

# Shared care: a qualitative study of GPs' and hospital doctors' views on prescribing specialist medicines

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## SUMMARY

**Background:** Shared care schemes have mainly centred on chronic diseases, such as asthma and diabetes. However, with increasing government emphasis on primary and secondary care integration and the effects of budget restraints, general practitioners (GPs) have been asked to take on the prescribing of specialist medicines.

**Aim:** To elicit the views and experiences of GPs and hospital doctors about existing arrangements for shared care applied to the prescribing of specialist medicines. To identify a set of quality indicators for prescribing specialist medicines at the interface between primary and secondary care.

**Design of study:** A qualitative study based on semi-structured interviews.

**Setting:** Forty-eight GPs and 13 hospital doctors in the former South Thames region.

**Method:** The interviews focused on how far experiences with shared care compare with the arrangements currently in place for prescribing specialist medicines and identified the barriers to facilitators of effective shared care.

**Results:** A number of key themes were identified and these formed the basis for eight quality indicators relating to the prescribing of specialist medicines where treatment is shared between primary and secondary care. The themes centred around issues of clinical responsibility, 'cost-shifting', availability of medicines, GP satisfaction, and the nature of the prescribing relationship.

**Conclusion:** Overall, GPs appeared dissatisfied with arrangements for prescribing specialist medicines, while hospital doctors were generally satisfied. The quality indicators will form the basis of a more extensive quantitative survey of GPs' perceptions of the arrangements for prescribing specialist medicines.

**Keywords:** prescribing; qualitative study; shared care; specialist medicines.

## Introduction

SINCE 1991 the government has placed an increasing emphasis on the integration of primary and secondary care<sup>1</sup> to bring benefits in terms of seamless patient care, better collaboration between health professionals, and an effective balance between community and hospital-based care. Shared care for chronic diseases is seen as one way of achieving these objectives. Hickman, Drummond, and Grimshaw<sup>2</sup> define shared care as 'the joint participation of hospital consultants and general practitioners (GPs) in the planned delivery of care for patients with a chronic condition, informed by an enhanced information exchange over and above routine discharge and referral letters'. Antenatal care<sup>3</sup> has been long established as a model of shared care although the circumstances surrounding this are very different to long-term management of patients with chronic diseases. Shared care schemes published in the literature mainly centre on diabetes<sup>4-6</sup> and asthma.<sup>7</sup> Research showed these schemes were as clinically effective as conventional GP or hospital care<sup>6</sup> and that patients responded positively to this initiative.<sup>8,9</sup>

The government emphasis on integrating primary and secondary care and the effects of budget constraints within both sectors have resulted in GPs being asked to take on the prescribing of specialist medicines. Over the past few years several new specialist medicines have become available for the treatment of certain chronic conditions. The term 'specialist medicines' is taken from EL(95)5 and is used throughout this paper to denote medicines, usually of high cost, that are initiated only by a hospital doctor and require complex prescribing and/or therapeutic monitoring arrangements not normally undertaken in general practice.

A major study<sup>10</sup> has shown that the outpatient dispensing policies adopted by many hospitals have resulted in GPs being asked to prescribe specialist medicines and be involved in the 'shared care' of patients requiring these medicines. The study found that many GPs felt unable to assume clinical responsibility for prescribing such medicines that are outside their therapeutic experience and reported high levels of uncertainty towards repeat prescribing following patient discharge from hospital.

For shared care to operate effectively across the primary and secondary care interface, the arrangements need to be appropriate for delivery of patient care. The evidence from asthma and diabetes is that the concept of shared care is workable for large common disease groups but limited information is available on arrangements for specialist medicines. There is need for a better understanding of GP perceptions of arrangements for the prescribing of specialist

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**HOW THIS FITS IN***What do we know?*

Owing to the emphasis on integration of primary and secondary care, GPs are being asked to take on the prescribing of specialist medicines and to become involved in the 'shared care' of patients requiring these medicines. Many GPs feel unable to assume clinical responsibility for prescribing such medicines that are outside their therapeutic experience and report high levels of uncertainty towards repeat prescribing following patient discharge from hospital.

