# **Chapter 1**

# Introduction

Although evaluating projects in general is very important area, it is largely neglected in the Palestinian organizations including the Ministry of Health (MOH). Indeed, evaluation of projects is needed to improve, monitor and enhance the proper utilization of project implemented at the MOH which till recently constitute a large contribution in the MOH funding. One of the large projects implemented at the MOH is the quality improvement project-the focus of this study.

In 1994, the MOH established "The Quality of Healthcare Unit". This Unit was one of ten central units created by the MOH in order to develop plans for the purpose of sustaining and improving the existing healthcare system. During 1994 - 1995, the Quality of Healthcare Unit drafted its strategic and operational plans which were then discussed in six national sensitization workshops. Recommendations and suggestions were gained from 150 health professionals who actively participated in the workshops. Following that, the MOH established the Quality Improvement Project (QIP). Funding for the QIP was received from the World Bank Education, Health and Research Project (WBEHRP). The professional responsibility of this team is to implement the quality improvement strategies developed by the Quality of Healthcare Unit. The QIP in the MOH has defined its overall goal as "Attaining the highest possible level of quality of healthcare in Palestine".

As mentioned later on, a lot of activities were organized and carried out through this program but the question remains to what extents does the project achieve its goal particularly in term of sustainability, the focus of this study?

#### **Rationale of the study:**

Although evaluation is an important concept, it is not highly considered at the MOH in managing projects. Projects management and its evaluation are badly needed for the development of the Palestinian Ministry of Health. As the QIP project nears completion, it is a good opportunity for those involved in the project to take stock of what has been learned and to document this learning. Evaluating the performance of this QIP project will help to analyze the strength and weakness and to develop plans to fill the remaining gaps.

After a 10-year of this project a lot of efforts been implemented, thus the Ministry of Health is in a crucial need of an evaluation of this efforts and this would be a good opportunity for the decision maker and the researcher to assess to which level the Quality Improvement Project has institutionalized into the MoH organization. Assessment the project sustainability will be closely linked with its relevance, because this is the question of whether the positive effect will continue in the long run. This also involves the cost factor.

Traditionally, evaluations were conducted to provide a "report card" on a project. Donor organizations still want a sense that they are getting value for the resources they have invested, but as development activities have evolved to become more holistic and multi-disciplinary (meaning that more partners and stakeholders are involved) and participatory approaches have become more common, institutions and projects no longer want evaluations to be imposed on them, recipient organizations and the communities involved in the research want to directly benefit and learn from evaluations as well. These trends have seen evaluations shift away from a tool for "control" to a tool that can empower organizations and contribute to organizational learning.

To sum up, this study is trial to assess to what degree this important project has met its intended activities particularly in sustainability and what are the remaining gaps in this regard that need to be fulfilled in future.

# **General Objective**

To assess to which level the Quality Improvement Project (QIP) met its objectives and the QA concepts and activities have been institutionalized into the Ministry of Health units.

## **Specific Objectives**

- To assess to which degree health providers and managers are aware about the concepts and practices of quality improvement.
- To examine to which degree the supportive policies, procedures and organizational structures required for quality improvement are in place.
- To ascertain to which degree the initiated quality improvement concept and practices were institutionalized of the MoH facilities.
- To provide a set of suggestions and recommendations for policy makers and providers that enhance the institutionalization of Quality Improvement

## **Research question:**

1. Are there differences in conceptualizing quality concepts and institutionalization across the different managerial levels?

- 2. Are there variations in relation to demographic characters and quality institutionalization?
- 3. Are there differences between primary and secondary health care in reference to institutionalization?
- 4. Are there variations in institutionalizing quality concepts and practices in reference to career related issues such as title, profession, years of experience,
- 5. Are there variations in institutionalizing quality concepts and practices in reference to organizational variables such as provision of training, availability of resources and availability of monitoring system.
- 6. Are there statistical significant relation between quality institutionalization and training?

# **Context of the study**

### **Background of Palestine**

Palestine has an important geographic and strategic location (Annex, 1). It is situated on the eastern coast of the Mediterranean Sea, in the Middle East. Lebanon boards it on the north and Syria and Jordan on the east and by Egypt and Mediterranean Sea on the west (MoH, 1998).

