

Commentary

It is very difficult for readers from outside Hong Kong to appreciate how the 12 major A&E departments here manage to absorb almost two million patients every year; that they can still process them within a relatively short waiting time is a further mystery which requires some explanation. The population of Hong Kong is expanding at around 7% per year, reaching six million during 1994 according to the Government Census and Statistics Department, so innovative strategies to deal with increasing A&E workload are badly needed.

Essentially, A&E practice in Hong Kong follows the British model very closely. Standards of care for patients with serious illness are very good, and in most cases A&E departments are comparatively well equipped, as funding is reasonably adequate. Using computerisation as an example, both Dr Lau's department at United Christian Hospital and our own department have the same dedicated A&E information system with a terminal in nearly every cubicle, which includes a bar code reader for identifying both the doctor and the patient. Records, registration, and labels are all generated by computer. The Hospital Authority encourages audit, and most A&E departments have a quality programme.

The principal and most major difference is the sheer case load. Every day, the average Hong Kong A&E department will receive 500 to 600 patients, 22% of whom arrive by ambulance. The case mix includes 20% of children, and in many respects is similar to any urban department in the United Kingdom. To manage these numbers of patients in an "acceptable" time, relatively large numbers of medical staff are required (table 1). At Prince of Wales Hospital, we have three consultants, seven senior medical officers (equivalent of the United Kingdom senior registrar), and 26 medical officers for a case load of 209 000 patients per year. The official manpower indicator is one doctor per 6000 to 7500 patients, with a senior medical officer counting as 0.5 of a medical officer for service purposes. It would be tempting to compare the medical officers with United Kingdom senior house

officers, but there are some important differences. Doctors in government service in Hong Kong have permanent contracts, even at junior level. This makes for a stable work force, and means that any A&E department will have quite a high proportion of medical officers with one, two, or even three years of A&E experience. The turnover in post at this level is around 20% per year and government terms are reasonable by any standard (a medical officer earns two to three times the salary of a United Kingdom staff grade doctor, and pays only 15% tax). The drawback of this system is a relatively slow career progression beyond the medical officer level to reach SMO status. There is some movement at the consultant level, but with less than 30 consultant posts in the specialty, most of the medical officers cannot hope to reach consultancy. A formal training programme for the specialty has recently been drawn up by the new Hong Kong College of Emergency Medicine and includes, for the first time, structured experience in specialties related to A&E medicine.

Patients' perception of an "acceptable" waiting time is also different from that in the UK. The Hospital Authority has established a patient charter standard of an average waiting time of 30 minutes in A&E departments, irrespective of urgency. Even waiting times of one to two hours cause comment from patients and the triage system constantly needs to be explained to those waiting in line. As mentioned by Drs Lau and Leung, complaints about waiting time are among the most frequent of all.

Anyone who works on the shop floor in a busy A&E department will recognise the truth of the comment that the hardest worker earns the privilege of seeing more patients than his or her peers under the pool system. The concept of the team approach to the handling of individual smaller pools is intriguing, and from the evidence in this paper would appear to actually work in practice. It is certainly worthy of consideration by other hospitals as a strategy to cope with increasing workload while maintaining staff morale.

While a significant proportion of the cases attending UK departments are of a primary care nature, this group reaches 40-70% of the total case load in Hong Kong. These patients are dealt within a number of new ways, including separate "walk in" and "acute care" clinics within the A&E department, where a medical officer sees patients in a general-practice-like setting. Stretcher patients are placed in individual cubicles, and the medical officer travels to them. At the Prince of Wales Hospital, when the need for specialist consultation is identified, the patient is nursed in a separate area of the A&E department, nearer to the admission office. In all other hospitals, A&E doctors have admitting rights, and may make the decision to admit patients irrespective of the need to consult a specialist team. No audit information is

