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Public and private hospitals in Bangladesh: service quality and predictors of hospital choice

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This study compares the quality of services provided by public and private hospitals in Bangladesh. The premise of the paper was that the quality of hospital services would be contingent on the incentive structure under which these institutions operate. Since private hospitals are not subsidized and depend on income from clients (i.e. market incentives), they would be more motivated than public hospitals to provide quality services to patients to meet their needs more effectively and efficiently. This premise was supported. Patient perceptions of service quality and key demographic characteristics were also used to predict choice of public or private hospitals. The model, based on discriminant analysis, demonstrated satisfactory predictive power.

Introduction

Large segments of the population in developing countries are deprived of a fundamental right: access to basic health care. Without an appropriate and adequate health support and delivery system in place, its adverse effects will be felt in all other sectors of the economy. In simple terms, an ailing nation equates to an ailing economy as manifested in lower income-earning capacity of households and significant productivity losses in those sectors that sustain the economy.

The problem of access to health care is particularly acute in Bangladesh. According to a World Bank (1987) estimate, 'only 30% of the population has access to primary health services and overall health care performance remains unacceptably low by all conventional measurements.' A subsequent study (Sen and Acharya 1997) notes some improvements but indicates that 'the poor quality of health services . . . are persistent concerns.' The poor performance of the health care sector was attributed to the following: critical staff are absent, essential supplies are generally unavailable, facilities are inadequate, and the quality of staffing is poor. The problems of supervision and accountability exacerbate the problems; and if corrupt practices are added to the list, it is not difficult to imagine the predicament of the patients. In fact, these conditions and a general perception of poor and unreliable services may explain why those who can afford it have been seeking health care services in other countries. In a country where the population growth rate will place additional demands on the health sector, its preparedness to serve its constituencies effectively is particularly troubling as the future begins to catch up.

To address the impending problems, consideration has been given to the privatization alternative. Thus, the Medical Practice and Private Clinics and Laboratories Ordinance was promulgated in 1982 to encourage the growth of private health-care service delivery. By June 1996, a total of 346 private hospitals and clinics with more than 5500 beds were registered with the Directorate of Hospitals and Clinics. Of this total, 142 were established in Dhaka alone with a capacity of 2428 beds (Khan 1996). Additional considerations are seen in the proportion of GDP allocated to the health care sector: it was more than doubled between 1985/86 and 1994/95, from 0.6 to 1.3% (Kawnine et al. 1995). A significant proportion of this allocation was earmarked for primary health care.

While these allocations are encouraging, the perceptions that people have about the relative quality of health care services in the country may not be so favourable and remains to be assessed. This assessment is important because even if the problems of access were to be substantially alleviated, quality factors are likely to strongly influence patients' choice of hospitals. In Nepal, for example, the Government made substantial investments in basic health care; yet utilization remained low because of clients' negative perceptions of public health care (Lafond 1995). In Vietnam, poor service in the public sector led to increased use of private providers (Guldners and Rifkin 1993). Apparently, quality is important and demands continuous attention.

With the growth of private health care facilities, especially in Dhaka city, it is important to assess the quality of services delivered by these establishments. In particular, it is important to determine how the quality of services provided by private clinics and hospitals compares to that of public hospitals. If quality issues are being compromised by these establishments, it calls for the re-evaluation of policy measures to redefine their role, growth and coverage, and to seek appropriate interventions to ensure that these institutions are more quality-focused and better able to meet the needs of their patients. A search of the literature suggests that such a comparative study has not been undertaken. While anecdotal evidence suggests the existence of serious service-related problems in both sectors, this study was

designed to determine and compare the quality of services provided by both private and public hospitals.

The study also attempts to determine whether the service quality ratings are reasonable predictors of the type of hospital chosen by patients. Demographic variables of income and education were included with service quality ratings to test the model's predictive capability.

