For Debate . . .

The doctor, the patient, and their contract

III Alternative contracts: are they viable?

ALAN MAYNARD, MARSHALL MARINKER, DENIS PEREIRA GRAY

When change is proposed there are always alternative courses of action and any choice between these alternatives needs to take account of their relative advantages and disadvantages. In our first paper (17 May, p 1313) we examined the reasons for changing from the status quo. Here we examine five further options. The first is to return to a form of remuneration for general practitioners that is determined solely by capitation payments. The second is to rely on payments per items of service. The third is to choose a salaried service. The fourth is to rely on private practice, allowing market forces to determine both quality and rewards. The fifth is to move to a form of national health service that is funded, as it is now, out of taxation but combining entrepreneurial and competitive elements with the profession controlling the standards. We conclude that the development of a good practice allowance, along the lines described in our previous paper (24 May, p 1374), represents the best choice at this time for the public, the government, and the profession.

Capitation

Roughly 45% of the income of general practitioners is derived from capitation. In the government's discussion document *Primary Health Care* the possibility is raised of increasing the proportion, not only in recognition of the link between workload and list size but also to motivate doctors to practise in a way that would encourage patients to join their list.[1]

At the beginning of the National Health Service the income of practitioners was almost entirely derived from capitation, and this system persisted until the reforms of the mid-1960s. The major theoretical advantage of a pure capitation system of payment is that the doctor becomes much more consumer oriented. The level of his income is directly linked to the number of patients whom he can attract. This should strongly motivate him to provide good premises, courteous staff, rapid accessibility, and informative practice brochures.

There are, however, several theoretical disadvantages to an unbridled capitation system. There is no direct means of using the system to pursue public policy in health care. The consumer's standards may be met, but professional standards of health care may be ignored. The system might encourage some practitioners to curtail consultation time by issuing prescriptions, certificates, or referrals to hospital for further investigation, all of which may be welcomed by patients but could be wasteful of time, resources, and money. Worse still, such behaviour might positively harm the health of patients.

In fact this system was abandoned in the mid-1960s, when the reforms in the "GP's Charter" enabled government to use new monies in the form of allowances and reimbursements to pursue public policy for better premises and the employment of practice staff. The return to a pure capitation system now seems a retrograde step.

Fee per item of service

If medicine is a commodity it might seem logical to pay doctors for each of the services that they provide. Within a national health service the components of care could be categorised and fees negotiated for each. Perhaps the major advantage of such a system is that rewards are highly work sensitive. But the disadvantages are legion.

Items of service are relatively easy to measure in terms of quantity but much more difficult to assess in terms of quality. A consultation lasting 20 minutes may be more valuable than a series of much shorter encounters. Indeed, there may be a conflict between quantity and quality. Payment by item of service places a cash value on almost every clinical decision. The whole thrust of thinking in modern general practice is towards economy of medical intervention: the health of the patient is best enhanced by an economy of investigation and medication and a restraint from the medicalisation of social and personal problems. Payment by item is also more likely to encourage rather than discourage patient dependence. With item of service payment the pressure on doctors to perform to earn money could create serious ethical difficulties in every clinical encounter.

From the point of view of public expenditure it would be almost impossible to control such a system. Poorly motivated doctors might work long hours and generate a large number of items of service, with little benefit to their patients. For those doctors who deem it important to follow up their patients at subsequent consultations, there might be unpleasant crises of conscience about motivation. In our present system items of service are paid only for preventive measures determined by public policy, and we would envisage that this would continue in any future contract.

Salary

There are both benefits and costs in moving to a salary system. The benefits are not inconsiderable. A salary system could make it much easier to plan health care. For example, the services of general practice could be fully integrated with other community services and with the hospital service. Both at national level and at district level it would be possible to determine the goals of primary health care and to monitor performance. Performance would be rewarded by promotion to higher grades or by higher income, or both. Furthermore, promotion and the use of supplementary payments could be used as inducements to achieve an equitable geographical distribution of general practitioners. Doctors would embark not only on a professional life in practice but on a career graded by status and income.