Palestinian territories have been under Israeli military occupation since 1967 until 1993, when peace agreement accord was singed between Palestinian Liberation Organization (PLO) and the Israeli government (MoH, 1998). Palestinian National Authority (PNA) territories compromise two geographically areas separated areas, the West Bank (WB) and Gaza Strip (GS). The Gaza Strip is a narrow piece of land (Annex, 2), bordered in the south by Egypt, on the west by Mediterranean Sea and in the east and north Israel. It is 46 kilometers long and (5-12) kilometers width with area of 360 square kilometers (MoH, 1998). Gaza Strip is administratively divided into five provinces: Gaza North, Gaza City, Mid-Zone, Khanyounis, and Rafah (MoH, 2000). West Bank lies within an area of 5,800 square kilometer west of the river Jordan. It is divided into four geographical regions. The north region including the district of Nablus, Jenin, and Tulkarem, the central region including the district of Ramalla, and Jerusalem, the southern region including the districts of Bethlehem, and Al Khalil districts and sparsely populated Jordan Valley including Jericho (MoH, 2002). Since of taking the responsibility for health in 1994 the (MoH) has challenged the huge requirement for human resource development to overcome the deficit of specialties and improve the abilities and competencies of health professional quality improvement of health care.

## **Demographic Context**

The Palestinian population is considered a young community and need good attentions to all aspects of life including health to maintain the high quality of productivity. This necessitates a well-qualified health team. So, CE education is needed and important for the Palestinians community to continually up date the working staff.

According to MoH (2005) the total Palestinian population size in Gaza Strip and West Bank is estimated at 3,464,550. In Gaza Strip about 1,261,909 (36.4%) of total population in Palestine are living. In West Bank residing about 2,202,641 (63.6%) of total population in Palestine are living. The population size in Palestine constitutes (37.6%) of all Palestinian people overall the world including those in Diaspora (9,209,773). According to United Nations Relief and Works Agency (UNRWA) Report (2002) the registered refugees is about 1,532,589, where residing in Gaza Strip about 893,141 (58%) of total refugees in Palestine, and 639,448 (42%) residing in West Bank. Refugees constitute much larger percentage of the population in Gaza Strip than West Bank 70.8%; 31.6% respectively. Most refugees still live in densely crowded refugee camps. Population pyramid (Annex, 3) shows that 46.4% of population is under 15 years old and in Gaza Strip 49.6% are under 15 years old, while 44.6% under 15 years old in West Bank. Average life expectancy at birth is 71.1 years for males and 72.6 years for females (MoH, 2003).

## Socioeconomic Context

Population density rate in the Gaza Strip is about 3,505 inhabitants per one square kilometer (MoH, 2003). The actual density rate is higher than the estimated figures due to the presence of Israeli settlements (MoH, 2003). In 2002 dependency ratio for Palestinian is about 101.6% (108 % for Gaza Strip and 92 % for West Bank (MoH, 2003).

Education is highly valued by Palestinian where the overall literacy rate is 84%, being much higher than in Egypt (51%) or Iraq (54%), approximately as in Jordan (86%) and Kuwait (88%) (MoH, 1998). Gross National Product (GNP) in Palestine percapita decreased from 1,938.6 United States Dollar (USD) in 1998 to about 1,771.5 in year 2000, while Gross Domestic Product (GDP) in year 2000 is about 4,450,8 million USD while in 1998 were 4,218,3 USD. GDP per-capita in 1998 was 1,540 USD and 1,484 USD in year 2000. The unemployment rate in Palestine is 25.5% (46.6% in Gaza Strip and 30.3% in West Bank), in year 2000 this rate is unstable due to political situation and closure of the Palestinian regions, cities and other constrains (MoH, 2002). Education is highly valued and perceived as important for Palestinian people. They consider it as investment and durable asset for them, where every thing may be lost home, land, sons, money...etc. while the education and qualifications cannot be lost regardless where they are (Abu Hamad, 2001).

# **Political Context**

Palestine was occupied since long time, Ottoman Empire (1516-1917), followed by British mandates since 1917 until the 1948. The creation of the state of Israel, and as results of Arab-Israeli war, thousands of Palestinian refugees scattered in many countries. After the 1967 war Israel occupied the rest of whole Palestinian territory (WB & GS), until 1993 where peace accord was singed between PLO and Israel after the first Intifada which was arisen in December 1987.

