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Prevalence and diagnosis of chronic respiratory symptoms

SIR,—Dr Peter Littlejohns and colleagues have reported a reduced prevalence of disability associated with chronic respiratory symptoms among patients in south west London compared with that in 1961.¹ The extent to which prevalence was reduced was, however, fairly small and in women was probably not significant (2.5% compared with 3% in 1961). The analysis did not take into account non-pulmonary causes of disabling breathlessness, including excess weight and "silent" ischaemic heart disease, so that the true prevalence of respiratory disability cannot be deduced from these findings. In conjunction with the national mortality and morbidity statistics Dr Littlejohns and colleagues interpreted the position as improving, but this may be wishful thinking.

Mortality in patients with chronic bronchitis, emphysema, asthma, and chronic airflow obstruction per 10,000 population aged 55-64, 1973-86

Among women aged 55-64 mortality in diseases associated with airflow limitation has increased over the past few years, and there seems to be an upward trend among men (figure). The position has deteriorated since 1981, when a report of the Royal College of Physicians made recommendations for management of what is mainly a preventable condition.¹ Unfortunately, a high proportion of the patients in greatest need do not receive specialist advice, and their treatment commonly leaves much to be desired.² In addition, Dr Littlejohns and colleagues' study showed a high proportion of undiagnosed cases.

As a profession we are having only limited success in treating this type of patient; we need to do more to bring such patients to treatment and to curb smoking, which remains the principal cause of their disability.

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Non-ionic versus ionic contrast media

SIR,—Minerva,¹ relying on the work of Eyes and Goldman,² asks why any patient undergoing urography should be exposed to the risks of the old method of urography using ionic contrast media.

Eyes and Goldman argue that by using a half dose of non-ionic contrast medium the cost is reduced by a half and the urogram is subjectively acceptable, but their work³ has been criticised⁴ and other authors studying longer series have found no reason to prefer non-ionic media⁵; sodium salts gave a slightly better urogram than non-ionic media.⁶ Non-ionic low osmolar media are supposed to be safer than ionic media but this has yet to be established by clinical trial. Indeed one trial has shown a greater number of delayed reactions to iopamidol than to iothalamate (Conray 320).⁷

Low osmolar media are so expensive (even in half doses) that they have been termed "liquid gold"⁸ and the cost of saving a life given reasonable assumptions is estimated at £500 000 to £1m,⁹ about 10 times the amount the NHS can afford for proved treatments with known effects.¹⁰ The concept of risk factors for predicting reactions to contrast media is seriously flawed as the incidence of important reactions, even in patients with so called risk factors, is extremely low⁷ and the relevance of most of them has not been tested in controlled trials. Nevertheless, up to one half of patients have such risk factors.¹⁰

The answer to Minerva's question is that low osmolar media are very expensive; though they are more comfortable for the patient, it has not been satisfactorily shown that they are safer in clinical use, and a technically better urogram results from using sodium salts of ionic media.

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Guidelines on HIV infection

SIR,—Last year two publications arrived on my doorstep on the same day. The first was a copy of the *BMA Guidelines for Doctors on HIV Infection*. The second was a copy of *New Scientist*, which carried the first report that a gene multiplication technique had identified the HIV genome in the blood of a person who was at risk for the disease 36 months before subsequent seroconversion. The guidelines for doctors were based on the stated assumption that the absence of HIV antibodies three months after an accident to a health worker was a reliable indication that infection had not occurred.

It is particularly unfortunate that Dr Jonathan A Shapiro's article, which aims at encouraging a positive attitude towards AIDS in health workers, should reach me alongside another copy of *New Scientist*, which reports a paper in the *New England Journal of Medicine* confirming that silent infection may persist for an uncertain number of years, certainly for more than four.¹

The BMA booklet is now clearly misleading and should be withdrawn immediately. It seems probable that HIV infection with a small number of virions in an otherwise healthy person usually leads to silent infection. The results of gene multiplication studies in a representative group of health workers are urgently needed.

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**The secretary writes: "Detection of HIV genetic material by DNA amplification (polymerase chain reaction) was first reported at the Stockholm conference in 1988 after the BMA guidelines had been published. The article in the *New England Journal of Medicine* contains several caveats, though, reporting positive results with the polymerase chain reaction in three men at up to 35 months before seroconversion and isolation of HIV in 27 in whom seroconversion was not observed at 28-36 months of follow up. The subjects were at high risk of sexual exposure to HIV, in contrast to direct inoculation of HIV, which seems to be more likely to lead to defined seroconversion events. Whether isolation of HIV or positive results by the polymerase chain reaction in the absence of seroconversion implies infection with an HIV strain capable of in vivo replication and pathogenesis has yet to be proved. The results cannot provide an estimate of the proportion of HIV infections that do not stimulate measurable antibody.

"Absolute certainty is rarely possible in medicine, and there is no unequivocal test for absence of HIV infection. We do not judge it necessary to modify our guidance at present. Health workers are not a high risk group for AIDS, and in the rare cases when accidental inoculation leads to HIV infection