not seen in club scramblers. In this small series the incidence of injuries around the right knee was high, and further work is being done to define injury patterns, mechanisms, and possible preventive measures in scrambling accidents in all ages.

Our purpose is to highlight these injuries to children, which do not appear in official road accident statistics. We have shown that they may be of a substantial nature and warrant further study.

We thank the orthopaedic consultant staff for permission to report on their patients.

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(*Accepted 11 July 1984*)

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Nocturnal deaths among patients with chronic bronchitis and emphysema

Patients with chronic bronchitis and emphysema may develop episodes of severe hypoxaemia with associated ventricular arrhythmias during sleep.[1 2] We examined the possibility that such nocturnal abnormalities predispose such patients to sudden death.

Patients, methods, and results

We studied patients who died in this hospital from chronic bronchitis and emphysema during 1977-81, excluding those with coexisting lung cancer. There were 54 such patients (42 men, 12 women), whose mean (SD) age was 71 (8·7) years. We also examined two control groups matched for age and sex, consisting of 54 patients who died from non-respiratory neoplasms and 54 who died from cerebrovascular disease.

For analysis the day was divided into three periods of eight hours each: 11 pm to 7 am (night), 7 am to 3 pm (day), and 3 pm to 11 pm (evening). In this hospital patients are settled down to bed between 10 30 and 11 pm and woken up around 7 am. Thus the night period approximated to the expected period of sleep.

The table shows that there was no significant difference in the pattern of mortality over time between the two control groups, whereas most of the patients with chronic bronchitis and emphysema died at night ($p < 0·05$, χ^2 test). The highest mortality in these patients was in the first hour of the night (seven deaths). Furthermore, 11 patients died between 4 and 7 am, whereas only two died between 7 and 10 am. Age and sex had no influence on the incidence of nocturnal deaths.

Times of death of patients with chronic bronchitis and emphysema compared with two control groups. Figures are numbers of patients dying

Diagnoses	7 am-3 pm (day)	3 pm-11 pm (evening)	11 pm-7 am (night)
Control groups:			
Non-respiratory neoplasms (n = 54)	19	21	14
Cerebrovascular disease (n = 54)	16	21	17
Bronchitis and emphysema (n = 54)	11	17	26*
Type 1 respiratory failure (n = 17)	3	8	6
Type 2 respiratory failure (n = 24)	6	3	15**

Significance of difference in numbers of deaths from other time periods: *$p < 0·05$; **$p < 0·01$.

Patients with type 2 respiratory failure (hypoxaemia with hypercapnia) showed a highly significant preponderance of nocturnal deaths ($p < 0·01$), whereas there was no such increase in patients with type 1 respiratory failure (hypoxaemia without hypercapnia). Patients in whom the partial pressure of oxygen was maintained above 8 kPa (60 mm Hg) with controlled low flow oxygen treatment showed no increase in nocturnal mortality. More patients who received hypnotics and narcotic analgesics, however, died at night (10 (63%) of 16 patients who received such medication *v* 16 (42%) of 38 who did not), although the difference was not significant.

Comment

Our findings are a logical extension of previous reports of serious hypoxaemia and cardiac arrhythmias in "blue bloater" patients with chronic bronchitis and emphysema but less severe respiratory and cardiac problems in "pink puffer" patients.[1 2] The findings also complement other reports of increased nocturnal mortality in patients with asthma.[3] The lack of increased nocturnal mortality in patients whose nocturnal hypoxaemia was corrected by treatment with low flow oxygen supports previous reports that treatment of such patients with oxygen at night is associated with a reduction in ventricular arrhythmias[1] but not with serious carbon dioxide retention.[2] In addition, treatment with oxygen has been shown to improve long term survival in patients with severe chronic bronchitis and emphysema.[4]

The fact that the greatest number of nocturnal deaths occurred in the first hour of the night supports the notion that many of our patients were asleep at the time of death, as the onset of sleep is normally associated with slight alveolar hypoventilation and carbon dioxide retention,[5] which might prove critical in some patients with severe respiratory failure.

The finding of maximum numbers of nocturnal deaths in patients with type 2 respiratory failure also accords with current concepts of respiratory physiology related to sleep, as respiration during sleep is believed to be critically dependent on the metabolic respiratory control system, which may be defective in patients with chronic hypercapnia.[5]

In conclusion, our findings indicate that patients admitted to hospital with an acute exacerbation of chronic bronchitis and emphysema should be carefully monitored at night, particularly if they have hypercapnia. The findings also emphasise the importance of controlled low flow oxygen in such patients.

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(*Accepted 5 July 1984*)

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Dexamethasone and high dose metoclopramide: efficacy in controlling cisplatin induced nausea and vomiting

Cisplatin is one of the most active chemotherapeutic agents in a wide variety of malignant tumours but is among the most emetogenic drugs used in clinical practice. Improved control of platinum induced vomiting is intrinsically desirable and in addition may give a lead to ways of reducing emesis due to other cytotoxic agents. Several workers[1 2] have shown that metoclopramide in high doses may dramatically reduce cisplatin induced nausea and vomiting and that dexamethasone[3] may offer additional protection. We report the results of the first double blind cross over trial of high dose metoclopramide given with and without dexamethasone as an antiemetic in patients receiving cisplatin.

Patients, methods, and results

Forty five patients had received a total of 133 courses (median 2, range 1-11) cisplatin alone or in combination with other cytotoxic agents for a range of tumours. The dose of cisplatin was either 30 mg/m^2 (73 courses) or 100 mg/m^2 (60). The median age of the patients was 45 (range 30-68).