The potential disadvantages for payment by salary are impressive. There

University of York
ALAN MAYNARD, BA, BPHIL, professor of health economics

The MSD Foundation, London WC1H 9LG
MARSHALL MARINKER, MD, FRCGP, director

Department of General Practice, Postgraduate Medical School, University of Exeter
DENIS PEREIRA GRAY, OBE, FRCGP, general practitioner and senior lecturer in charge

Correspondence to: Dr Marinker.

would be no incentive to compete for patients. No form of contract would be less sensitive to the consumer than a contract based on salary. Although it could be said that the salaried doctor would have his performance measured in relation to professionally negotiated health care goals, in effect the general practitioner in such a bureaucratic structure would be answerable to his professional superiors. It is possible that his performance would therefore be geared to pleasing them rather than to fulfilling the health care needs of patients. There would also be no incentive to provide an economical service. The profession might demand more and more resources to fulfil norms generated by the profession. Although such a system might appear to be "cost contained," in effect it would be open ended and very expensive. If doctors were to progress through a scale of promotions it would be almost impossible for them to remain in the same locality. This could change the traditional pattern of continuity of care. There is a danger that, like nurses and social workers, general practitioners may find themselves promoted away from patient care. Lastly, there would be the problem of motivation for those practitioners who reached the top of the promotion ladder. One of the possible consequences of a fully salaried service in general practice would be the appearance of a flourishing private practice, and there is evidence of this from Eastern European countries.

On balance, the attributes of a salaried system of remuneration, like those of a system of capitation or fee per item of service, are unlikely to remedy the defects of the existing system of payment without imposing new and profound disadvantages.

The competitive market

A variety of market alternatives have been suggested as solutions to the inefficiencies inherent in general practice in the NHS. We begin with an extreme libertarian view, which would abolish the state system of health care and the "protection" of the medical profession that goes with it.

A market is a network of buyers and sellers, and those who advocate the extension of the competitive market into general practice in particular and the NHS in general see it as a radical means by which the power of providers to determine the cost, quality, and quantity of care will be redirected to meet patient demands more closely. The advocates of the competitive market inherently support the view of Adam Smith who 210 years ago argued: "The pretence that corporations are necessary for the better government of the trade is without any foundation. The real and effectual discipline which is exercised over a workman, is not that of his corporation, but that of his customers. It is the fear of losing their employment which restrains his frauds and corrects his negligence."[2]

To ensure that workmen (or for that matter members of a profession) become concerned with their customers' interests the advocates of the competitive market propose the abolition of professional licensure. Taken to its logical conclusion this would mean the end of professional control over entry into the medical profession, and so its influence over the quantity, quality, and price of practitioners.

Friedman argued that the market "permits the customers and not the producers to decide what will service the customers best."[3] More recently, Green argued that there should be no state medical service in which jobs are reserved for practitioners licenced by the state and that the General Medical Council should be subject to the laws on restrictive practices.[4] This was roughly the state of affairs in British medicine before the 1858 Medical Act. We simply rehearse these aspects of pure market economics in relation to medicine as a background for looking at the competitive market place.

In this competitive market place patient access to care would be determined by the individual's willingness and ability to pay; profit motivates the suppliers; and the price mechanism clears the market—that is, if general practice is profitable more doctors will enter it, and if profits are low entry will be low. Patients will judge this system by its capacity to supply the care they demand, when, where, and how they want it. Producers will judge the markets' success by its capacity to remunerate them.

This market oriented view of the world bears little relation to the real world in which doctors act as the patient's agent in demanding care and insurance mechanisms remove the incentives for providers or consumers to economise. Furthermore, the advocates of privatising the NHS appear to pay little attention to equity issues which were and are the major rationale of the Health Service.

As in all other markets, capitalists become the enemies of capitalism. By this we mean that general practitioners would be likely to use their market power to stabilise and maximise their income and employment. Such behaviour, although it might benefit the members of the profession, would be unlikely to lead to greater efficiency or patient satisfaction. Thus if adopted the radical market alternative would either fail because of the inherent weaknesses of the private health care sector which now barely exists or fail because it would need major regulation by the state to sustain the competition.