*What does this paper add?*

This study has suggested a number of 'quality indicators' that might relate to the arrangements for the prescribing of specialist medicines between primary and secondary care. These indicators, though tentative, have the merit of being derived from discussions with practising GPs with experience of shared care arrangements. As such, they may provide a useful baseline for further research.



medicines where care is shared between primary and secondary sectors. However, research first needs to identify themes or 'quality indicators' to evaluate the efficacy of the existing shared care arrangements. This study describes the generation of themes arising from semi-structured interviews with a sample of GPs and hospital doctors. It examines their perceptions of the shared care arrangements they were involved in and uses these as a basis for the design of a set of quality indicators relating to arrangements.

**Method***Overview*

A qualitative survey involving face-to-face in-depth interviews was used to examine the views, attitudes, and opinions of GPs and hospital doctors involved in prescribing specialist medicines at the primary-secondary care interface. Interviews were transcribed in full and analysed by selecting and organising the material according to themes that informed the design of a set of quality indicators for prescribing specialist medicines at the interface between primary and secondary healthcare.

*Participants*

A sample of GPs and hospital doctors was recruited across the former South-East Thames Region Health Authority (SETRHA). The systematic sample comprised fundholding and non-fundholding GPs involved in prescribing medicines that clearly would be initiated by a hospital doctor and thus could be assumed to be subject to a shared care agreement. The medicines identified in this manner included growth hormones, erythropoietin, dornase alfa, cyclosporin, and tacrolimus. Fundholding GPs were identified by applications to the Regional Prescribing Contingency and Cost (PACT) data. The hospital doctors were only chosen from the specialities involved in initiating treatment with this group of specialist medicines (e.g. renal medicine).

A total of 58 GPs were invited to take part in the study and 48 agreed to participate. The final number of GPs and hos-

pital doctors participating in the study was 48 and 13 respectively. The GP sample comprised 39 males and nine females. Participating GPs were based at surgeries in Bromley (six), East Sussex (12), Greenwich and Bexley (seven), Kent (13), Lambeth, Southwark, and Lewisham (10). Of the 48 surgeries, 26 were fundholders and 22 were non-fundholders. The sample of hospital doctors comprised 12 consultants and one senior registrar (for analysis purposes the senior registrar was included in the hospital consultant group), of whom 12 were male and one female. Their specialties included renal medicine (five), respiratory medicine (three), rheumatology (two), paediatrics (two), and hepatic medicine (one). Hospital doctors were selected from hospitals located in central London (six), East Sussex (four), and Kent (three).

*Procedure*

The interviews were conducted at the doctors' places of work. All interviews were audiotaped with the permission of the interviewees. The audio tapes were transcribed in full and analysed by selecting and reorganising the transcript material according to themes. The themes were identified from several thorough readings of all the transcripts by one researcher (EM) and verified by another (RH).

**Results***Key themes*

Analysis of the interview data revealed that the views about shared care expressed by GPs and hospital doctors could be grouped under several key themes, detailed below, that informed the design of eight quality indicators.

*Comparison of shared care arrangements for specialist medicines with shared care for asthma and diabetes*

GPs' models of shared care appeared to be based on their experiences of antenatal, asthma, and diabetic care. The reported experiences of shared care for these common conditions were different from their experiences of prescribing specialist medicines, that they did not believe to be 'genuine' shared care. The key differences identified from the interviews are presented in Table 1.

It appeared that GPs did not regard specialist medicines as 'primary care drugs' and were concerned about assuming clinical responsibility for drugs they had little experience of. In contrast, they expressed confidence in the initiation and monitoring of treatment for asthma and diabetes, as these are common diseases that GPs have knowledge and experience of treating. For example:

*'I think there is a much greater case for shared care protocols for things like diabetes, I think that it is realistic, diabetes is a common condition, 1.5% of our patients will be seeing it from day to day, whereas things like growth hormone are not.'* (GP 4.)

*'Monitoring of the illness. Monitoring of the condition, and the fact that, if you look at diabetes we are talking about 1% of the population, asthma between 1% and 5% of the population. They are very common conditions,*

Table 1. Comparison of asthma/diabetes with specialist prescribing derived from GP interviews.