The theoretical basis of this paper is that the quality of services provided by the hospitals is contingent on market incentives: because private hospitals are not subsidized and depend on income from clients, they will be more inclined than public hospitals to provide quality services and to meet patients' needs better. By doing so, they will not only be able to build satisfied and loyal clients who will revisit the same facility for future needs; the clients will also serve as a source of referrals to recommend the private establishments to friends and family, thereby sustaining the long-term viability of private hospitals.

In public hospitals, on the other hand, there is little or no market incentive to motivate the staff to take extra initiative or effort to improve the condition of patients and ameliorate their suffering. Tax subsidies and other sources assure these organizations of their survival. Harsh as this may sound, evidence of their lack of responsiveness, dedication, or quality assurance in media reports is often stark. This suggests that their service quality will be rated lower than private hospitals.

Quality assessment, however, requires careful consideration. Two major concerns are: who will assess quality and on what criteria. While quality care may be defined as the degree of excellence in overall care, the judgment of quality may depend on whose perspective is sought.

Historically, the establishment of quality standards has been delegated to the medical profession and has been defined by clinicians in terms of technical delivery of care. More recently, patients' assessment of quality care has begun to play an important role, especially in the advanced industrialized countries, and their satisfaction or dissatisfaction with services has become an important area of inquiry. Thus, Donabedian (1988) suggests that, 'patient satisfaction should be considered to be one of the desired outcomes of care ... information about patient satisfaction should be as indispensable to assessments of quality as to the design and management of health care systems.'

Because customers or clients of hospitals and clinics have the most direct experiences with the services provided by these institutions, this study focuses on their perspective. On a complex issue like health care, while some feel that the customer cannot really be considered a good judge of quality and dismiss their views as too subjective, Petersen (1988) suggests that, 'It really does not matter if the patient is right or wrong. What counts is how the patients felt even though the caregiver's perception of reality may be quite different.' In Bangladesh, the customer's viewpoint is neither sought, nor given any importance (as far as we know) in strategy formulation; thus, very little is known about how the 'customers' assess health-care service quality. Since the recipients of health care can provide valuable, albeit partial, insights, and since their opinions should drive meaningful changes in the system, their perspective was central to this paper.

It was also important to establish the criteria for assessing service quality. Some guidelines were available from research on this topic conducted in other countries. The SERVQUAL framework, first proposed by Parasuraman et al. (1985, 1991), has guided numerous studies in the service sector that focus on banks, repair and maintenance services, telephone companies, physicians, hospitals, hotels, academic institutions and retail stores (Parasuraman et al. 1988; Carman 1990; Boulding et al. 1993). Interestingly, while the SERVQUAL framework has been applied with great enthusiasm, empirical support for the proposed framework and the measurements has not always been very strong. Not surprisingly, the model and its measures have been widely debated by marketing academics. For example, Brown et al. (1993) have suggested measurement problems in the use of difference scores; Cronin and Taylor (1992) have suggested that service quality can be predicted adequately by using perceptions alone rather than using difference scores; and Carman (1990) has suggested that in specific service situations, it may be necessary to delete or modify some of the SERVQUAL dimensions or even introduce new ones. Moreover, in cross-sectional studies, measuring the gap between expectations and performance can be problematic. Since data are generally collected subsequent to the service encounter, questions about service expectations may be based on memory or biased by actual services received (Andaleeb and Basu 1994). In the context of hospitals, Reidenbach and Sandifer-Smallwood (1990) have shown the existence of measurement problems.

The Bangladesh context of this study made it imperative to include additional cultural variables to establish service quality criteria and their measures. For example, qualitative interviews suggested that the concepts of *baksheesh* (facilitation payments) and *discipline* should be included in assessing perceptions of service quality. In many service sectors, even the most basic services are often difficult to obtain without baksheesh. At times, a patient's fate may be determined by her ability to provide baksheesh. Discipline has also deteriorated in Bangladesh for a variety of social, political and economic reasons, and is reflected prominently in various service sectors. Not surprisingly, service quality perceptions have suffered, often drastically, among service seekers. Consequently, instead of limiting the concepts and measures of service quality to the theoretical structure and measures suggested by the SERVQUAL framework, a modified framework with its attendant measures was adopted in this study. Although several of the SERVQUAL dimensions were included in the assessment, the introduction of additional factors was also deemed pertinent to the assessment of service quality in hospitals in Bangladesh. The key concepts are described next. Then the research method is explained, followed by the findings and conclusions.

