The Role of Implementing Total Quality Management in Improving the Performance of Public Hospitals in the Kingdom of Saudi Arabia

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#### **Abstract**

#### 1. Introduction

During the last few years, both private and public industrial organizations became increasingly interested in the total quality management (TQM) approach. In private business, it was realized that the customer-oriented quality improvement will largely contribute to the development of better products as well as reduce cost. This happened with the Japanese industrial "miracle" shortly after the Second World War. Consequently, many companies, especially in United States, feared their inability to compete with the high-quality products which the Japanese were exporting, ultimately losing considerable market sectors. The possible reasons for the Japanese success were investigated. One main conclusion was that a different approach was followed during the production process focusing on the product as well as on the customer. So it was soon

realized in the western world that new forms of management techniques were needed to tackle the Japanese challenge.

The interest of the public industrial organizations in TQM followed that of the private business. It was argued that public goods must be of better quality and offered service more effectively than other regular goods or services. Therefore, the industrial products although of public nature, are still product of industrial production process; public sector organizations will in turn develop further effort to improve products as well as services. It was also realized that the public industrial organizations were suffering from increasing demand of "customer" products and service, often substandard, argued that in the Mecca Region there are further justifications leading to the promotion of TQM implementation. Even through the official government approach, many public organizations will have to follow the initiation of the leading firms. The government has communicated its intention to overhaul the public system and to obliterate any trade barrier. The overall concept behind these efforts is that Saudi organizations must be prepared to compete worldwide.

#### Methods

This study uses data from a national cross-sectional survey of employees in healthcare organizations in the Kingdom of Saudi Arabia to investigate the role of implementing Total Quality Management (TQM) in improving the performance of public hospitals. This paper investigates the association between implementing TQM and performance improvements for eight categories of performance of public hospitals: efficiency, access, workforce engagement and well-being, satisfaction of patients, quality of care, safety, fear of whistleblowing and job satisfaction. The findings show that the action of implementing TQM in the public hospitals of Saudi Arabia is associated with substantial performance improvements in the categories, including satisfaction of patients with a ratio of average treatment of 0.346 and access (open about consulting doctors in non-emergency hours) with a ratio of the odds that the perceived problem has been solved of 3.725. However, the action of implementing TQM has negative associations with the improvement of job satisfaction (satisfied with salary/wages) with reductions of 0.421 and workforce engagement and well-being (propensity to examples of an official of the management team communicating with staff about individual performance) with a ratio of average response of 0.246.

#### Conclusion

There is no doubt that Saudi Arabia's economic transformation has been undertaken at a time when the global economy and the modern technological base is undergoing profound changes.



The major implication of this transformation for the Saudi industrial base, and subsequently, the Saudi economy is that it would take place in a rapidly evolving global market, characterized by technological changes which are occurring at a highly accelerated rate and result in dramatic shifts in the pattern of international trade (Aljodea, 2012). The availability of a skilled and flexible labor force is it must if this technological windfall to be effectively exploited, and increasingly it is the employment aspect of the new technology which is seen as crucial. The necessity for high qualifications in the workforce is a vital factor, as are continuing opportunities for vocational reorientation as unremitting retraining as technology continues to progress.

The relationship between technology upgrade and the workforce is a complex one, conditioned by industry-specific factors, patterns of ownership, cultural and educational legacies and the degree of development of industrial infrastructure. However, from a Third World policy perspective, the writings on technology use underline the centrality of the workforce. While the acquisition of technological packages, including machinery, is important, they represent merely a potential, whose ultimate realization is strongly related to a number of far more qualitative policy decisions concerning the social structure and nature of the labor force, the educational system, the complementarities between formal and peripheral economic activities, and the social capital of the country.

## 2. Total Quality Management (TQM) in Healthcare

Total Quality Management (TQM) is a theory of management, which is new to industries but well known to academics since the 1920's. Its main objective is growth of productivity combined with improvement in quality based on scientific methods (Aljodea, 2012). TQM provides a model of sustainability that can move industries towards treatment of workforces and capital as essential for methodologies of management. Major concepts of TQM have been identified in organizations and the importance of soft elements for enhance the performance of TQM have been discussed. The model development is based on upper level constructs of the Malcolm Baldrige National Quality Award (MBNQA) framework, which has been rigorously validated. The findings provide a useful reference for industries trying to improve their performance, and students striving to understand business management.