Asthma and diabetes	Specialist medicines
Patients represent a significant number of the practice population	Small numbers of patients. May be only one per practice
These are common conditions that a GP has knowledge and experience of treating	These are not very common conditions and the GP has limited experience in treating them
GP can monitor the progress of the disease	GP in the majority of cases is not involved in monitoring
GP can initiate, monitor, and change drug therapy	GP writes the prescription at the request of a hospital doctor
The majority of these patients are managed within the community by GPs	Management of patients by hospital doctor with minimal input from GP
Protocols between hospital and GP are useful as there are sufficient numbers of patients to warrant the time and effort in developing them	Protocols are not helpful as there are insufficient numbers of patients to warrant the resources required to develop them

*they are conditions that come in the GP remit and they are actually relatively easy to monitor.'* (GP 21.)

### Decision to share care

General practitioners expressed concern that the decision to share care and the criteria for patient referral are often not agreed between GP and hospital doctor. Certain GPs heard directly from the patient that they were involved in shared care arrangements prior to any contact with the hospital:

*'So our problem with this particular patient is she had already been told by Great Ormond Street that we would prescribe for her without us being asked in the first place.'* (GP 11.)

*'No nothing at all. I mean investigations were being done on the child and the next thing I knew the mother turned up with an expectation for me to prescribe.'* (GP 4.)

Other GPs reported that if patients had been told by the hospital to see their GP, in advance of the GP being asked to prescribe, this put pressure on them to agree:

*'At the end of the day the hospital will tell the patient that your doctor will prescribe so and so and if you don't, then it's quite difficult isn't it to explain to a patient why you won't prescribe something that the hospital has suggested they need, so you find it difficult to say no.'* (GP 27.)

From the interviews with the hospital doctors, it appeared that there were two styles of approach in asking GPs to be involved with prescribing specialist medicines. These were the 'tell' and 'sell' approaches. The 'tell' approach is evident in a remark by a hospital doctor who would not ask for GPs' permission:

*'I will tell you what I don't do, I don't ask the GP's permission. I know that's what some doctors are doing and then the GPs say, well I am worried about the cost and then the patients don't get it and I don't think that is right.'* (Consultant J.)

Some of the hospital doctors did not feel that it was necessary for them to discuss the idea of prescribing specialist medicines with GPs. The 'sell' approach was manifest by the hospital doctor telephoning the GP first to discuss the patients and ask whether they would be prepared to pre-

scribe:

*'We always ring a GP first before we ask him to prescribe it, we don't just assume he will because he could say it's not a GP's agent.'* (Consultant F.)

It emerged from the GP interviews that GPs preferred the 'sell' approach, and were more positive about prescribing specialist medicines if they had been initially approached by a telephone call.

### Does the prescribing arrangement represent the optimum solution for the patient?

A factor that emerged as a strong influence on GPs' decisions to assume prescribing responsibility for specialist medicines was commitment to their patients. General practitioners reported that they would be more likely to agree to prescribe if they felt it was in the 'best interests' of their patients:

*'...we agreed to prescribe it on the understanding, firstly we didn't want the patient to be compromised, not to have good care, care that was thought to be clinically necessary, we weren't in a position to make that kind of assessment and we actually weren't being asked to monitor her care, in that respect either...'* (GP 26.)

In certain cases GPs expressed concerns that the patient may not get access to the medicine if they did not supply it. Another strong concern was for the long-term relationship with the patient if the GP refused to accept prescribing. Even if GPs were worried over issues of inexperience with specialist medicines, they found it difficult to refuse patients when face-to-face. One GP said:

*'They trust me. If I then say no I can't give you a prescription it destroys the relationship that at that time is very important. So there is great pressure to give them this treatment that I have a lot of worries about when I don't know the effects of it.'* (GP 42.)

Hospital doctors were in agreement over GPs' responsibilities to their patients, as typified in the following statement:

*'I think personally that GPs have to accept their responsibilities as prescribers to their patients and that does not simply mean opting out of prescribing in the event of*

a new drug requiring some monitoring.' (Consultant C.)

