MONITORING QUALITY IN THE BRITISH HEALTH SERVICE - A CASE STUDY AND A THEORETICAL CRITIQUE

Mike Hart, M.Sc.

Department of Public Policy and Managerial Studies,
De Montfort University, Leicester, UK

Abstract

In order to achieve higher standards of quality in public services, the British government promulgated a series of *Charters* of which one of the best known is *The Patient's Charter*. A series of standards were laid down and progress was monitored in the achievement of such standards by the publication of annual *League Tables*. One such standard addressed an issue that had long been a source of concern i.e. the amount of time that patients spent waiting when attending outpatient departments in hospitals. This paper details the results of a monitoring exercise introduced in one local hospital to address this issue. The paper discusses whether a purely quantitative approach to quality can deliver the desired improvements. In particular, it is felt that such an approach concentrates a measurement of the easily measurable rather than the significant features of clinic organisation. An argument is advanced that quality measures should incorporate more qualitative dimensions, including the tapping of patient perceptions of their experiences, before a claim can be made that reducing waiting times has improved overall quality. The frequent use of the term *customer* in the quality literature receives critical attention when it is applied in the NHS. The fact that the term conflates the roles of *consumer* and *purchaser* makes analysis potentially difficult and it is suggested that regarding patients as customers (in the manner of some traditional approaches to quality) is not a useful aid to analysis.

Key Words **Outpatients, Quality, Leicester**

Background

Throughout the 1990's, one of the principal thrusts of Government policy in the United Kingdom has been to secure increased levels of efficiency and better 'value-for-money' in the public sector. This is particularly true in the case of the UK health budget which, like health budgets throughout the world, is under a constant pressure to contain rising costs. Such costs come under pressure from a variety of sources such as the demographic implications of an ageing population, the pace of technological advance and a rising tide of consumer expectations. The British NHS, moreover, is said to be the largest 'employer' in Western Europe (although employment is actually shared through a variety of agencies) and to deploy a budget of £40 billion per annum.

One particular government initiative was the concept of the 'Citizen's Charter' detailing minimum standards of service to be expected in dealings with government agencies. The principal 'Citizen's Charter' was soon followed by 'Charters' in several other areas of which one of the most important was 'The Patient's Charter' **[1]** , later updated and refined as 'The Patient's Charter and you' **[2].** In the NHS, there are at least some 40 million outpatient attendances a year and previous research indicated that one of the principal sources of dissatisfaction was the amount of time people typically had to wait in a clinic before they received attention from a member of the medical staff. The two 'Patient's Charters' addressed this problem by indicating that all patients were to be given a specific appointment time with an expectation that patients should be seen within 30 minutes of that time.

In order to meet the provisions of 'The Patient's Charter' it is evident that Hospitals had to engage in systematic monitoring procedures, not only for their own quality control purposes but also because they were required to supply regular monitoring returns to the NHS Management Executive. As the NHS Training Directorate publication, 'Monitoring made Easy' **[3]** indicates:

> 'Information from monitoring may, if Standards are high, give your organisation a strong position in negotiating its contracts with purchasers of healthcare...General Practitioners and Health Authorities will wish to assess your organisation's service delivery to enable them to make informed choices about where to refer their patients'
>
> (NHS Management Training Directorate **[3]** , p.3)

An objective of Government policy is to bring the ‘disciplines' of the private market to bear upon the provision of public services. The British National Health Service is now reorganised into a 'managed market' in which fund-holding GP's and District Health Authorities purchase services directly from hospitals with whom they have contracts. The provision of information upon 'quality' is seen to be a crucial resource when purchasers are seeking or renegotiating contracts with 'providers'. Individual consumers are also given official encouragement to exercise some 'consumer sovereignty' by consulting the NHS Comparative Performance ("League”) Tables. These were published for the first time in June, 1994 and indicate how hospitals and other providers are performing in the context of national standards.