Due to current situations (Al-Aqsa Intifada), since 29 Sept. 2000, the Palestinians exposed to various kinds of Israeli violence, terrorism and collective punishment as dividing Palestinian regions and separates and isolates cities and villages and limiting movements and transportation between Palestinian cities. In addition to murdering and destruction of homes, land and agriculture.

During the Israeli occupation there was limited opportunities for developing the health profession and doing upgrading programs unless small courses in few specialties. There was no regulatory body for health profession taking the responsibilities for developing health education and practice (MoH, 1999).

#### Health Care System in Palestine

Compared to other countries at a similar level of economic development, the Palestinian population's overall health status is relatively good (World Bank, 1997). The infant mortality rate is estimated at 28 per 1000 live births, (62 in Turkey, 41 in

Egypt, 40 in Tunisia, 21 in Jordan and 7 in Israel) (MOH, 1999). The leading causes of adult death are similar to developed countries including cardiovascular disease and cancers with a high prevalence of stress and psychological trauma related diseases (MOH, 1999). On the other hand, diseases of poverty are still prevalent, such as respiratory infections and diarrhoeal diseases that remain important causes of child mortality and morbidity (MOH, 1999). The later conditions are due to a large extent, to the widespread poor sanitary and environmental conditions. For instance, only 35 percent of the households are connected to the sewage network (World Bank, 1997). Additionally, whilst, most of the Palestinian population has reasonable physical access to health facilities, effective financial access is constrained for the one half of all households, which is not covered by the government health insurance programme (World Bank, 1997). They must bear, out-of-pocket payments at the time of illnesses, the full costs of healthcare (MOH, 1999). Those mostly face financial difficulties in accessing healthcare (World Bank, 1998). However, the following paragraphs clarify the Palestinian healthcare system

In 1994, the newly formed Palestinian MOH inherited a fragmented, largely unregulated, pluralistic healthcare system from the Israeli Civil Administration (MOH, 1999). In fact, not only was the healthcare system generally under-funded, understaffed, under-supplied and under-equipped but also there was mal-distribution of human resources to the disadvantage of rural areas (PCH, 1997). The primary healthcare (PHC) settings were also at a disadvantage in comparison with the hospital settings. Additionally, Palestinian professionals' involvement in managing the health services at that time, was limited and most strategic issues, such as policies, budgets and promotions were maintained under the direct control of the Israeli Ministry of Defense, which negatively manipulated these issues in the Israeli's interests (PCH, 1994). It could be argued that, such a situation could be seen as affecting the Palestinian sense of autonomy, commitment and belonging to health organizations as well as affecting the Palestinians' ability to develop experience in managing their organizations.

However, currently, the four major players of healthcare services in the Gaza Strip are the Ministry of Health, the United Nations Relief and Works Agency (UNRWA), non-governmental organizations (NGOs) and the private for-profit service providers (MOH, 1999). The MOH is responsible for a significant portion of PHC, secondary care and some tertiary care (more than 50% of services were provided by Government) (PCH, 1997; MOH, 1999). Moreover, the MOH purchases tertiary services from other health providers both locally and abroad (MOH, 1999). UNRWA plays an important role in health services delivery, providing free of charge PHC and purchasing secondary and tertiary services for the registered Palestinian refugees (World Bank, 1997). Additionally, UNRWA contracts for services with NGOs, primarily for secondary and tertiary care and with some Israeli facilities for limited specialty for tertiary care (World Bank, 1997). Therefore, a significant challenge for the MOH is to facilitate co-ordination among these different service deliverers, to ensure rational use of scarce Palestinian resources available for the health sector (World Bank, 1997).

One aspect of the MOH efforts in this regard has been the initiation of a demonstration project involving the purchase of PHC services by the MOH from other providers mainly NGOs (World Bank, 1997). However, the researcher argues that such plurality could affect the identity and the regulation of the healthcare system.