Conceptual framework

The important components of hospital services in the context of Bangladesh, as derived from theoretical considerations and the data structure, are as follows.

Responsiveness

The literature identifies responsiveness as an important component of service quality and characterizes it as the willingness of the staff to be helpful and to provide prompt services. Six items were used to delineate and measure the construct.

Assurance

Assurance is defined as the knowledge and behaviour of employees that convey a sense of confidence that service outcomes will match expectations. Six items were used to measure this construct and reflect the competence, efficiency and correctness of services provided to patients.

Communication

Communication with patients is vital to delivering service satisfaction because when hospital staff take the time to answer questions of concern to patients, it can alleviate many feelings of uncertainty. In addition, when the medical tests and the nature of the treatment are clearly explained, it can alleviate their sense of vulnerability. This component of service is valued highly as reflected in the in-depth interviews and influences patient satisfaction levels significantly. Four items were used to measure this construct.

Discipline

Lack of discipline pervades many organizations and institutions in Bangladesh and is commonly manifested in absenteeism and non-performance of prescribed duties. Manipulation of or non-adherence to written rules are also not uncommon. In the hospital environment, lack of discipline can be tremendously disruptive, attenuating perceptions of quality services. Thus, maintenance of the facilities or ensuring that the staff maintain clean and proper appearances are some indicators of the extent of discipline in the environment. Adherence to visitation hours and keeping noise down to acceptable levels in the hospital environment are additional indicators of discipline or the lack thereof. Six items were used to measure discipline.

Baksheesh

The concept of baksheesh, the extra compensation that is expected in many service settings in Bangladesh for 'due' services, is becoming notoriously common, especially in the public sector. It represents a payment to service providers to ensure that expected services are delivered. Baksheesh is distinguished here from bribes in the sense that bribes can represent solicited or unsolicited demands for money to render 'undue' services. For example, a bribe may be required to obtain hospital admittance out of turn or to obtain priority access to a particular doctor; baksheesh will ensure that a scheduled appointment is met.

The above constructs represent the initial set of factors along which hospital services in Bangladesh were compared; they were also used to model the type of hospital that patients would select. The research method is explained next.

Methodology

Secondary research

Secondary research was first conducted to determine whether studies comparing the quality of services between private and public health-care facilities had been conducted in Bangladesh. Unfortunately, even on such a vital issue, published studies were difficult to find. While such studies may have been conducted by experts for various government and international agencies, they were not available in the public domain. Consequently, this study is grounded in survey data obtained from recipients of health care in Dhaka, Bangladesh. The study took place between November 1996 and April 1997.

The conceptual framework and its key constructs were established initially from qualitative interviews with experts and recipients of health care services in Bangladesh. Based on their inputs, and judging from the literature on the topic from other countries, a number of service factors were identified. Five important attributes of health care quality emerged as latent variables from the data structure and have been discussed in the conceptual framework.

Questionnaire design

A preliminary version of the questionnaire was developed in English on the basis of past research and insights from the in-depth qualitative interviews. The measures were translated next into the local language (Bangla) and retranslated until it was agreed by a panel, fluent both in English and Bangla, that the two versions were reasonably comparable. Scale items were rated on seven-point Likert scales in a structured format. Each item was anchored at the numeral 1 with the verbal statement 'Strongly Disagree' and at the numeral 7 with the verbal statement 'Strongly Agree'. This format has been recommended for health care surveys (Elbeck 1987; Steiber 1989). Multiple items were used to establish appropriate measurement properties (reliability and validity) of the selected constructs. The questionnaire was pre-tested several times to ensure that the wording, format, length, sequencing of questions, and the range of the scales (5-point vs. 7-point) were appropriate. At each successive pre-test, feedback was obtained from approximately 10 hospital users. Such feedback was instrumental in refining the quality of the measures.

