

HMOs: America Today, Britain Tomorrow?

A doctor's perspective

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"We ask for another clinical assistant," said one doctor, a full time employee for a large HMO, "and they build another health centre."

"They tell us we are too expensive and too slow . . . yes, it can be a problem, we do work under pressure."

"They" were the management and administrative staff, and the warmth in her voice was scarcely guaranteed to take the chill off a winter's morning.

Another young doctor I met, who had worked for an HMO for a year but was now going it alone in an "urgi-clinic" (a clinic that provides a round the clock consultative service), also spoke of the constraints of working in an HMO. In his view HMOs tried to convert their doctors into "plan prototypes," and he had left because he didn't fancy being processed.

Irrespective of whether these views are idiosyncratic or reflect more widely held opinion, it is worth considering some of the reasons why doctors join HMOs and exploring the professional constraints that both doctors above alluded to.

Who joins HMOs?

In my first article I suggested that doctors join HMOs because in areas where these organisations are established they are attracting large numbers of patients to whom the doctors need access if they are to continue to practise profitably. This bald statement does, however, conceal the fact that in the growth phase of the second generation HMOs in the 1970s many doctors joined for more idealistic reasons: a desire to practise cost effective holistic medicine and preventive care, perhaps, or because they were disillusioned by the fee for service sector. But for each enthusiast, a handful of whom got doubly qualified (rightly surmising that a degree in business studies might advance their careers in the HMO in a way that no postgraduate medical degree would do), several probably joined because they lacked the enterprise or perhaps the skill to make good in the fee for service sector. Thus the accusation that on average HMO doctors were less competent than those in the fee for service sector probably had more than a grain of truth in it.

HMOs now recruit from the top ranks, however, as competition among doctors, especially in the more desirable parts of America, intensifies. One middle grade registrar I met, who was supplementing her salary by "moonlighting" in one of the HMO health centres in Boston (going rate 30 dollars an hour), explained how many junior doctors felt. "We all know about the option of working in an HMO and most of us are pretty keen. We know they impose restrictions on their doctors but we also know that because of the widespread pressure to contain costs it is not only HMOs that are forcing doctors to change their style of practice. Third party payers in the fee for service sector are getting much tougher—for example, they won't let you do routine electrocardiography any more. So doctors are cutting corners because they know that the insurance

companies will pass the cost of 'unnecessary investigations' on to the patient, who may not be able to afford it. Either way round doctors face loss of clinical freedom."

She went on to say that in her view HMOs had a lot to offer: doctors could pursue specialist careers and then join an HMO as in house experts. In a large HMO most of the general clinical workload got siphoned off by the internists, and it was possible to acquire a specialist clientele. If patients needed admission they would often go to the local teaching hospital, where, unlike in Britain, the HMO doctor continues to assume full clinical responsibility. Thus a doctor's time could be divided between the hospital and the health centre, and so he could combine academic stimulation with the companionable feeling of working in a relatively small unit.

What sort of doctor do HMOs find attractive?

The quick answer to the question, What sort of doctors do HMOs need? is good clinicians who practise cost effective medicine; nevertheless, precise requirements obviously vary depending on the type of HMO and the area it is serving. Good general physicians and paediatricians are the mainstay of the classic prepaid group practices which employ doctors full time. Specialists are needed, of course, but according to the medical director of the Harvard health plan the problem was finding doctors who would function as good primary care physicians. He was also looking to recruit doctors who would take an interest in the elderly, for this was a major growth area for most HMOs.

Some HMOs approach junior doctors during their residency programmes and recruit appropriate candidates at this stage. These doctors are usually in their late 20s and have pursued a minimum of one year's postgraduate training. They are later taken on probation for one to three years, during which time they are assessed carefully. Provided they measure up they are kept on. "We try to avoid saying that we are employing them," said one personnel officer I talked to, "we talk about them joining us on the staff." HMOs also recruit doctors who are already established in the fee for service sector in solo or group practices. They may come and work full time for an HMO or continue to practice just as before but also see patients that are sent to them by the HMO. HMOs will not necessarily accept all the doctors in an established group of physicians. Once again, they are looking for those who are "good" and "cheap."