### *Information, support, and patient management*

Another theme emerging from the interviews concerned the issue of patient management. GPs suggested that they had not been sufficiently involved in discussions with hospital doctors concerning the management of patient care. The primary role of the GP in the arrangements for prescribing specialist medicines was to write the prescription. In a few cases, the GP was involved in monitoring, but in no cases were the GPs involved in altering the medication dosage. General practitioners were rarely consulted about the information required to treat patients taking specialist medications. The following comments give an indication of the views expressed:

*'...one of the local hospitals literally just said, please prescribe growth hormone with no protocols at all and I tried to follow that up with letters and they just said, that the response was, just standard schedules please. We didn't have any standard schedules, we had never prescribed growth hormone.'* (GP 41.)

*'I can answer your question, did I get any information about it, side effects and monitoring, the answer is absolutely zilch.'* (GP 30.)

General practitioners reported a lack of professional understanding on the part of the hospital doctor about the role of the GP as a 'generalist' and not a 'specialist'. There appeared to be a general feeling that hospital doctors failed to understand the pressures GPs face in treating complex patients alongside their normal daily caseload:

*'I mean I could have become an expert in it, but I have got other things to do. I can't become an expert on every possible drug that comes out and there has to be some dividing line between what normal GPs are expected to have knowledge on and what the GP isn't.'* (GP 5.)

When asked how they thought the present arrangements could be improved, one GP stated:

*'I think it needs more protocols and information exchange between the two so there will always be information there to base prescribing or your care of the patient on. So providing there are protocols in place so that I know roughly what I am expected to do, then I am quite happy.'* (GP 2.)

This theme was also highlighted in the interviews with hospital doctors. It emerged that the specialties that had experience of asking GPs to prescribe expensive medication had developed quite detailed information packs for GPs, whereas those who were asking GPs to take on inexpensive medication had not developed such detailed information. However, in all cases GPs had little input in the development of information packs. Consequently, on the few occasions when GPs had given feedback to the hospital doctors the comments were quite negative:

*'I have been told it's too detailed which again is slightly*

*irritating because, you know, they are all intelligent human beings and can skim the bits they are not interested in.'* (Consultant I.)

### *Clinical responsibility*

Another theme that consistently emerged during interviews was the need for GPs and hospital doctors to agree their respective responsibilities. GPs expressed great concerns that in writing the prescription they would be deemed legally to have accepted clinical responsibility for the patient even though in the majority of cases the GP had little input into treatment decisions and had limited experience of the specialist medicines:

*'I am taking my reputation in my own hands because if a family should choose to sue me in the future, then I shall be the one to be sued not the hospital, putting my signature to the prescription. And there's a lot of resentment about this. The person who should be taking clinical responsibility won't be, the GP will be taking clinical responsibility because it's his signature on the bottom of the script.'* (GP 15.)

The interviews with the hospital doctors revealed that they perceived their role as providing the main element of patient care, including initiating prescribing, making dose changes, and monitoring the patient. Hospital doctors saw the main role of the GP as writing the prescription:

*'...essentially I think it would be pretty straightforward for most GPs to simply pick up the prescribing and allow the monitoring to take place elsewhere.'* (Consultant L.)

In some cases GPs were asked to take blood samples or carry out routine checks, such as blood pressure and urine analysis. General practitioners were also acknowledged as having an important role in picking up adverse drug reactions.

### *Communication between the GP and the hospital doctor*

The management of chronic diseases using shared care schemes has been characterised<sup>2</sup> by an enhanced information exchange between hospital doctors and GPs over and above the routine discharge and referral letters. However, this mechanism did not appear to be in place with the GPs interviewed:

*'Nowhere does much information come from the hospital to me of what's going on apart from a letter after an outpatient's appointment, usually about two or three weeks later...'* (GP 28.)

The delay in receiving the letters from the hospital doctor was the cause of considerable concern to GPs, particularly if the letters arrived after the patients' appointment with the GP. This break in communication could have serious implications on the patients' health, highlighting the need for good communication between GP, hospital doctor, and patient. As one GP commented:

'...I think he was seen in the clinic a fortnight ago and the letter has only just come through now. The letter says would you also check his U and Es before you increase the dose. He did not say that to the patient, he was just told to go and see his GP in two weeks and increase the dose. We haven't got the communication network there.' (GP 38.)