Sampling and data collection

Because of resource and time constraints, and the preliminary nature of this investigation, only 300 interviews were planned from Dhaka city alone. To obtain a probability sample, considerable effort was devoted to selecting the appropriate sampling plan. The population was defined as residents of Dhaka city who had utilized hospital services in the past 12 months.

In the absence of lists from which a random sample could be drawn, stage-wise area sampling was combined with systematic sampling so that every hospital user in Dhaka city had an equal chance of being selected. Firstly, 17 residential areas were randomly selected from a generated list of all major residential areas in Dhaka. The selected areas included Motijheel, Purana Paltan, Kamlapur, Lalbagh, Gopibagh, Imamganj, Dhanmandi, Mohammadpur, Lalmatia, Mirpur, Gulshan, Banani, D.O.H.S, Uttora, Mohakhali, Rampura and Malibagh. There was general consensus that these areas included different socioeconomic groups of hospital users.

From each area, streets were randomly selected. Residential homes were chosen next using systematic sampling. Interviewers were also given a letter of introduction from a well-recognized private university so residents could see that the study was authentic. Finally, a telephone number was provided for respondents with questions or concerns.

Several difficulties were encountered during data collection. For example, not all of the selected households had a member who was hospitalized in the past 12 months. Other households did not grant interviews because, being unfamiliar with research, they were suspicious about the purpose of the study.

Due to time and resource constraints, interviewers who were not able to complete the required number of surveys were given a second option of obtaining a probability sample. They were asked to go to busy population centres in the 17 selected areas and concentrate mainly on shopping areas, and private and government offices. With permission from these establishments (where necessary), respondents were again selected using systematic sampling. Those who agreed to be interviewed were informed of the purpose of the study and assured anonymity. After a quick screening question on respondents' use of a hospital in the past 12 months, interviewers proceeded with the survey questions. Approximately 11% of the total sample was obtained from these population centres.

A total of 216 surveys were completed. Additional data collection was not pursued due to severe time constraints. Of the total number of completed surveys, nine were considered problematic due to excessive missing data, 'don't know' or N/A answers, and response biases. The data from these surveys were not included in the data set. Thus, a total of 207 surveys were analyzed: respondents indicated visiting 57 hospitals and clinics in the area.

Analyses

Several data analysis techniques were used. Frequency distributions were obtained to check for data entry errors (e.g. unrecognized or missing codes) and to obtain descriptive statistics. The measures of service quality were factor analyzed: the five factors were clearly extracted using varimax rotation; they explained 69% of the cumulative variation. To assess the validity of the measures, the multiple items measuring each construct were further factor analyzed. In each case, the items always loaded on one factor, lending support to their validity. Each factor was also assessed for reliability (using Coefficient alpha). The value of the reliability coefficient always exceeded the value of 0.8, which exceeds the 0.7 value recommended by Nunnally (1978).

To compare the quality of services between private and public hospitals, multiple analysis of variance (MANOVA) was used to test for significant group differences because of multiple correlated dependent variables (i.e. service quality factors). This procedure is used to control for the inflated Type I error rate that can arise from using a series of *t*-tests by providing a single overall test of group differences across all dependent variables at a specified α level.

Finally, two-group discriminant analysis (DA) was used to determine the following: whether service quality ratings (along with education and income) predicted choice of hospitals; which of the factors accounted most for the differences in the average score profiles of the two groups; and how reliably could individuals be grouped as users of public or private hospitals on the basis of the service quality ratings and selected demographic factors. It may be noted that combining MANOVA and DA is useful because if the overall test of group differences using MANOVA is significant, DA can help determine the direction and intensity of each criterion variable's impact on the overall group differences (Darden and Perrault 1975; Dant et al. 1990).