An important issue currently emerging in almost any discussions about healthcare systems is the funding of health organizations. Given the transitional developmental status of the healthcare system in the country, many parties contribute in funding the Palestinian health organizations. International donors' contributions continue to be an important source of revenues for the health sector, with a shift of the main recipient of aid from the NGOs sector to the MOH (World Bank, 1997). Until recently, around 80% of donors' assistance is directed to capital investment and capacity building (MOH, 1999). In 1996, government spending accounted for about a third of the total expenditure, direct out-of-pocket spending accounted for about 40%, NGOs about 7% and external donors about 24% (World Bank, 1997). The large external contributions partially explain the high level of health spending related to the emerging trend of developing the healthcare system in the country. However, donors' contribution are not sustainable therefore, the concept of having a well institutionalized healthcare service can be seen at risk.

The MOH's reports point that many of the donors' projects did not positively affect the healthcare system and also were negatively perceived by Palestinian professionals (MOH, 1999). A clear example of that is the professional development training programmes, which have been offered sporadically, without conducting needs assessment and therefore, have failed to achieve their intended goals (Shaheen, 2000).

The Palestinian Authority devotes an unusually large share of its resources to health sector. In 1998, health spending was estimated at about 9% of Gross Domestic Product (GDP), which is usually more than most middle-income countries (MOH, 1999), which spend 4-5% of GDP (7 percent in UK, Denmark and Japan). Per capita health expenditure in US \$ is 100 a year (World Bank, 1997), in contrast with neighboring countries e.g. Egypt 30 and Turkey 105. Yet in the midst of this, there is

a discomfort among public, politicians and professionals in Palestine regarding the quality of healthcare and the work climate in health organizations (Massoud, 1994). It is worth noting that, the World Health Organization's health indicators in Palestine are similar or even lower than other countries spending remarkably less on their healthcare systems (MOH, 1999). There appears to be a general consensus that Palestinians are obtaining low outputs and that the degree of waste in the health system is large and highly indicative of inefficiency of the system (Massoud, 1994). In other words, there appears to be an over-investment leading to outcomes that are normally obtainable with less investment. Therefore, the answer to the problem of health services could be related to the process of delivery of healthcare not entirely to investing more, as some people have called for (Massoud, 1994). The problem of the system seems to dominate the big picture of the healthcare system in Palestine (PCH, 1997). Therefore, it is argued that many of the perceived problems in the system including employees' low morale, alienation and dissatisfaction could be related to the bad management of health organizations (Massoud, 1994; Al-Shubak, 1993). It seems that, the Palestinian managers failed to play their role in managing health organizations and failed to lead employees in a way that increases their productivity as well as increases their commitment and motivation to work (Misener, et al 1996; Massoud, 1994).

Massoud (1994) argues that many management factors are affecting the effectiveness of healthcare system in Palestine. According to Massoud, at the top of the list of these factors, is leadership in healthcare organizations (Massoud, 1994). Further, he claims that, this is probably the single most important management issue leading to poor performance. It is the exception, not the rule, when healthcare delivery is led by a strong visionary leader who is fully devoted to lead the organization and who has the relevant skills and authority to do so (Massoud, 1994).

Moreover, congruent with the general line of thoughts dominating the entire activities of the PNA, healthcare organizations are generally managed in a traditional fashion (PCH, 1994). Decision-making is judgmental rather than research or data based (PCH, 1997; World Bank, 1998). The system institutionalized in most organizations is perceived mainly as command and control system and reflected on predominant club culture organizations (Massoud, 1994; Handy, 1993). There is little workers involvement in the life of the organization. Information sharing and communications are usually very poor and team spirit is lacking (PCH, 1994). The culture of appointments, promotion or rewarding by connections, political affiliation or personal favors has grave consequences for the system. Furthermore, to a high extent, the healthcare system is influenced by a tribal and political culture (PCH, 1994). This culture affects decision-making processes in most organizations is a hindrance to both accountability and to placing the right person in the right place (Massoud, 1994). It is worth noting that many of the rules and regulations currently controlling Palestinian health organizations were made during the Turkish Rule and slightly changed by the subsequent occupations (PCBS, 1997). Thus, recent approaches in management are not yet utilized in Palestinian organizations. For instance, part time employment, age discrimination protection policy and gender discrimination protection policy are not currently existing (MOH, 1999).