The Leicester General Hospital case-study

In Autumn, 1991, the author was invited to assist the Department of Quality Assurance in formulating a strategy to improve outpatient clinic waiting times - one of the key 'measures' by which the efficiency of a hospital was to be judged under the newly published 'Patient's Charter' guidelines. An initial monitoring was conducted in a variety of clinics and the pilot study indicated that less than 50% of patients received attention within 30 minutes. The median waiting time was greater than 30 minutes and although the figures were not of out of line with then prevailing national standards, it was felt that improvements could and should be effected.

A monitoring programme was instituted in which basic data on arrival times, appointment times, and lengths of consultation times were recorded **[4].** This monitoring also recorded the existence of other 'complicating' factors such as whether a patient had arrived late or whether or not the patient had arrived by ambulance as it was

not uncommon for patients to be delivered to the outpatients clinic without a great deal of regard to the appointment time.

Clinics were sampled on a monthly basis such that each month several clinics with several hundreds of patients were caught in the sample. The sample was also 'managed' so that each one of the major clinics would be sampled in a three month period. The data was gathered for each patient in a sampled clinic and from this data a series of frequency distributions and other statistical summary measures were generated. The statistical software used was written by the author and could be used on any stand-alone PC. Hence it was not necessary to install expensive add-on modules to the Patient Administration System. Although the author undertook the first few months of analysis, a 'turn-key' system was developed under which the hospital then undertook its own data collection, data preparation and statistical analysis. A sample of some of the reports generated is shown in Appendix 1.

Each month, the statistical reports generated were discussed with the consultants concerned. Local management were concerned that the medical consultants did not perceive the monitoring returns as 'threatening' but rather as a baseline from which further improvements could be effected. Only a few consultants expressed hostility towards the new scheme and the majority recognised that, despite their misgivings, it was government policy that waiting times in clinics should be reduced. A few consultants even embraced the monitoring enthusiastically, aiming at 100% compliance within their own clinics! An important point to be made at this juncture is that the success of the monitoring scheme owed much to enlightened management action. Management and consultants attempted collectively to remove bottlenecks and to identify any barriers that might prevent them working towards to goal of 100% patients seen within 30 minutes. The information in the statistical monitoring helped in this respect, for it was possible to identify more clearly the amount of time to be devoted to 'new' (i.e. first time) outpatients as opposed to 'continuing'(i.e. follow-up patients). Armed with this better information, it was possible to allocate an appointment 'slot' that more fully reflected the patient's needs and so overall clinic organisation was improved.

As a result of the monitoring exercise and the changes in clinic organisation that resulted from it, the reductions in waiting times were quite dramatic. After a fifteen month period, a sample of clinics was recorded in which 83% patients were seen within 30 minutes and the median waiting time was now of the order of 15 minutes.

Does the case study indicate that 'quality' has been improved ?

'Quality' is a notoriously elastic concept with which to deal if only because the definitions of it are legion and in any case we need to refine traditional definitions of quality, often derived from manufacturing industry, before they can be applied to service sectors
such as healthcare. One recent authority has argued that quality in health services may be defined as :

> 'Fully meeting the needs of those who need the service most, at the lowest cost to the organisation within limits and directives set by higher authorities and purchasers'
>
> (Øvretveit, **[5]** , p.2)

Øvretveit points, in this definition, to the roles of the immediate client and client groups targeted by the service [*'the needs of those who need the service most'*], using resources in an efficient way [*'lowest cost to the organisation'*], within the parameters set by higher management or the political machine [*'within limits and directives set by authorities and purchasers'*]

Nonetheless, it would seem difficult, at first sight, to apply this general principle to the case study described above. The fact that improvements have been made which satisfy 'directives set by higher authorities' is not questioned. Resources may have been used somewhat more efficiently in that a patient's time spent in waiting may have been minimised. But how is it to possible to assess whether client needs have been 'fully met ?' It seems 'a priori' likely that patients attending an out-patients clinic are anxious for news of their condition or of their progress if they are subject to a post- operative check-ups. A consultant put under time pressure to comply with an external monitoring standard could be put under subtle pressure to reduce the

amount of time spent with each patient and the quality of the attention received could thereby diminish. Nor is the patient really in a position to effectively judge whether the quality of the service has been maintained, increased or diminished. There is also the point that whilst various viewpoints are included in the definition above ('client', 'manager','purchaser') that of the most relevant professional - the consultant running the clinic - is conspicuous by its absence.