Results

Of the 207 responses, 191 cases were used in the MANOVA and discriminant analysis procedures (16 cases were not included because of missing data). Of these, 91 respondents reported using a public hospital, while the remaining 100 used a private hospital or clinic.

Descriptive statistics

Descriptive statistics are provided in Table 1. The mean scores indicate that the service quality ratings of public and private hospitals are generally near the mid-point of the scales. Clearly, patients are not enthused about the services they are receiving; both types of hospitals need to upgrade service quality standards substantially to be perceived as better than average.

MANOVA

The conjecture that private hospitals would be rated better on service quality than public hospitals was tested next. The

Table 1. Descriptive statistics on service quality factors of public and private hospitals, Dhaka, Bangladesh

Variable name	No. of items	Coefficient alpha	Overall mean	Standard deviation
Responsiveness	6	0.91	4.53	1.39
Assurance	6	0.90	4.97	1.14
Communication	4	0.85	4.84	1.49
Discipline	6	0.92	4.52	1.47
Baksheesh	2	0.90	4.21	1.95

Table 2. MANOVA tests of group differences between public and private hospitals, Dhaka, Bangladesh: multivariate and univariate tests

Variables	*F*-ratio	Significance p <	Group means	
			Public	Private
Responsiveness	16.19	0.000	4.20	4.96
Communication	11.67	0.001	4.63	5.30
Discipline	19.20	0.000	4.09	4.97
Baksheesh	0.73	0.393 (ns)	4.35	4.11
Assurance	1.86	0.175 (ns)	4.93	5.15
Education	4.96	0.027	3.04	3.48
Income	12.25	0.001	3.13	4.33

n = 191 (16 cases rejected for missing data).
Battlett's test of sphericity = 448.82 with 21 d.f.; $p < 0.001$.
Multivariate tests:
Pillais 0.211 exact $F = 7.01$ $p < 0.001$
Wilks 0.788 exact $F = 7.01$ $p < 0.001$

results of MANOVA are provided in Table 2 and indicate that the multivariate *F*-ratio is significant ($p < 0.001$), rejecting the null hypothesis of equal group centroids. In other words, there are significant overall group differences in the service quality ratings of public and private hospitals. When the overall test of group differences is significant, it is appropriate to conduct univariate ANOVA procedures. The univariate *F*-tests in Table 2 indicate that there are significant differences on three of the five service quality ratings and on both demographic variables. The group means are provided in the last two columns.

It is interesting to note that on two factors – assurance and baksheesh – the ratings for the two groups are not statistically different. The first of these non-significant differences could, perhaps, be explained by the fact that many hospital staff (especially doctors) who work for the public hospitals are also affiliated with private hospitals. Thus, it is not surprising that there are no significant differences on these variables.

On the propensity to seek baksheesh, however, it is surprising to find no differences between public and private hospitals. Perhaps this reflects the general social malaise that pervades the context of transactions: people simply do not expect to get due services without paying baksheesh, whether the services are sought in the public or private sectors (we do not intend to generalize here for all service sectors). This malaise may be rooted in the fact that demand for health care services often exceeds supply; if services received are not reciprocated by some form of baksheesh, patients may be jeopardizing future care and assistance. This situation is a clear market signal to build additional health care facilities in the country. Otherwise, patients will continue to be held hostage by the limited number of health care providers.

On responsiveness, the results indicate that private hospitals are perceived as more responsive than public hospitals. Similarly, on communication and discipline, private hospitals obtained a significantly higher rating than public hospitals. These findings seem to support the contention that private hospitals have a greater stake in responding to and communicating with their patients to earn their confidence and patronage. However, we also note that while the difference between private and public hospitals is statistically significant on these three service quality measures, the mean scores indicate clearly that both types of hospitals have significant room to improve: on a 7-point scale, their scores generally lie near the mid-point. Thus, there is much room for both types of hospitals to improve quality of services.

Discriminant analysis

A discriminant function was estimated for the two groups – those who selected public hospitals and those who selected private hospitals (see Table 3). The canonical correlation associated with this function is 0.4732. The square of this correlation is 0.2239 and indicates that 22.39% of the variation in the type of hospital selected is explained by this model.