An important issue that has been acknowledged by the literature for its positive influences on employees' motivation is the concept of human resource development (Senge, et al 1994; Wade, 1999). Although learning implies development, growth and change, it is a widely accepted concept in the healthcare system in Palestine that

professionals start off with much enthusiasm, hard work and good technical abilities when they are new in the system (PCH, 1994; Massoud, 1994). Overtime, adaptation to the organizational environment occurs and performance starts to deteriorate. Unfortunately, as human resources start to get "burn out", they are recognized by other colleges or by their managers, as having understood the "system" and now they have "matured" (Massoud, 1994). This is exactly the contradiction of management concept of developing people through work (Senge, et al 1994). This does not only affect organizational productivity but also employees' morale, commitment, alienation and most of all motivation (PCH, 1994; PCH, 1997). The literature indicates that a culture of excellence, which stimulates continuous life long development and learning organization, could be important factors in motivation to work (Senge, et al 1994; Massoud, 1994). Hence, such phenomenon dominating health organizations has guided the researcher to consider this issue in this research. Another commonly noticed problem encountered in the healthcare system, is the wide spread phenomenon of the blame culture, which is quite compatible with the dominant organizational culture (Massoud, 1994). The common response to any problem can be summed up in setting up a committee, which answers the question "who did what thing wrong" and penalizing him/her accordingly (PCH, 1997). The problem is linked always with people not the system (Massoud, 1994). Unfortunately, this neither solves a problem nor prevents its re-occurrence (Berwick, 1995). Such an organizational culture is hardly supportive to the employees who are already highly predisposed for work overload and stress (PCH, 1997).

Among the other features of the system, is the lack of an equal opportunity philosophy, which is not endorsed, in the conceptual framework of decision-makers and politicians (Said, 1995). Among the common noticeable forms of discriminations

are the political, tribal, professional and cultural ones (Massoud, 1994). Favoritism, nepotism and hypocrisy are alleged to be common features of the Palestinian health organizations (Massoud, 1994).

Most organizations within the healthcare system lack clearly defined organizational structures, which regulate the relationships among the people and departments involved (PCH, 1997). Functions, responsibilities, authorities of various managers and staff members are poorly defined, if at all (Massoud, 1994). Administrative and professional practice policies and procedures for the operation of the system are practically absent (PCH, 1994). Further, the concept and practice of the collaborative multidisciplinary team approach to the provision of health services is not part of the conceptual framework of key policy makers, managers and practitioners (Massoud, 1994). In addition, resources like staffing, hiring, firing, promotions, funding and so on are centrally decided upon and provided (MOH, 1999). Furthermore, the healthcare professionals are neither rewarded nor penalized for their performance. Their earnings are completely unrelated to their performance, therefore, competition among the same or different health providers is completely non-existent (Massoud, 1994).

## Quality Improvement Project (QIP) background

The Ministry of Health (MOH) has established the Quality of Healthcare Unit in 1994. It was considered as one of ten central units created by the MOH, it aimed at developing plans for improving the existing healthcare system. During 1994 - 1995, the Quality of Healthcare Unit drafted its strategic and operational plans which were then discussed in six national sensitization workshops. Following the mentioned workshops' recommendations, the Quality Improvement Project (QIP) has launched its activities by Funding World Bank fund 1n 1996. The QIP has defined its overall goal as: "Attaining the highest possible level of quality of healthcare in Palestine".

Achieving this goal encompasses two distinct parts: **Part one** is the health system reforms aimed at reforming the Palestinian health system in ways that stimulate and facilitate quality improvement. **Part two** is the quality of healthcare programme, which relates to the required activities necessary to improve the efficiency of the provider organizations. It comprises six functions: Leadership, Institution Building, Training, Social Marketing, Information System, and Productivity.