Of course, it could be argued that one of most evident sources of dissatisfaction - long waiting times in clinics, identified inter alia by Cartwright and Windsor **[6],** has been identified and well on the way to elimination. But there is more to 'quality' than measurement of an easily quantifiable but not particularly significant indicator. This then becomes the nub of the problem. Governments exert pressure upon hospital managements to improve their performance by setting a number of performance targets. Changes are put into effect to ensure compliance, at the measured level, with the new performance targets. Governments and managements then argue that the 'quality' of the service has been improved.

So long as there is a tendency to express performance measures, or quality indicators, in the form of crude quantitative measures, there is the perpetual danger that managers are measuring the 'measurable' rather than the 'significant'. In order to measure the 'significant', we would need much more detailed studies on the quality of interaction between doctor and patient, on the outcomes of clinical treatments and on the whole of the patient 'experience' This data would be expensive to obtain, the results would not necessarily be of a comparable nature and they would not satisfy the political objective of a high degree of accountability in meeting a policy objective. In this case, more sophisticated measures of quality would not, if utilised, be widely adopted or endorsed. So there is always an inherent tendency within the system to collect data on the quality process which is 'measurable' and to argue about is 'significance' at a later date (if at all!)

To return to the question posed by the case study - have the outpatients of Leicester General Hospital experienced a better outpatient service ? The answer is a tentative 'perhaps' In order to arrive at a more satisfactory answer, we would need to combine the statistical monitoring already undertaken with the perceptions

of many of the 'key players' who would include consultants, registrars, nurses, clinic management staff, outpatient managers and the like. Such an approach would not be as simple or as crude as a 'patient satisfaction survey' but would need to employ a grid upon which it is possible to map the various perceptions obtained. Even here, it is possible that 'quality' is only obtained in one sector by transferring resources in order to obtain it from elsewhere. So it would still be necessary to define quality not in absolute terms but within the contexts of the resources that have been made available at any particular time or location.

Quality Management in the Health Service

Quality Management has, at its heart, the concept of satisfying the customer/consumer. In the case of the plurality of goods and services, this concept does not cause a great deal of difficulty. However, it does create an enormous dilemma when applied to healthcare services in contemporary Britain in which there is a 'managed' market split between institutional purchasers and providers. The crux of the problem is that whilst an individual patient may the *consumer* of a service, the actual *purchaser* of the service could be one of a whose series of agencies. We might take a hypothetical example of an old person who needs a hip replacement operation in order to secure a degree of mobility into advanced old age. The 'consumer' of the service is the old person themselves but the 'purchaser' could be one of the following :

- the *old person themselves* (from their own savings)
- the old person's *insurance policy*
- the old person's *family, relatives and friends*
- the *local community* (who have raised the money collectively)
- a *local charity*
- the *GP fundholder*
- the *District Health Authority* or health *Commissioning Agency*

and there are even more possibilities not covered by the above. By satisfying the consumer (providing a high quality operation) it is possible that other elements of service are denied to other segments of the population so maximising satisfaction to the *consumer* is not necessarily maximising satisfaction to the ultimate

purchaser. Traditional TQM has not had to cope with this dilemma which is only met in an acute form when we find a split in the role of consumer v. purchaser.