To test for the significance of this function, the Wilks' λ statistic was examined. The value of Wilks' λ is 0.7760 which transforms to a chi-square of 46.787 with 7 degrees of freedom ($p < 0.0001$). This indicates that the model is significant and explains patients' choice of public or private hospitals.

The relative importance of the predictor variables was determined by examining the structure correlations, also called canonical loadings. The results suggest that discipline is the most important predictor that discriminates between the two groups followed by responsiveness, income, communication, and education. Assurance and baksheesh are the least important predictors; this is supported by the MANOVA results where no significant differences in ratings were found for assurance and baksheesh.

Since statistical tests do not indicate how well the function predicts, the classification results (see Table 4) were examined: 70.16% of the cases were correctly classified. Since it has been suggested that the classification accuracy achieved by discriminant analysis should be approximately 25% greater than that obtained by chance (Malhotra 1996), the model seems to have satisfactory predictive power.

Table 3. Discriminant analysis results: use of public or private hospitals, Dhaka, Bangladesh

Variables	Wilks' λ (U statistic)	
	Wilks' λ	Significance
Responsiveness	0.9211	0.0001
Assurance	0.9902	0.1747 (ns)
Communication	0.9418	0.0008
Discipline	0.9077	0.0000
Income	0.9390	0.0006
Baksheesh	0.9961	0.3927 (ns)
Education	0.9744	0.0290
	Structure matrix (canonical loadings)	Unstandardized canonical discriminant function coefficient
Discipline	0.6153	0.5989
Responsiveness	0.5651	0.3421
Income	0.4917	0.1651
Communication	0.4798	0.2517
Education	0.3129	0.1548
Assurance	0.1913	–0.6994
Baksheesh	–0.1203	0.1868
Constant		–3.9284

Canonical correlation 0.46.
Wilks' λ 0.788.
χ^2 (with 7 d.f.) 44.08 $p < 0.0001$.

Table 4. Classification results: use of public or private hospitals, Dhaka, Bangladesh

Actual group	Cases	Predicted group	
		Public	Private
Public	91	58 (63.7%)	33 (36.3%)
Private	100	24 (24.0%)	76 (76.0%)

Percentage of 'grouped' cases correctly classified: 70.16%.

In non-statistical terms, MANOVA results supported the premise that service quality will be rated better at private hospitals than in public hospitals. This support was evident for three of the five service factors. The discriminant function identified discipline, responsiveness, and income as the three most important factors that accounted for the type of hospital chosen. Finally, the model's hit ratio indicated satisfactory validity by being able to classify 70.16% of the grouped cases correctly.

Conclusions

The premise of this paper was that market incentives would explain differences in the perceived quality of services provided by public and private hospitals. This contention was reasonably supported: private hospitals were evaluated better on responsiveness, communication, and discipline. By responding to these needs, hospitals in Bangladesh can improve their image and be perceived more favourably. These results also suggest that service quality can be improved in the health care sector by gradually exposing the hospitals to market incentives. It is important, especially for public hospitals and regulatory agencies, to understood how market incentives work. With better understanding and over time, public hospitals may be gradually weaned from their present survival guarantees that do not seem to motivate them to enhance service quality; such guarantees are also not available to private hospitals.

It is apparent from the results that private hospitals are playing a meaningful role in Bangladesh, justifying their existence, continuation and growth. However, before unleashing the forces of privatization in this sector more widely, it must be noted that private hospitals have been known to reduce quality by reducing inputs, to disregard social pricing considerations or, worse, to try to increase their profits by providing services that are unnecessary or even harmful (Van der Gaag 1995). This therefore needs careful consideration.

The results suggest that quality perceptions are driving many patients to private hospitals (e.g. the sample of this study shows that a greater proportion of patients are seeking private care). It is disquieting to note, however, that because quality levels are still not where patients would like them to be, many patients who can afford it are seeking treatment alternatives in other countries. Not only does this burden the nation's foreign exchange resources; customers seeking health care abroad have also been known to suffer collateral miseries that are associated with travel, accommodation, meals and related needs. For any major mishap necessitating a longer stay than originally planned, these inconveniences could easily be magnified several-fold.