In areas where HMOs have a high penetration, such as Minneapolis, most physicians are now seeing a mixture of patients: from HMOs, preferred provider organisations (PPOs), and the fee for service sector. Each of these imposes strict—and different—restrictions on what tests may be carried out, when, and in whom.

Salaries

Three pieces of information I received about doctors' salaries fascinated me. Firstly, doctors tend to get paid according to their rarity value, and, to quote figures I was given in a plan I visited in Minneapolis where the doctors were employed on a full time basis,

paediatricians and family doctors start off at about \$40 000 a year, while obstetricians and orthopaedic surgeons get \$70 000-80 000. The reason for this is that the latter are hard to find because their malpractice insurance rates are so high—annual rates of \$70 000 and more are not unusual—and this frightens off all but the lionhearted from pursuing higher specialist training in these specialties. Those who do become qualified tend to be the sort of doctors who are capable of attracting good custom and hence high salaries in the fee for service sector. Ergo, they won't be attracted to go and work full time for an HMO unless it can make it worth their while.

Secondly, and here I quote a Boston source, HMOs who enrol or who are hoping to attract black and Spanish speaking patients seek to employ doctors of the same ilk (as well as nurses and other



Entrance to one of the Harvard plan's health centres, Boston. The welcome begins at the door.

ancillary staff). Since only about 7% of doctors in America are black (considerably less than the 12% of American blacks in the population) this gives them a rarity value. This in turn may allow them to command higher salaries than a white doctor for doing exactly the same job.

Thirdly, and here I quote a senior member of Kaiser's medical staff, doctors' salaries are dropping as the pool of doctors enlarges and the demand to join HMOs increases. Kaiser employs doctors on a full time basis, and while the current starting salary for an internist is about \$47 000, in 1982 it was about \$52 000.

Prospects

All these salaries are for a 50-55 hour week, the on call rotas are seldom arduous, the hidden benefits often considerable. At Group Health Inc in Minneapolis the plan pays for fees charged by medical societies and the costs of maintaining professional privileges at the local hospitals. They also offer full malpractice and life insurance cover, conference leave, four weeks' paid holiday, dental and medical cover, sick leave, disability allowances, car insurance, financial advice, and, finally, a retirement income.

Prospects for promotion vary from one HMO to another, but in the Harvard plan there are five tiers to climb in terms of status and salary increments. After this there is no promotion unless the doctor goes on to the managerial or administrative side. This is an attractive prospect for some for it offers the opportunity to maintain a variable sized clinical base while climbing a career ladder that may go from head of a specialty in a health centre to associate medical director of the centre, up to medical director of the entire medical group.

Despite these opportunities few doctors seem cut out for the management side and it seems that the age old friction between doctors and managers has not been eliminated. One plan I

visited sent the senior managers and physicians, together with a "facilitator," to some suitably quiet spot for three days three times a year in an attempt to foster goodwill and understanding. But it was apparently still an uphill struggle to get the two sides to work together well.

Working under scrutiny

All HMOs monitor the performance of their doctors as well as looking at the pattern of use of medical services by the patients. "Quality assurance" programmes vary from one plan to another. Group Health Inc in Minneapolis, which has a membership of 215 000, adopts a rigorous form of peer review. Within each department every physician keeps an informal eye on his colleagues and assesses both their approach to investigating and managing patients and the way that they relate to colleagues, nurses, etc.

Other facets of the doctors' work are looked at more objectively—for example, an idea of productivity is obtained from a computer printout that charts how many patients a doctor sees a day. How well a doctor gets on with the patients is assessed by looking at questionnaires completed by patients, all of whom are canvassed from time to time and asked, among other things, if the doctor they saw was understanding/helpful/constructive/rude and so on.

Finally, each doctor has to feed back information about teaching and research activities and participation in postgraduate training programmes. Doctors are scored on all aspects of performance and then placed in ranking order. The department chief tells each one how he has done and then—and here is the crunch point—a salary increase is awarded, or withheld, on the basis of this assessment. Not all HMOs award bonuses in this way, but it is becoming an increasingly common practice.

