual acuity <6/12) then the age specific prevalence estimates would have increased by 60%.

Little information was previously available on the prevalence of visual impairment in people aged 75 years or over, but thanks to this study—the largest and most representative of visual acuity in the older British population ever—the true scale of the problem is now apparent, and demonstrates the need for prompt attention to the ophthalmic needs of this population group.

**Great iniquities in statin prescription**

Important inequalities exist in the prescription of statins for people with coronary heart disease. Elderly people, smokers, and those who have angina (but have not had a heart attack) are all less likely to receive the cholesterol lowering drug.

Statins operate by reducing the level of serum cholesterol, and their effectiveness in preventing cardiac mortality and non-fatal coronary events has been proved conclusively. Indeed, UK guidelines published in 2000 recommend that statins are prescribed for all those with diagnosed coronary heart disease. Despite this, their use remains well below recommended levels.

The authors analysed data from the 1998 Health Survey for England to examine this association and found that only 20% of subjects with coronary heart disease were receiving lipid lowering treatment (151 of 760). The 1998 British guidelines recommend treating CHD patients with total cholesterol greater than 5 mmol/l, and using this definition of eligibility, still only 25% of eligible subjects were receiving statins. The odds of being prescribed statins significantly decreased with increasing age, no occurrence of myocardial infarction, and current cigarette smoking.

While acknowledging that cost implications may be a large reason why statins remain under-prescribed (in primary healthcare settings at least), the authors are hopeful that enough evidence has now been gathered to convince clinicians that the treatment should be prescribed for the vast majority of—if not all—patients with coronary heart disease, regardless of individual clinical factors. (Heart 2002;88:15–19)