The QIP has identified the objectives and strategies for improving the quality of healthcare in Palestine. Consideration was given to changes in the external environment that can indirectly influence the implementation of quality improvement. The team first looked at the direct action elements of the external environment such as competitors, customers, labor supply and financial institutions. The team also looked at the indirect action elements of the external environment such as economic, technological, socio -cultural, political- legal, and the international variables. Following that a resource analysis was carried out showing the strengths and weaknesses of the Palestinian healthcare sector. The most important strengths were the availability of the financial coverage to implement quality management, a quality improvement effort led by a qualified and determined staff, the availability of technical assistance, a new leadership in the MOH, the current state of the infrastructure and tension in the provider organization. The most important weaknesses were the limited number of professionals who are engaged in quality improvement, the instability of the financial support and technical assistance, and the current structure which did not seem to support the monitoring and implementation of quality improvement. Also addressed were the opportunities available to the QIP and

the threats it faced. Among the opportunities were the high expectations of the Palestinian public, the present Palestinian culture, the instability of the existing health system, the opportunity to develop local trainers, and the present economic situation, which highlighted the need for quality improvement. Among the threats were the instability of the political environment, the degree to which the MOH was able to enforce regulations, the unsatisfied and demanding public, the instability of the current health system, and the degree to which trainers were available and adequate

Furthermore, the QIP carried out a field force analysis showing that in the journey from 'where we are now' in terms of the status of quality of healthcare to where we want to be in terms of achieving the QIP's overall goal, many elements will be moving the efforts either towards or away from the identified goal. The most important driving forces are the availability of financial coverage, availability of technical assistance, availability of qualified staff, national and international contribution, new leadership, structural redesign, a supportive culture and favorable economic situation. The most important restraining forces are a lack of coordination and integration, lack of public awareness, lack of reliable data, unstable financial coverage and technical assistance, a changing environment and the non- availability of trainers.

#### Study terminology

#### **Definition:**

For the purposes of this study, a number of terms are defined to be used in this study. The definitions are as follows:

**QIP Team members:** all team members who were participated actively in the quality improvement project at the MOH.

# **Definition of terms**

**Evaluation** is an assessment, as systematic and objective as possible, of an ongoing or completed project, programme or policy, its design, implementation and results. The aim is to determine the relevance and fulfillment of objectives, development efficiency, effectiveness, impact and sustainability.

#### Institutionalization

Is referring to the process through which a set of activities, structures, and values becomes an integral and sustainable part of an organization. Institutionalization means that people know what needs to happen to provide quality care, they have the skills to make it happen, and they are committed to making it happen over time within the available resources.

## **Quality of care**

It is refer to the proper performance (according to standards) of interventions that are known to be safe, that are affordable to the society in question, and that have the ability to produce an impact on mortality, morbidity, disability and malnutrition (Romer and Montoya-Aguilar 1988).

#### Leadership

Leadership is the ability to motivate and enabling people to achieve results amid challenges and uncertainties (Management Sciences for Health 2002). Leadership is critical for institutionalization of QA implementation requires a change in the way providers and managers work. In many places, health workers are demoralized after years of working with inadequate resources.

# **Chapter 2**

# Literature review

## Introduction

This chapter reviews the literature views about types of evaluations the different issues that could affect quality improvement and institutionalization.

This chapter begins with the definition of the different terms of quality in general and the essential elements for the institutionalization of quality assurance. Then, it moves to discuss what it takes to institutionalize quality.

## **Definition and Types of evaluations**

Evaluation is an ongoing process which should ideally be initiated during the development and planning phase of a project (Aspinwall, 1996). In any case, however, it is essential that the evaluation process begin as soon as the project goals and objectives have been established. Evaluation can be done either during the course of a project (e.g. when one of the critical phases has been completed) or after the completion of a project (evaluation of achievements and outcomes and of the project's impact).

Evaluation is generally understood as an assessment of amount or the value of something (Simkins, 2004). Evaluation is used in society at large, where there is a need to find out whether certain objectives been achieved, what effects a given measure has had, what the problem have been and whether the results stand in reasonable proportion to the effort involved (Pedler, 19960).

An evaluation is an assessment, as systematic and objective as possible, of an ongoing or completed project, programme or policy, its design, implementation and results. The aim is to determine the relevance and fulfillment of objectives, development efficiency, effectiveness, impact and sustainability (Willims, 2005). An evaluation should provide information that is credible and useful, enabling the incorporation of lessons learned into the decision making process of both recipient and donors.

#### **Common Evaluation Terms (Aspinwall, 1996)**

**Evaluation** - a way of measuring if a project is doing what it says it will do.

Goals - general statements of what an organization is trying to do.

**Objectives** - specific, measurable statements of what an organization wants to accomplish by a given point in time.

**Objective approach** - an approach which values the perspective, views and opinions of those outside of or distanced from the situation, event, organization, project, etc., as the primary basis for making an assessment or judgment.