The point is at least recognised by Øvretveit **[5]** who, when comparing the differences between health and other services indicates that in the case of the NHS there may be a:

> 'Complex 'customer': (the service must) satisfy purchasers,referrers, the clients and their carers rather than just a customer-purchaser'
>
> (Øvretveit, **[5],** p. 11)

In a further attempt to unravel the roles involved, Øvretveit addresses the differences in roles to be found between the public and the private sector:

> 'Again, it is not clear how far the 1990 NHS reforms will increase choice and minimise these differences between public and private sectors. It is clear these differences must be considered when developing and introducing a quality programme....
>
> Purchasing agencies and most providers have to satisfy a range of demands which frequently conflict...Not only is there the direct beneficiary of the service (the client), there are also the beneficiaries 'informal carers' - relatives, friends and neighbours.
>
> Providers also have to satisfy a referrer, who in the UK is usually a GP and may be one with a budget and hence a 'purchaser-client'
>
> Finally, in some instances, the community at large may be the client, requiring the service to act on behalf of the community to protect its well-being...
>
> The answers are more difficult to find in public services than in a service where an individual walks in, cash in hand, asking for a service.'
>
> (Øvretveit, **[5]** pp.12-13)

In summary, the position adopted by Øvretveit appears to be that

- providers and providers have to satisfy more than the prime 'consumer' to achieve quality

- the interests of the different parties have to be reconciled or at least 'satisficed'

Such a formulation seems to derive from the classic equilibrium theory of classical economists in which there is a presumption that conflicts of interests can be successfully 'managed' or at least brought into some degree of reconciliation. It could be argued, however, that in attempting to pursue a goal of equity and equality of access to a service, a purchaser could inadvertently be instrumental in reducing rather than increasing the overall quality of the service. The problem also remains that to satisfy one consumer may be to 'dissatisfy' several other consumers whose needs may be just as urgent but whose voice is not heard. The well publicised case of a DHA which refused to fund further expensive courses of treatment for a leukaemia sufferer with only a 10% chance of a successful outcome (‘*Child B’*) is a case in point. If the DHA had bowed to threats of legal action or a prolonged media campaign, then the outcome could well have been the denial of treatment to several other patients with inherently more treatable conditions.

An 'ecological critique' of TQM applications in the National Health Service.

Despite some of the manifest difficulties in applying TQM methodologies uncritically into the Health Service, it is quite possible to redefine concepts in such a way that something of value can be retained. The case study of Leicester General Hospital presented earlier points a way forward. It will be taken as axiomatic that a certain level of statistical monitoring, even of crude indicators such as waiting times, may be regarded as a necessary condition for the development of a 'quality' profile.

The difficulty with such statistical abstractions, though, is they present the unit or organisation under investigation through a type of bureaucratic filter in which the life-blood and the dynamics of the social processes at work are completely ignored. In order to attempt to rescue a TQM approach, it is necessary to adopt an approach in which the values, attitudes and world-views of the key-players are given full expression. Such

an approach is termed *'ecological'* in that it is necessary to study social phenomena in more naturalistic settings rather than attempt too crude an abstraction (for example by collecting only figures on performance). This approach derives from the philosophical stance that social phenomena are best studied 'in the round', in much the same way that flora and fauna are studied in their own ecological 'niche'.

An ecological approach would evidently need to systematically consult the views of patients themselves. Emphatically, this does *not* mean merely the administration of another 'patient satisfaction' survey. Rather, periods of participant observation or more focused discussion could be utilised to indicate what, in the patients' minds are the indications of a quality service in so far as they are able to determine it. The perceptions of clinic staff could well be brought together in a variation of clinical audit.

The same considerations would apply to the clinical and support staff involved. A 'quality' experience from the perspective of the clinician could well be one in which all diagnostic results were immediately to hand when required and in which no undue time restraint was felt to be in evidence.