Business must respond properly to worldwide competition and customer demands, because business life has been influenced by lean production, fewer resources and flexible working times. Healthcare industries consider the customer and client as essential. The concept of healthcare in Saudi Arabia has not changed in the past years due to a lack of scientific methodology in hospitals. TQM as a theory of management provides a scientific methodology that influences

healthcare over the long term. TQM is a modern management theory that is based on quality principles. It has been successfully implemented in the industrial sector. TQM provides a model of sustainability that can move healthcare into the new era, where workforces and capital are essential (Sowmiya Badhurudheen, 2018).

# 2.1. Concepts and Principles of TQM

Total Quality Management (TQM) has become a global phenomenon. Organizations attempting to achieve quality superiority through TQM are now introduced to the techniques used, and questioned. The purpose of this paper is to identify the concepts and principles of TQM that are essential to alleviating the performance problems of public organizations, particularly, the public hospitals in the Kingdom of Saudi Arabia (Aljodea, 2012). Public hospitals are considered a major social service institution within the unique political, cultural and national context of Saudi Arabia. Developing an organizational culture in public hospitals that fosters teamwork ensures employee involvement and works in partnership with the community. Strengthening the accountability of public hospitals to that community is necessary to secure TQM implementation. Because TQM starts and ends with the client, the focus will be to review the frameworks used in the private sector as a guideline to alleviate the problems of implementing TQM in the King Saud Bin Abdul-Aziz University for Health Sciences; a unique public hospital, the first health university hospital in the country.

Public hospitals all over the world, including Saudi Arabia, are experiencing increasing needs relating to health service and, simultaneously, limited resources. Research and practical experiences studying the implementation of TQM in the public hospital economies touched on three areas of concern: (1) public hospitals implementing TQM generally has not been entirely successful; (2) TQM should be customized to match the nature of public health institutions. To ensure success, understand the environment in which the public hospitals operated and adjust the TQM programs to this need; and (3) since KSAU-HS, a public service provider in the health field, has various characteristics that differ from those present in the private sector; it is essential to understand how TQM should be implemented in such organizations.

### 2.2. Benefits of TQM in Healthcare

Businesses operate in a dynamic and competitive environment internationally, and policy makers can assume that it is necessary for businesses to adopt up-to-date processes and methods of management in order to increase efficiency and competitiveness. In Saudi Arabia, as in many other countries, organizations are using TQM to improve competitiveness, since the international competitiveness of the Kingdom's industries and businesses has become a priority due to

globalization (Aljodea, 2012). Public hospitals, as part of the healthcare sector in the Kingdom of Saudi Arabia face the challenge of providing high-quality services and meeting the needs of patients in the face of a challenging economic environment. Accordingly, the introduction of TQM in public hospitals is a way of improving the performance of hospitals, especially in the functions of effectiveness, efficiency, and the quality of health services.

Medical practices have a distinct environment and have come under growing pressure from patients and the government to adopt quality-based practice management. TQM has been cited as a tool, and it is rapidly being adopted around the world by providers of health care as a way of improving the quality of health services. TQM embodies a management approach based upon the satisfaction of consumers and the continuous improvement of quality, attempting to control the costs incurred in the struggle to ensure the quality of services (Sowmiya Badhurudheen, 2018). Major principles of TQM are leadership, employee involvement, supplier partnership, process and fact goals, planning, and continuous education. These principles focus on customer service. Therefore, these hospitals are being forced to find sources for new techniques to adopt in the potential setting of the Arabian culture that improves services and could deliver a competitive advantage to their organization.