**Informant** - in research and evaluation terminology, the person you interview or question is called the "informant".

**Impact or outcome evaluation** -gathers information related to the anticipated results, or changes in participants, to determine if these did indeed occur. It may also be used to test the effectiveness of a new program relative to the results of an existing form of service. An impact evaluation will tell you about the effects of a project.

**Process or formative evaluation** -an ongoing dynamic process where information is added continuously (typically using a qualitative approach) organized systematically and analyzed periodically during the evaluation period. A process evaluation will tell you how the project is operating.

**Quantitative approach** - an approach that tries to determine cause and affect relationships in a program. A quantitative approach will use measurements, numbers

and statistics to compare program results. The information that is found is considered "hard" data.

**Qualitative approach** - an approach that examines the qualities of a program using a number of methods. This approach uses non-numerical information - words, thoughts and phrases from program participants, staff and people in the community - to try and understand the meaning of a program and its outcome. The information that is found is considered "soft" data.

### Level of evaluation

In development aid, evaluation is carried out mainly at three different levels:

## At the upper-strategic level

Evaluation is carried out in relation to the overall, long-term objectives. This applies especially to the external conditions affecting development, to questions of resource allocation, and to what extent individual activities within the various partial objectives. Responsibility for this type of evaluation lies with political bodies and authorities.

#### At the tactical level

The focus is on resources and whether they are being employed in such a way as to have the desired effect –i.e. that the goals of project and programmes will be achieved.

Assessments at this level also concern such aspects as cost-efficiency and unforeseen impact of the project. Assessments of this type will normally be carried out by whichever body has the overall responsibility for management of the development aid.

#### At the operational level

Evaluation is carried out in connection with the implementation of individual projects and programmes, viewed in relation to time schedules and budgets. This has traditionally been done in the form of regular often yearly – reviews of development assistance projects. Country evaluation and thematic evaluation are different from evaluation of specific projects and programmes, and call for different approaches and methods. However, different types of evaluations are also closely linked in the sense that the evaluation of the totality must be based on an assessment of individual parts.

## **Quality Improvement**

There is an increasing focus on "quality" throughout all over the world. When talking about "Total Quality Management", "Continuous Quality Improvement", or any other name given to the quality movement, the common thread is meeting the needs of those who pay for and use the services and products provided by an organization. All types of industries, including health care, have lowered costs and improved the quality of their operations and products by working to meet the needs of the people they serve (Deming 1985).

The essence of QI is an organization-wide focus on meeting the needs of those who use and/or pay for health services. Effective quality management programs go beyond emphasizing one or two efforts or areas to improve performance. Every activity, every process and every job in health can be improved. Everyone within the organization can be given an opportunity to understand the QI program and their individual role within that effort. Improvement teams that include broad representation throughout the organization can help ensure success of initial efforts and create opportunities for cross-disciplinary dialogue and information exchange Juran's approach is based on the idea that the QI program must reflect the strong interdependency that exists among all of the operations within an organization's production processes.

According to Juran, *Quality Planning* is the process of understanding what the customer needs and designing all aspects of a system that is able to meet those needs reliably. Designing an EMS system to do anything less is wasteful because it does not meet patient need. Once the system is put into operation, Quality Control is used to constantly monitor performance for compliance with the original design standards. If performance falls short of the standard, plans are put into action to deal quickly with the problem. Quality control puts the system back into a state of "control", i.e., the way it was designed to operate. Quality Improvement occurs when new, previously un-obtained, levels of performance ~ Breakthrough Performance ~ are achieved! Juran also proposed the idea of the "Vital Few and the Useful Many" that helps prioritize which QI projects should be undertaken. In any organization, there will be a lengthy list of possible ideas for improvement. Since the resources to actually implement new ideas is limited, however, leaders must choose those vital few projects that will have the greatest impact on improving ability to meet customer needs. The criteria for selecting QI projects includes potential impact on meeting customer needs, cutting waste, or marshaling the necessary resources required by the project.