The statistical monitoring procedures currently conducted can be used to indicate the removal of 'dis-satisfiers' and fulfil the function of presenting representative data to higher management and Government. However, it can be argued that the richer texture of data provided by an ecological approach gives both clinicians and managers a more intuitive way of assessing the quality of services under their control. Some would argue that the data appears 'softer' and less 'scientific' but this is to miss the point. Quality evaluation needs to capture both the 'reality of the experience' as well as the more formal data represented by the conventional statistical returns.

A 'clash of cultures'

Reference has already been made to the fact that the political machine may require one set of data whilst professionals concerned with the efficacy of the service they are delivering may require another. This paper concludes by indicating that it is possible to bring both of these concerns together into common program of quality monitoring.

Removal of sources of dissatisfaction

It is axiomatic that patients may not be in a good position to judge the quality of the clinical care that they receive in a clinic. However, it is quite possible to identify those aspects of clinic organisation that are found irksome and to remove the same. Given that many patients have had arduous journeys and often complicated domestic arrangements to undertake in order to attend a clinic, then there is a good therapeutic argument for making the environment as comfortable and non-threatening as possible. Studies of departments which have tried to radically improve themselves point to the importance of soft furnishings, supplies of refreshments, ready availability of reading matter, the provision of information concerning any delays, good signing around the hospital and so on.

Distributional questions

Very often a quality approach to clinic organisation will take seriously a patients' complaint scheme if not a suggestion box approach. There is an ever constant danger, though, that feeding the revolution of rising expectations by being even more responsive to patient requests may not always be to the long term interests of the majority of clinic attenders. For example, if patients are encouraged to complain it is possible that a service can be skewed in the direction of those who are used to voicing complaints rather than the more acquiescent sections of the patient body. The perception of what constitutes a 'good service' will also depend upon the reference groups of each individual patient. The same 'objective' set of conditions could be perceived in the following way :

- *Patient A*: 'Much better than I remember from 10 years ago'
- *Patient B*: 'Much worse than last month'
- *Patient C:* 'Better than my neighbour led me to believe'

Any attempt to assess the quality of the service cannot totally ignore the expectations of those who have to experience it first-hand. However, if expectations are raised too far, then it is quite possible that 'perceived' levels of dissatisfaction are rising whilst

more 'objective' methods may record that the quality of the delivered service is actually increasing. Management may therefore have a difficult task to ensure that certain minimum standards are offered to all patients and that particularly vociferous patients do not secure better standards of service at the expense of their fellow patients.

The 'professional' v. 'bureaucratic' model

The argument here is that professional groups (typically clinical staff) will generate a higher quality service if left to develop their own particular quality sub-cultures. The role of management could therefore be to facilitate degrees of medical and clinical audit which were completely self-managed. It could be that medical staff require technical assistance in the extraction of datasets and other information (e.g. Did Not Attend's) in order to monitor their own performance. Such self-managed activities could be viewed as wresting a degree of managerial control back from the frontier of control which has reduced the independence and autonomy of key groups of clinical staff. It is always possible that key 'producer groups' define priorities in such a way that their own interests are safeguarded. It is possible to exaggerate this danger however. A more powerful argument is to suggest that professional groups will play a more dynamic role in the development of quality standards in the National Health Service and elsewhere if a certain degree of autonomy is restored to them.

Conclusion

It is quite possible that the whole debate about 'quality' is nothing to do with quality at all. The cynic could argue that 'quality' is a useful emblematic statement with which higher management attempt to wrest a degree of bureaucratic control away from the perceived power of the clinical staff and other producer groups. As Hughes and McGuire **[7]** argue:

> 'The likely consequence of the 1990-91 reforms is that bureaucratic regulation will live on, but with the loci of power shifted towards the top (the Health Secretary and the NHS Management Executive) rather than the middle tiers of the management hierarchy (the regions). This will be the necessary counterbalance to a growth of

self-protective behaviour and fair practices at provider level. As a result, the internal market risks delivering the worst of all worlds: the complications of the quasi-market and the rigidities of continuing, partially disguised, top-down control'

(Hughes and McGuire, **[7],** p. 109)

There is a danger, highlighted in some of the arguments advanced above, that over-concern with purely quantitative indicators of quality could lead to the emergence of practices which actually destroy quality. For example, it is not inconceivable that in some out-patient clinics there may be pressure to cancel appointments or to 'rush' appointments in order to maximise their 'quality rankings'. The ultimate irony would be if a concern with quality in NHS clinics (and in other public services) were to reduce the quality of the service that the measures were designed to raise.