### 3. Performance Evaluation in Public Hospitals

Public hospitals in Saudi Arabia have been perceived to perform inadequately in terms of their services. The National Transformation Program 2020 and the Saudi Vision 2030 have identified health care as a focus sector that needs improvement and reform to achieve significant development of both social safety and economy development. Enhancing public hospitals' performance is considered one of the key tools driving the sector transformation, and Total Quality Management (TQM) is employed as the strategic means to achieve the objectives.

Saudi Arabia's healthcare system comprises of two sectors: government hospitals or public hospitals, and privately owned hospitals or private hospitals. This study focuses on public hospitals. Since the TQM movement began in the early 1980s (Aljodea, 2012), performance evaluation has been extensively applied in public hospitals. A lengthy history of performance evaluation in public hospitals is observed, having noteworthy implications for the management and administrative policies of such hospitals, as well as for the advancement of the public hospital context (Salman Alsharari et al., 2017). Several insightful findings have been presented in the literature about the present conditions of performance evaluation in public hospitals. This paper will review the outcomes of studies concerned with performance evaluation in public hospitals and the ensuing current problems as grounds for the focus of this study. Finally, a

superior and more detailed assessment of hospital performance appraisal will be proposed in response to these issues, together with recommendations for an effective design.

## 3.1. Key Performance Indicators (KPIs)

Several studies have been conducted on the performance of public hospitals in Saudi Arabia, but the results are not satisfactory. The performance of public hospitals in Saudi Arabia is generally poor and does not match the level of economic growth and government investment in the health care sector in recent years. Challenging conditions and poor performance characterize many public hospitals' life. Consequently, the quality of their services is low, and they are unable to meet the requirements of the people. These hospitals supply insufficient services to patients and utilize resources wastefully. In public hospitals, the cost of management per patient is higher than that in private hospitals. In this challenging context, the concept to measure the performance of public hospitals has been increasingly explored.

In industrialized countries and in several developing countries, public hospitals seem to serve as the linchpin for assuring access to medical care. The abundant allocation of resources to public hospital construction and stagnating or reduced health budgets sometimes reveal this rather ambivalent attitude. In consequence, public hospitals are under pressure to improve their performance and be increasingly responsive to market needs. In many countries, reforms in the hospital sector have been significantly focused on increasing efficiency and effectiveness, regulating private providers and promoting cost recovery. Government objectives are based on drastic changes in both regulation concerning private and public providers. This growing focus on hospital performance is related to many factors such as demographic changes, technological advancements, resource pressures, increasing public demand and expectations, lack of health care insurance or limited access to care. To address these challenges, a range of national and international programs have been initiated to reform the health sector, improve the performance of institutions and health care providers and enhance the quality of health services (Aljuaid et al., 2016). Public hospitals in Saudi Arabia are the largest group of hospitals that provide secondary or tertiary level care in the community. Two studies emphasize how the provision and quality of care within these hospitals need to be monitored. Relying only on the information of the annual system, the analysis may not capture the complexity of the performance evaluation concept.

### 3.2. Challenges in Performance Evaluation

Total Quality Management (TQM) is about having tools and techniques that help in the alleviation of these challenges, thus enabling organizations to continuously improve their outputs to better meet customer needs and requirements. As the Kingdom of Saudi Arabia is now in the

process of buying-in to the global economy, and it is now widely admitted within the Kingdom that the consumer is no longer prepared to put up with low quality products, this system of industrial philosophy would appear to be an all too fitting recipe to break out of the many vicious cycles now binding the largely under-performing Saudi industrial sector. But difficulties and bureaucratic obstacles have apparently arisen which need to be correctly diagnosed and subsequently remedied before TQM, which has already proven itself highly effective in certain narrow precincts within the Saudi industrial realm, can be made to manifest wider utility throughout the wider Saudi industrial forum (Aljodea, 2012).

At issue here is the ''fit'' between the eternal Islamic social and political reality of Saudi Arabia and the otherwise universally valid accord tenements of TQM, or (at least) the problem in applying that accord. In the event that Saudi Arabia is ready to embrace on an unhedged basis TQM precepts, the 'fit' may still not be right); that is, TQM as it stands may still be greatly at variance with the natural, everyday reality of most Saudi industrialists and entrepreneurs. To approach that issue, one needs to have disaggregated a few salient, easily apprehensible precepts of TQM first.