To alleviate these problems, it is imperative that the quality

challenge is addressed vigorously and methodically in Bangladesh to better meet the needs of patients. To do so, in addition to market incentives, it is proposed that four other incentives be considered to promote higher quality in hospitals in Bangladesh. These include competitive, social, internal and regulatory incentives.

Competitive incentives may be introduced by the Government by encouraging controlled growth of the private sector and by inviting foreign capital and expertise so that new technology and modern managerial practices with their attendant efficiencies are introduced in the country. Local hospitals and health care professionals would be better off emulating these practices to ensure their viability, thereby upgrading the quality of health care services in the country.

Social incentives can also enhance and upgrade service quality. For example, some form of public dissemination of information must be envisaged to focus on the extent to which service quality standards are being met by the hospitals. In developed countries, evaluation systems have evolved that rank or rate organizations (such as banks, mutual funds, insurance companies, etc.) as well as a variety of products and services (through Consumer Reports etc.). Similar ranking or rating mechanisms could be established in the health care sector and, initially at least, the prominent hospitals (public and private) periodically evaluated. As the rating system evolves, other hospitals could be gradually included in the set. The rating responsibility should, realistically, be borne by some independent agency comprised of health-care professionals and technical analysts.

These evaluations should then be widely disseminated through information centres, public awareness campaigns, media participation and a variety of accessible and easy-to-comprehend literature. When health care customers are able to make more informed choices based on the evaluations, it is likely to provoke those hospitals that earn a poor rating or ranking to improve service quality. Those hospitals that earn low ratings consistently should be targeted by regulatory agencies for appropriate action. The social incentives of being rated low should also serve to foster a competitive environment for better ratings among hospitals, especially when they are held up to public scrutiny. To this purpose, this study has attempted to establish relevant criteria along which hospital service quality could be periodically evaluated to determine whether the overall quality of service in the two sectors is improving or deteriorating. When the evaluations are widely disseminated, their impact should be felt not only on patient satisfaction ratings but, eventually, also on the level of foreign exchange outflows that are tied to patients seeking health care services abroad.

Internal incentives must also be structured to motivate health care staff to deliver the desired standards of service. One solution is to tie a part of their compensation to services rendered and the feedback received from patients. This, of course, is a complex issue especially for public hospitals where health care staff, as government servants, are bound by certain pay structures. While beyond the scope of this paper, it is felt that employees in private or public hospitals should be compensated on the basis of performance. Where compensation adjustments cannot be legally made in the short run, other benefits including promotions, transfers, training, study leaves, etc., could be tied to performance evaluation mechanisms that need to be tightened and fine-tuned. It may also be important to completely bar public health-care personnel from involvement with the private sector. Those who pledge their allegiance to the incentives of the private sector should not have to be cushioned by the taxpayer.

Finally, regulatory incentives can be designed to reward (through lower taxes; substantive grants for infrastructure, research, and other developmental activities; or allocations to hospitals from a resource pool on the basis of performance) or punish (through fines, negligence laws, foreclosure, etc.) hospitals that are benchmarked and compared periodically on the basis of established criteria and standards. Such incentives should also be carefully thought through in the overall context of the evolution of health care delivery in Bangladesh, and revised and upgraded over time.

At any stage of the process, when the appropriate combination of incentives are designed and applied, we believe it will encourage a variety of activities including training, CQI (continuous quality improvement) and TQM (total quality management), organizational renewal, restructuring, six sigma programmes and other innovations that have served proactive organizations well in other countries. It will also be important to monitor the extent and direction of change in the overall quality of services in the hospitals. Such oversight measures should provoke the pride and professionalism of the country's health care providers to deliver what patients have long expected from them; when this happens, the neglected health care recipient is likely to get a better deal.

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