Unlike GPs, the hospital doctors appeared to be satisfied with the flow of information between themselves and GPs, and did not tend to perceive any problems. The letters they sent would include information on dose changes, information on the patient's progress, and give details of any tests that the GP may be expected to carry out:

'But I mean the GP will get after every clinic visit a very full letter that should have, not only all the drugs and the dosage, but the results of all the monitoring, so he actually has that information.' (Consultant J.)

However, these letters did not seem to provide information over and above what might be expected from 'non-shared care' outpatients clinics.

### Cost-shifting

A major theme that emerged from the data related to the issue of 'cost-shifting'. Both fundholding and non-fundholding GPs expressed their concerns about the impact of specialist medicines on practice budgets. General practitioners felt that the main motive for their involvement in shared care was owing to pressure on hospital expenditure. Although some GPs were sympathetic to this reasoning, others felt extreme resentment, as shown in the statements below:

'It's a cost-saving exercise that doesn't value any of our or the patient's time and effort, you know, the business of getting the transport up here, using up our appointment time, it's just not counted at all because it saves a bit of the provider's money. It's pathetic.' (GP 41.)

'The consultants are only interested in off-loading this prescribing. I don't think they are particularly interested in shared care.' (GP 15.)

When questioned about the best way forward for prescribing specialist medicines, GPs tended to argue for an increase in resources such that responsibility remains within secondary care, and is not shifted to primary care.

The sample of hospital doctors agreed that the main reason for asking GPs to take on the prescribing of specialist medicines is cost. As one hospital doctor stated:

'I think, the reasons why hospitals ask GPs to prescribe is because they can't afford the money that goes with prescribing it from the hospital itself.' (Consultant A.)

Hospital doctors also expressed the view that, while the main reason for GPs refusing to prescribe was related to cost, GPs tended to use issues of clinical responsibility and lack of information as a 'smoke-screen' to conceal their concerns:

'No, it's always money. Although the excuse has often

been, I am not experienced enough, but a lot of them are actually, will write or say over the phone telling you, look I am having trouble with my FHSAs, I am a fundholder and they say that they haven't got the money for any more expensive patients and therefore I can't prescribe it and I am as fed up with this as you are.' (Consultant J.)

When hospital doctors were asked their views on how the present arrangements for specialist prescribing might be improved, some argued that future developments should focus on providing the necessary funding to ensure that prescribing responsibilities remain with the hospital:

'It probably is easier for the patient if it is prescribed from hospital I guess because they actually don't need to see the GP really, and if they are coming to see me every six months to have their height and weight recorded, I could give them a six monthly prescription, well so be it, so it probably would be easier if it was done from within the hospital, but if it's going to be done from within the hospital we have to be given the finances to do that.' (Consultant K.)

Others asserted that GPs should take responsibility for repeat prescriptions of specialist medicines and the necessary funding should be made available, as demonstrated in the statement below:

'I think it has been hoped for some time that we would be able to change the attitude of the FHSAs and the GPs in those areas and persuade them that really it was far more appropriate that GPs prescribed these drugs than the tertiary referral centre 800 miles away.' (Consultant K.)

### Quality indicators

The key themes emerging from the interviews informed the development of eight quality indicators applicable to the arrangements for prescribing specialist medicines, as shown in Figure 1.

### Discussion

The themes generated from the semi-structured interviews suggested that the existing arrangements for the prescribing of specialist medicines are the cause of considerable con-

- Has the decision to share been agreed between the GP and hospital doctor?
- Has the arrangement for prescribing been evaluated as to whether it represents the optimum solution for that patient?
- Does the GP have sufficient information and support to feel confident in managing the patient?
- Have the GP and hospital doctor agreed their respective responsibilities?
- Has an agreed communication flow been established so that it is clear what information should be exchanged between the GP, hospital doctor, and patient?
- Have referral criteria been agreed between the GP and hospital doctor?
- Are GPs satisfied with their role within shared care?
- Will supplies of medicine be readily available in the community?