Health maintenance organisations

Rather than abolish the NHS and use market mechanisms to determine the pay and conditions of the medical profession, Enthoven believes that it is possible to retain the objectives of the NHS and develop competitive mechanisms within a state financed system of health care.[5] In this situation the goal of policy is to provide health care so that benefits are maximised and access is determined, not by willingness and ability to pay, as in the market place, but by the individual's ability to benefit from care.

One way in which competition might be injected in a vigorous way into the NHS would be to give general practitioners professional (and therefore financial) control over both the primary and secondary health care system.[6] Individuals or families would choose their general practitioner and, in exchange for a contractual obligation to provide primary and secondary health care for one year, the general practitioner would receive a capitation or enrolment payment.

This would turn general practice into a health maintenance organisation (HMO), of which there is much experience in the United States. The practice income would be determined by the ability of its manager to attract patients. In exchange for the patient's contribution the practice, as HMO, would provide primary and hospital care, bought in from both public and private providers, whichever was the most effective and efficient. Because the income is determined by the ability to attract the patient's contribution, and the expenditure by the activities or care provided, the practice exerts considerable influence over income and expenditure. Any profit is owned by the practice, which, as a consequence, has an incentive to economise. Excessive economy that may affect the quality of care will cause patients to go elsewhere. This self regulating mechanism is reinforced if, as in the USA, members of HMOs renew contracts annually.

In the USA comparative studies suggest that HMOs can provide health care of a comparable quality with other providers but with substantial financial savings.[7] Because our NHS has fewer resources than the providers of medical care in the USA it is unlikely that HMOs here will produce the same magnitude of dramatic savings. But, as in the USA, there would be considerable motivation to substitute nurse practitioners and medical assistants for "expensive" doctors. In HMO ambulatory care in the USA there was a reduction in the employment of doctors of between 25% and 50% compared with federal forecasts of medical employment.

The benefits of such a system are that it is likely to be equitable, economical, sensitive to consumer needs, and meet professionally negotiated goals for health care. There are several inherent problems in switching to such a system. The skill necessary to manage such an organisation—for example, negotiating short term contracts for secondary care in public and private sectors—might result in the controls of the practice being placed in the hands of professional administrators. Few general practitioners are likely to have either the time or the inclination to take over such major managerial tasks. This might result in managerial leadership in general practice moving from doctors to administrators, with the possibility that the service might now become driven by pure financial and public relations values rather than by the human values inherent in the traditions of medical practice.

There would also be the danger in some areas that HMOs might create local monopolies, thereby reducing consumer choice and, in consequence, increasing the possibility of inefficiency. HMOs might seek to merge, thereby creating larger monopolies with greater economic power for the providers. Hospital consultants might also have problems in reverting to their pre-1948 status, as clients of general practice.

Provided the dangers of local monopolies could be guarded against, such a system would produce strong incentives for economy not only in the primary care sector but also in the secondary care sector, where NHS hospitals and private hospitals would compete to acquire contracts with general practice HMOs. Inevitably, such competition and striving for economy would introduce uncertainty into the lives of doctors—their income and employment could be threatened by competitors. The present system of remuneration is highly protective of doctors, and this can lead to complacency and poor motivation to improve. Too much uncertainty, however, generated by fierce competition and the need to produce a highly economical service, might have unforeseen damaging consquences. We could irreparably compromise long term continuity of care and doctor-patient relationships, which remain key concepts in contemporary general practice in the UK.