Table 1

Hospital	June 1996 total attendance	Staff strength (full time equivalent)			
		Consultant	Senior medical officer	Medical officer	Nursing staff
Caritas	9 386	1	3	11	27
Kwong Wah	17 608	2	3	15	40
Princess Margaret	11 999	2	6	15	51
Pok Oi	5 422	1	1	5.5	20.5
Prince of Wales*	19 466	2	6	24	57
Pamela Youde	15 806	2	6	15	42
Queen Elizabeth	19 843	2	9	22	72
Queen Mary	12 572	2	7	13	38
Tuen Mun	17 132	2	6	19	56
Tan Sui Kin	9 180	2	3	11	31
United Christian	20 978	2	6	19.5	51
Yan Chai	14 158	2	3	12	39
Total	173 550	22	59	182	524.5

* 1 academic consultant and 1 academic SMO not included in establishment listing.

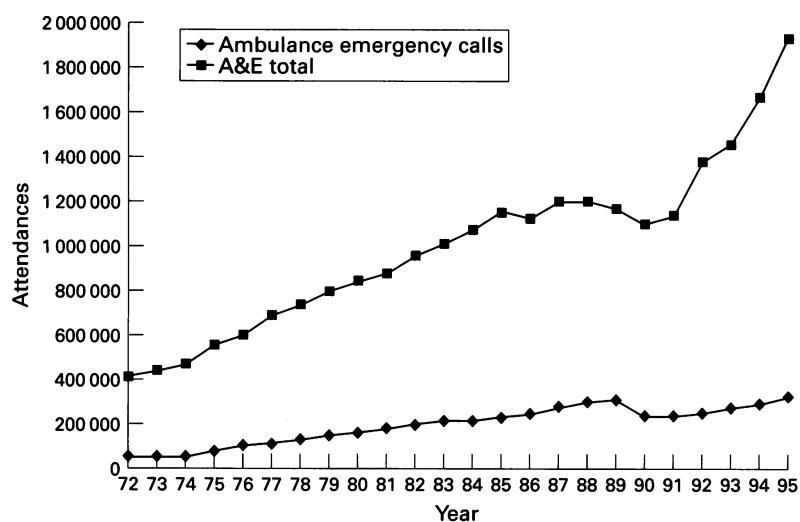


Figure 1 Yearly attendances and emergency ambulance calls in Hong Kong, 1972–1995. (Source: statistics compiled from Hong Kong Government Census and Surveys Department annual report.)

available to assess the quality of this practice. There are some other minor differences in working practices stemming from the high work load. Medical officers are less likely to have time to perform practical procedures, such as fracture manipulation and the extensive suturing, and more of this work is undertaken by the specialist teams than is the case in the UK. Minor suturing and simple plaster application are generally carried out by trained nurses and plaster technicians, as in the United Kingdom.

What about quality of care? I have already commented positively for patients with serious

illnesses, but it has to be admitted that, in common with the United Kingdom, few centres here actually know how well their primary care patients are managed. However, patients develop their own impressions of quality and vote with their feet. The A&E work load has been steadily growing in Hong Kong, with a steeper rise of about 15% in each of the last four years (fig 1). A&E treatment is free (including any drugs prescribed). The alternatives for patients are to see a private general practitioner (expensive) or to queue for a government outpatients department (GOPD) ticket, for which there is a fixed quota for the day and a charge of \$34. Diagnostic backup in these clinics is minimal, and the waiting times may be longer than in the local A&E department. A&E departments therefore pay the price for inadequacies in primary care and also for their own success.

The problems currently facing United Kingdom A&E departments are those of medical staffing, work load and lack of admission beds. In Hong Kong, there are shortages of nursing rather than medical staff, a more pronounced problem of work load, and in many respects the bed shortages are similar. There are certainly lessons to be learned from each other in the results of novel approaches to these issues.

PROFESSOR ROBERT A COCKS
 Accident and Emergency Medicine Academic Unit,
 The Chinese University of Hong Kong,
 Prince of Wales Hospital,
 Shatin, NT, Hong Kong