Medical records

Another way of assessing a doctor's approach to care is to scrutinise records. Most plans adopt set standards for the management of certain conditions—for example, patients with hypertension will be seen at set intervals. If a doctor sees them more or less often he will be taken to task and must justify his action. At Kaiser looking at outpatient records is a monthly activity, and as health centre records are communal it is easy to compare different doctors' notes and assess them for completeness, accuracy, and adherence to the set protocol for managing a particular disorder.

A4 records are widely used, and HMOs use computers extensively. Some have extremely complex record systems, and the Harvard plan claims to have the largest ambulatory medical database in the world. I was fascinated to see the system in action during a visit to one health centre. As soon as a patient "checked in" four pages' worth of computer printout was obtained detailing all aspects of the history and previous care. This was presented to the patient's doctor, who on conclusion of the consultation dictated the current findings and treatment over the telephone to an in house record keeper, who keyed the information into the computer. Once the notes were finished with they were destroyed by throwing them into one of the numerous shredders, innocently masquerading as large waste paper bins. If a patient usually attended one health centre but fell sick in another part of town and went into one of the plan's other centres, data were flashed through from one centre to another.

Not surprisingly, the system was not foolproof; apart from the fact that the shredder got upset if you threw plastic cups in it by mistake, the "keyers in" apparently tended to get behindhand with non-urgent information. This sometimes took seven to 14 days to get recorded and resulted in confusion if a patient was seen with a seemingly non-serious problem one day but collapsed three days later when the details of the previous visit were unretrievable.

Another problem with so many terminals and easy access to such a huge database is confidentiality. Only certain people are supposed to know the key combination to pull records, but it took little imagination to see that it would be easy to take a surreptitious look at the records of someone you were interested in.

Use of resources

Monitoring the use of medical resources is another mandatory activity in HMOs. "Utilisation review" may be done both retrospectively, concurrently, and prospectively and covers all aspects of care. One example of retrospective review is rate of referral for specialist opinions. In Group Health Inc each internist gets a report every three months that indicates how often he refers patients for each specialty compared with the departmental average. Any pattern outside the norm—for example, a doctor who refers every rash to a dermatologist—is then looked into and in this case the doctor concerned may be sent on a dermatology course.

Prospective reviews of elective admissions are carried out regularly, as are concurrent reviews of inpatient management. Again, most HMOs set standards with respect to both criteria for admission to hospital and management once in. Each step is monitored, and a new industry has arisen of firms that have developed advanced computerised data analysis systems that contract with HMOs to analyse their utilisation patterns. The amount of data generated is immense, but it is easy to identify cases where management has been inappropriate, and action is then taken by the medical director. If medical incompetence is detected the HMO may ultimately sack the doctor or demote him so that, for example, a general surgeon may be confined to doing lumpectomies.

Some HMOs employ well qualified nurses whose sole responsibility is to monitor the progress of inpatients and report any irregularity such as a prolonged stay or movement of a patient from an ordinary ward on to an intensive care unit, both of which suggest "excess utilisation." Again, the doctors concerned must justify their action to the higher echelons. Another of this nurse's functions is to start planning the patients' discharge as soon as they get admitted to hospital. If it is expected that home help or special nursing will be required, or transfer to an intermediate care unit, this is organised in advance so that patients do not stay in hospital a moment longer than necessary.

In obstetric care it is now uncommon for women who enrol with HMOs to stay in hospital for more than 48 hours, even for a first baby. What the plans do ensure, however, is that patients get "home care nurses" so that they are not just discharged and abandoned. This would make no sense in obstetric or any other form of care for readmission is likely to be much more expensive than providing domiciliary back up.