A more limited experiment, confined to providing primary health care services, but based on entrepreneurial competition within the NHS, was suggested by Marinker.[8] He envisaged that groups of professionals would combine to bid competitively for contracts with family practitioner committees to provide an extended range of primary health care services. Payment would be by capitation, the contract would be for a fixed term, and both the level of the capitation and the renewal of the contract would be dependent on satisfactory performance. Furthermore, doctors, nurses, administrators, and others might all become profit sharing partners in the enterprise, so giving each member of the team material as well as professional motives to achieve agreed health care goals. Five suggestions in the government's

document (the argument for more sensitivity to local need and diversity in primary health care; the provision of fixed term contracts in inner cities; the good practice allowance; the need to experiment with alternative arrangements; and the possibility of developing health care "shops"[1]) are all consonant with this model. The possible advantages and disadvantages are similar to those described above.

What option?

All the options that we have described have appreciable costs and potential benefits. It seems unlikely that there will be major reforms which move the remuneration of general practitioners in the direction of pure capitation, fee for item of service, or salary. None of these systems seems capable of meeting the many objectives of the best of contemporary NHS general practice. The radical libertarian market option would be difficult to implement and sustain. In the long run the essence of the market approach, grafted onto the Health Service, could generate rising standards of health care and incentives for economy and achieve the distributive goals of the NHS. The opportunity exists to reform the present contract by adopting some variant of our own interpretation of the government's desire for a good practice allowance.

It is not impossible that a system similar to HMOs may become the pattern for a future national health service. Implementing a good practice allowance now would give us invaluable experience in setting standards for primary health care, monitoring performance, and reviewing and maintaining progress. If this does not happen it is likely that some stronger and more radical medicine will be administered to the system of general practice in the UK.

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This is the last of three articles.

Research from the South

Prevalence of hepatitis B virus infection among black children in Soweto

A M DIBISCEGLIE, M C KEW, G M DUSHEIKO, E L BERGER, E SONG, A C PATERSON, H J HODKINSON

Abstract

Roughly 15% of black children in rural areas of southern Africa are carriers of the hepatitis B virus. The purpose of the present study was to determine the prevalence of chronic hepatitis B virus infection among urban black children born and growing up in Soweto. A total of 2364 children were studied, ranging in age from 3 to 19 years, and of these, 1319 (56%) were girls. The children were drawn from the highest and the lowest socioeconomic classes. Serum samples were tested for all hepatitis B virus markers as well as IgG antibody against hepatitis A virus. HBsAg was detected in 23 (0·97%) of the children, anti-HBc and anti-HBs together in 155 (6·6%), anti-HBc alone in 17 (0·7%), and anti-HBs alone in 72 (3%). Of the 2364 children, 2097 (88·5%) were negative for all hepatitis B virus markers. IgG antibody to hepatitis A virus was present in 175 (97%) of a sample of 179 children. There was no difference in prevalence of hepatitis B virus markers between children from the upper and lower socioeconomic classes. HBsAg was more common in boys (16 out of 1043 (1·5%)) than girls (seven out of 1321 (0·57%)), and the prevalence of all hepatitis B virus markers increased with age. The youngest carrier of hepatitis B virus was 7 years old.

The remarkable difference in the hepatitis B virus carrier rate between urban and rural black children offers a unique opportunity to investigate the favourable influences operating in an urban environment to limit the prevalence of hepatitis B virus infection.

Department of Medicine, Witwatersrand University Medical School, Johannesburg, South Africa
A M DIBISCEGLIE, MB, FCPSA, physician
M C KEW, MD, FRCP, professor and senior physician
G M DUSHEIKO, MB, FCPSA, senior physician
E L BERGER, BSC, technologist
E SONG, MB, FCPSA, senior physician
H J HODKINSON, MB, FCPSA, senior physician

South African Institute for Medical Research, Johannesburg, South Africa
A C PATERSON, MB, PHD, pathologist

Correspondence to: Professor Kew.

Introduction

Around 15% of black children from rural areas in southern Africa are chronically infected with the hepatitis B virus.[1,2] The infection is almost always acquired in early childhood, predominantly as a result of horizontal transmission,[1] and carriers are predisposed to develop chronic hepatitis, cirrhosis, and hepatocellular carcinoma.[3] Epidemiological, serological, and molecular biological evidence suggests that hepatitis B virus infection acquired in early childhood