# 4. Case Studies of TQM Implementation in Saudi Arabian Public Hospitals

- 1. In-depth interviews of individual nurses were used to analyze the status of unfamiliar cultural aspects of nurses and their standard TQM abilities and awareness skills for the designed structured questionnaire. The six scales were derived to guarantee their consistency, namely participation, teamwork, benchmarking, management interest and benchmarking ability, and training. As a typical social analysis, the Generalized Linear Latent and Lineal Mixed Technique Models are also used to detect the potential obstacles of the quality of general health workers in public hospitals. Continuous staff preparation is also seen as important theoretical implications, obstacles, and possible ways to achieve all quality management practices.
- 2. In interviews with a Manager, top-level management plays a key role in initiating and setting long-term policies for TQM, including the introduction of management representatives or coordinators. External quality evaluation of implementation of full quality of domestic service provides comprehensive feedback, including regular and fairness advice on all nurses. Relevant guidance, support, and training are provided by external experts. Managers should also follow up to verify the implementation site and monitor TQM activities. Smooth communication systems and full management support of the hospital will improve the positive reaction of the full quality of TQM throughout the hospital. However, excessive workload decrease in motivation was

obtained. For details of this, and for relevant comparisons, see the remainder of the text including the statistical review.

## 5. Recommendations and Best Practices for Successful TQM Implementation

Introduction: Public sector organizations around the world, especially in the developing countries in general and in the Kingdom of Saudi Arabia, in particular, continuously search for a way to help improve their performance through cost-cutting, better training, and reorganization. Concern about how public sector organizations are managed and delivering their service has been a head of discussion for both the mass media and scholarly publication in the western countries since years. This management crisis is marked by a deficit of services in terms of quality, timeliness and cost. Total quality management (TQM) has emerged in the western world as a technique to confront this crisis and a debate has developed in the literature about TQM as a panacea for public sector organizations' mismanagement (Aljodea, 2012). The words used by public organizations are changing, with quality assurance and world class services two of the most popular phrases and with the latter often articulating a challenge to the privileged position of the private sector. Performance is no longer in terms of amount spent, but is rather framed as a resolve over efficiency and effectiveness. By stressing continuous improvement, which emphasizes that there are no limits to improving quality, TQM could be an alternative, less painless way, to start this debate in public hospitals. Consequently, it could be expected that the language in management in public hospitals would also change, in that some of the principles and ideas of TQM would be evident. Moreover, the discussion of performance would also move towards a more mythical lens and the introduction of business management techniques would be considered.

#### 6. Conclusion and Future Directions

Total quality management (TQM) is a management philosophy that uses methods, tools, and techniques to control quality in every system and process of an organization to increase customer satisfaction and help in achieving overall objectives. The main ingredients for successful TQM implementation are trust, communication, and, most important, leadership. Trust is important in social interaction for creating a homelike atmosphere. Communication is essential in conveying all programs to all workers. Leadership is the first step in implementing TQM successfully. Other factors include vision, mission, strategic planning, and cross-functional training. (Kalogiannidis, 2021)(Alshourah, 2021)(Permana et al.2021)

Public hospitals in Saudi Arabia suffer from poor performance. The reason is lack of quality care and service. Total quality management can play a significant role in improving public hospital

performance by focusing on the structure, process, and outcome of care. The main mechanisms for improving performance are continuous improvement and Six Sigma. Various actions can be taken to implement TQM in public hospitals properly. For example, a clear vision should be formed by top management to show the primary objectives and targets of TQM. This vision would make a roadmap to guide lower and middle management. Middle management must share this vision among all workers. Therefore, team building is necessary. TQM implementation requires that structure, job design, resources, training, culture, output orientation, measure capacity, output of OT, and hospital efficiency monitoring be considered. Furthermore, motivation, support, communication of the vision, involvement, empowerment, reward, leadership, trust, Kaizen, and the outputs of OT should also be considered. Last, SP and expected service should monitor efficiency periodically to keep track of the results of TQM implementation.

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