Figure 1: Quality indicators.

cern to GPs. General practitioners did not feel that the arrangements for prescribing specialist medicines that they were either participating in, or had been requested to participate in, matched their idea of shared care. The model of shared care that many GPs held was based on their experiences of shared care for diseases such as asthma and diabetes, which they commonly treat. General practitioners felt concerned about prescribing specialist medicines, owing to reservations over clinical responsibility, inability to monitor or alter the medicine dosage, and unfamiliarity with the medicine and the disease, as reported in previous studies.<sup>10</sup> Whereas prescribing for asthma and diabetes involves GPs monitoring the progress of the disease and the drug therapy, prescribing specialist medicines is performed at the request of the hospital doctor, with little input from the GP. Many GPs, particularly fundholders, expressed frustration at the costs of specialist medicines that put pressure on prescribing budgets. Cost-shifting from secondary to primary care can lead to conflict between hospital doctors and GPs, threatening a reduced quality of service as clinical responsibility is transferred from one doctor to another.<sup>11</sup>

The findings highlighted that the hospital doctor's style of approach influenced GPs' attitude to participating in shared prescribing. If GPs felt that hospital doctors were supportive, informative, and understanding of their position, they were more likely to feel comfortable in taking on the prescribing of specialist medicines.

The arrangements for prescribing specialist medicines were generally perceived to be at odds with notions of 'shared care', as typified by the management of patients with asthma and diabetes. The prescribing of specialist medicines in general practice was not perceived to be jointly managed in a manner agreed by both hospital doctor and GP, and communication was not established as a two-way process. The provision of information packs by hospital doctors was welcomed but these were perceived to be of limited value because GPs were not generally involved in their design.

Hospital doctors appeared generally satisfied with the current arrangements for shared care. They agreed with GPs about doctors' responsibility to their patients and the need for a robust funding mechanism for specialist medicines. However, unlike GPs, hospital doctors were generally satisfied with the information that GPs receive and were in no doubt over the clinical role of the hospital doctor and GP. Hospital doctors were quite candid in their financial motivation for asking GPs to prescribe specialist medicines, and were aware that GPs are concerned about the costs involved. Nevertheless, hospital doctors expressed the view that it would be better for GPs to state their concerns directly, even if these were primarily related to costs, and that it was important not to use concerns over clinical responsibility as an excuse not to prescribe. However, GPs' concerns about lack of knowledge to discharge their clinical responsibility fully in relation to prescribing seemed genuine and there was little indication that they would be willing only to 'prescribe as instructed'.

An earlier major study also identified GPs' and hospital specialists' views about prescribing at the hospital-general practice interface.<sup>10</sup> Exact comparison between this study

and our current study is hampered by the fact that the earlier study used a quantitative methodology and our study was qualitative. However, it is interesting to note that many of the issues arising during our interviews were consistent with those elicited in the earlier study. One noticeable difference between the findings of both studies was that concerns about the cost of prescribing seemed to be a more predominant feature in our study than in the previous study conducted in 1992. This may reflect an increasing emphasis on costs of prescribing in health care policy. Alternatively, it might simply be a function of the methodology used, such that open interviews may have facilitated expressions of concerns about costs that had not been elicited in the previous study.

### Limitations

The size of the GP and hospital doctor samples was uneven; the ratio of hospital doctors to GPs was approximately 1:4. However, the main focus of the study was on GPs' perspective, and a small sample of hospital doctors was drawn from the same geographical area as GPs for means of comparison. Also, we did not quantify the frequency of attitudes expressed by doctors and further work is necessary to assess the extent to which the themes and views identified in the study are relevant to a more representative sample of United Kingdom GPs and hospital doctors. This issue would need to be re-addressed in larger survey studies, that might use the quality indicators derived from the present study as a basis for evaluating perceptions of shared care among a representative sample.

### Conclusion

Based on the themes identified from the interviews with GPs, we have suggested a number of 'quality indicators' that might relate to the arrangements for the prescribing of specialist medicines between primary and secondary care. Each major theme arising from the interviews was used to suggest a single quality indicator. We recognise that these indicators are tentative and further research is needed to identify consensus among a representative sample of GPs. However, the quality indicators have the merit of being derived from discussions with practising GPs with experience of shared care arrangements. As such, they may provide a useful baseline for further research.

The views elicited from the interviews pointed to the need to consider the requirements of the patient, the GP, and the hospital doctor. These indicators will form the basis for a more extensive survey of GPs' perspectives of the arrangements for prescribing specialist medicines, together with their evaluation of the relative importance of each of the quality indicators.

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