Most patients are only too pleased to get out of hospital rapidly, although some elderly and chronically sick patients are apprehensive about the way HMOs strive for ever shorter inpatient stays. And this drive has changed practice, especially surgical practice, within both HMOs and the fee for service sector. One surgeon I talked to in a hospital in Minneapolis said that the ratio of inpatient to outpatient surgery had gone from 4:1 to 1:1 within five years. Procedures such as arthroscopy, dilatation and curettage, laparoscopy, removal of cataracts, cystoscopy, biopsy of breast lumps, extraction of wisdom teeth, and even hernia repairs were routinely being done as day cases. It had not led to a rise in the complication rate, and on balance both patients and doctors preferred it. Again this change had been accompanied by the development of good back up services at home.

Advantages of working in an HMO

Evidently, then, the classic HMOs keep a close watch on their doctors (much closer than is possible in an independent practice association) and some welcome this. It is stimulating to work in an environment where there is continual feedback and where the emphasis is on providing good care as efficiently as possible. Some doctors also like working in manageable sized multidisciplinary units with plenty of opportunity for interaction and "kerb side consultation."

Another advantage of joining an HMO that employs its doctors full time is that it avoids the considerable expense and hassle of finding premises, hiring and firing nurses and ancillary staff, and all the myriad other problems associated with running your own business. Regular hours and a fixed salary are attractive, and plans

are accommodating towards married women, who may work "flexi" hours so that they can meet their domestic commitments. Finally, there is the freedom to counsel and treat patients without continually worrying about how much they should be charged—and whether or not they will be able to afford to pay.

The other side of the coin

Although some doctors welcome their activities being scrutinised closely, others find it trying, especially when their judgment may be questioned not only by colleagues but by non-medical managerial



Advertisement in the BART (San Francisco's equivalent of the London Underground). Commercial reality: doctors in abundance without pedestals, must adapt to market forces.

staff whose prime aim is to contain costs, albeit without compromising quality of care. Then there is the lack of freedom to hire and fire your own nursing and ancillary staff. Many also complain about the rigid rules HMOs lay down: about criteria for admission to hospital, length of stay, frequency of outpatient visits, choice of drugs and investigations, indications to refer for specialist opinions, even down to diktats that say that an internist may take a throat swab but a family doctor may not. Those who break the rules may get penalised financially.

Medicine is not a precise science, and several doctors I spoke to talked of the frustration at being under pressure to treat patients as "averages" rather than individuals. One cardiologist I met, who had a mixture of fee for service and HMO patients, put his standpoint clearly: "Say I see a patient from an HMO with angina who in my judgment needs to come into hospital for observation for 24 hours before we carry out angiography. But HMO policy says angina patients don't need to be admitted the day before and that angiography must be carried out on the day of admission. What do I do? Risk the patient's health by deviating from my normal practice or incur the wrath of the HMO?" In fact it is seldom merely wrath that is incurred, for the normal response from the HMO is to refuse to pay for care that is deemed "unnecessary." The cost may then get pushed on to the patient or the doctor.

Another criticism doctors have of HMOs is that, despite their aura of "maintaining health," few implement comprehensive screening programmes. So although many run stress reducing classes, weight reducing programmes, schemes to help patients stop smoking, and so on, they tend to concentrate their energies on the "worried well" who present to the health centres, leaving the at risk population (who fail to come forward) no better off with an HMO than with any other form of care.

Financial pressures

Some HMOs award bonuses that are inversely proportional to the number of specialist referrals that a doctor makes, and many regard this as undesirable. Limitation of choice may also cause problems, as the cardiologist explained. "I see a patient with complete transposition of the great vessels. In my view, none of the thoracic

surgeons who work for the HMOs have the expertise to handle this. I do, however, know an excellent surgeon to whom I normally refer such cases. If I send the patient to this surgeon the plan won't pay. What do I do? Explain that the plan's surgeon is second rate and persuade the patient to pay to go outside the plan or keep quiet on the basis that you can't expect five star service on a bicycle premium?"

Perhaps, not surprisingly, HMOs find it difficult to draw up guidelines about which patients need referral and to whom. In Britain the NHS has had decades to consider the problem yet by no means has all the answers. For example, there have only recently been complaints about variable referral rates to hospital by general practitioners who seem unaware of the economic implications of their decision.¹ Nevertheless, a system whereby district general hospitals deal with straightforward cases and more complex problems get referred to regional centres that have the necessary skill does seem equitable.