(Word Count: 3963 words + data tables and references
4615 words in total)

Appendix 1

Table 1 : Statistical summary form (Leicester General)

```
Consultant: CONSUL_X  Month : AUG  [ File: CONSUL_X.AU!]
========================================================

Labels [ID] of patients arriving 10 + minutes late
--------------------------------------------------

Record#  date       id
     1  05/08/92 466526
    32  12/08/92 169804
    33  12/08/92 487360

    N=   3   [ 9.1% ]

Arrival and appointment times for ambulance patients
----------------------------------------------------

Record#  date       id arrival  appoint  mins_early
     1  05/08/92 466526   10.05   10.45        40
     2  05/08/92 485362   10.20   10.00       -20
     3  05/08/92 341846    9.55   11.15        80
     4  05/08/92 110734    9.55   10.00         5
     9  05/08/92 467548   10.00   10.00         0
    20  12/08/92  15070    9.45   10.00        15
    21  12/08/92 113684    9.55    9.30       -25
    22  12/08/92 341965   10.15   11.30        75
    23  12/08/92 484026   10.15   10.30        15
    24  12/08/92 484293   10.36   10.45         9
    29  12/08/92 348848    9.40    9.00       -40
    30  12/08/92  99437   10.14   10.00       -14
    31  12/08/92 486891    9.50   10.45        55
    32  12/08/92 169804    9.35    9.15       -20

Average arrival time BEFORE appointment    + 12.5 mins

    N=  14   [ 42.4% ]

Statistical summary
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Number of consultations         :  33
Number of split consultations    :   2  [6.1% of total]
Mean   waiting time (ALL)        :  11.8 mins
Median waiting time (ALL)        :  15.0 mins
Maximum      [id 123456]        :  70   mins
Minimum                       : -60   mins
Mean waiting time (ambulance)    :  12.6 mins
Mean waiting time (non ambulance) :  11.1 mins

T-Test of differences in waiting times =  0.141
[ NOT significant at 5% level ]

Mean consultation time [ALL]: 23.1 mins
Mean consultation time [New]: 57.4 mins   N=  5 [  15.2% ]
Mean consultation time [Continuing] : 17.0 mins   N= 28
                                       [  84.8% ]
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Table 2 : Sample Report form (1) - Leicester General

```
WAITING TIMES  Complete data set       CONSUL_X.AU1

                                          Cum.
 Value label     Frequency  Percent       Percent

 Before time         10      30.3          30.3
 0 - 10 mins          4      12.1          42.4
11 - 20 mins          8      24.2          66.7
21 - 30 mins          2       6.1          72.7
---------------------------------------------------
31 - 40 mins          5      15.2          87.9
41 - 50 mins          2       6.1          93.9
51 - 60 mins          1       3.0          97.0
61 - 70 mins          1       3.0         100.0
               -------    -------
       TOTAL        33     100.0


        Before time  ■■■■■■■■■■■■■■■■■■■■  10
         0 - 10 mins ■■■■■■■■  4
        11 - 20 mins ■■■■■■■■■■■■■■■■  8
        21 - 30 mins ■■■■  2
        31 - 40 mins ■■■■■■■■■■  5
        41 - 50 mins ■■■■  2
        51 - 60 mins ■■  1
        61 - 70 mins ■■  1

       Valid cases    33
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