Of course, this presupposes that people accept that their gall bladder won't be taken out by one of Britain's top general surgeons when and where they want, but in recompense they will get surgeons of the top calibre to operate promptly on their child with a congenital heart defect. The steady growth in the private sector in Britain does not suggest that all are satisfied with this approach. How much harder then for HMOs, with few years of experience, to please both their customers and the doctors. For their survival depends on competing with rival health plans on the basis of both quality—and cost.

Conclusion

A decline in clinical freedom may grudgingly be accepted as inevitable—it is evident in all spheres of medical practice in America now—but the lack of flexibility within HMOs is widely criticised. So too is the practice of awarding bonuses to doctors for, to put it crudely, "not doing things."

To suggest that life in an HMO consists of a continual battle with your conscience over whether to follow house rules or the dictates of clinical judgment is putting it a bit strongly—doctors in the fee for service sector are also under considerable pressure to contain costs and the quality of their work is not monitored. Nevertheless, the anti-HMO camp, which has a strong representation among senior medical staff, is extremely concerned that as competition between HMOs accelerates and more become "for profit," quality of care is, or will be, compromised.

Studies that have been done, albeit many are not that recent, do not back this view—indeed, most have suggested that care in HMOs is superior.² So, although anecdotal information abounds, the hard evidence is not there . . . yet.

References

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- 2 Cunningham FC, Williamson JW. How does the quality of health care in HMOs compare to that in other settings? *Group Health Journal* 1980 Winter.

Lesson of the Week

Alcoholic ketoacidosis: an underdiagnosed condition?

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The syndrome of alcoholic ketoacidosis has not been reported in Britain, whereas in the United States it has been estimated to occur once for every four cases of diabetic ketoacidosis.¹ We describe two patients with alcoholic ketoacidosis who presented to this unit within one month and discuss the pathogenesis and features of the condition.

Case 1

A 41 year old known alcoholic man presented to the casualty department after collapsing in the street. He had been drinking two bottles of whisky daily for three months and for 10 days had eaten little and suffered increasingly severe nausea and vomiting. He had longstanding asthma treated with salbutamol inhaler and prednisolone 10 mg daily. He was confused, icteric, and tachypnoeic with a ketotic odour to his breath. Pulse

Alcoholic ketoacidosis must be considered in the differential diagnosis of any alcoholic patient with acidosis, irrespective of the blood glucose concentration

was 100 beats/min, blood pressure 90/40 mm Hg supine, and he had peripheral circulatory collapse. There was widespread expiratory wheeze and the peak expiratory flow rate was 160 l/min after inhaled salbutamol. He had mild epigastric tenderness and a smoothly enlarged non-tender liver.

Investigations (see table) showed a moderately severe metabolic acidosis with compensatory respiratory alkalosis. Serum glucose concentration was 3.5 mmol/l (63 mg/100 ml; normal fasting range \leq 5.0 mmol/l (90 mg/100 ml)), serum ethanol concentration 8.5 mmol/l (39 mg/100 ml), and serum methanol undetectable. Semiquantitative measurement of blood ketone values using Acetest tablets showed a weakly positive reaction, but the plasma creatinine concentration could not be measured because of assay interference suggesting high values of ketone bodies²; plasma β -hydroxybutyrate concentration was in fact grossly raised and plasma acetoacetate concentration moderately so. Evaluation of liver function showed aspartate transaminase activity 300 IU/l (normal < 37), γ glutamyltransferase activity 1750 IU/l (normal < 60), and a large, poorly functioning liver on technetium-99m liver scan. IgG antinuclear antibodies were present in a dilution of 1/160 but hepatitis B surface antibodies were absent and α fetoprotein, α ₁ antitrypsin, and iron values were within normal limits.

The patient was treated with intravenous dextrose and saline, parenteral vitamins, and an increased dose of steroid and by the next day his metabolic

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