Juran also developed the idea of instituting a leadership group or "Quality Council", consisting of the organization's senior executive staff. The Quality Council is typically charged with the responsibility for designing the overall strategy for quality planning, control and improvement. Senior leadership involvement is a must since QI activities are as important as other management tasks (e.g., budgeting, human

resource management, purchasing and training), and leaders can integrate QI into every aspect of health operations

According to Crosby, ensuring quality should occur primarily at the design phase. Rather than spending time and money on finding and fixing mistakes and errors, Crosby advocates organizational changes to encourage doing a job right the first time. Crosby challenges organizations to think of how processes can be designed or redesigned to reduce errors and defects to reach a goal of "zero defects". Crosby believes managers' policies and actions indicate their commitment to quality. He also advocates a step-by-step approach for educating the entire workforce about quality principles, extensive measurement to document system failures, and formal programs to redesign faulty production processes.

Quality is first and foremost about meeting the needs and expectations of customers. It is important to understand that quality is about more than a product simply "working properly". Think about your needs and expectations as a customer when you buy a product or service. These may include performance, appearance, availability, delivery, reliability, maintainability, cost effectiveness and price. Think of quality as representing all the features of a product or service that affect its ability to meet customer needs. If the product or service meets all those needs - then it passes the quality test. If it doesn't, then it is sub-standard.

#### **Quality management**

Producing products of the required quality does not happen by accident. There has to be a production process which is properly managed. Ensuring satisfactory quality is a vital part of the production process. Quality management is concerned with controlling activities with the aim of ensuring that products and services are fit for their purpose and meet the specifications. There are two main parts to quality management

## **Quality assurance**

Quality assurance is about how a business can design the way a product of service is produced or delivered to minimize the chances that output will be sub-standard. The focus of quality assurance is, therefore on the product design/development stage. Why focus on these stages? The idea is that - if the processes and procedures used to produce a product or service are tightly controlled - then quality will be "built-in". This will make the production process much more reliable, so there will be less need to inspect production output. Quality assurance involves developing close relationships with customers and suppliers. A business will want to make sure that the suppliers to its production process understand exactly what is required - and deliver!

## **Quality control**

Quality control is the traditional way of managing quality. Quality control is concerned with checking and reviewing work that has been done. For example, this would include lots of inspection, testing and sampling. Quality control is mainly about "detecting" defective output - rather than preventing it. Quality control can also be a very expensive process. Hence, in recent years, businesses have focused on quality management and quality assurance.

Total Quality Management is a management approach that originated in the 1950's and has steadily become more popular since the early 1980's. Total quality management (usually shortened to **"TQM"**) is a modern form of quality management. In essence, it is about a kind of business philosophy which emphasizes the need for all parts of a business to continuously look for ways to improve quality.

We cover this important concept in further revision notes. Total Quality is a description of the culture, attitude and organization of a company that strives to provide customers with products and services that satisfy their needs. The culture requires quality in all aspects of the company's operations, with processes being done right the first time and defects and waste eradicated from operations.

Total Quality Management, TQM, is a method by which management and employees can become involved in the continuous improvement of the production of goods and services. It is a combination of quality and management tools aimed at increasing business and reducing losses due to wasteful practices.

Some of the companies who have implemented TQM include Ford Motor Company, Phillips Semiconductor, SGL Carbon, Motorola and Toyota Motor Company.

## **TQM Definition**

TQM is a management philosophy that seeks to integrate all organizational functions (marketing, finance, design, engineering, and production, customer service, etc.) to focus on meeting customer needs and organizational objectives. TQM views an organization as a collection of processes. It maintains that organizations must strive to continuously improve these processes by incorporating the knowledge and experiences of workers. The simple objective of TQM is "Do the right things, right the first time, every time". TQM is infinitely variable and adaptable. Although originally applied to manufacturing operations, and for a number of years only used in that area, TQM is now becoming recognized as a generic management tool, just as applicable in service and public sector organizations. There are a number of evolutionary strands, with different sectors creating their own versions from the common ancestor. TQM is the foundation for activities, which include:

• Commitment by senior management and all employees

- Meeting customer requirements
- Reducing development cycle times
- Just In Time/Demand Flow Manufacturing
- Improvement teams
- Reducing product and service costs
- Systems to facilitate improvement
- Line Management ownership
- Employee involvement and empowerment
- Recognition and celebration
- Challenging quantified goals and benchmarking
- Focus on processes / improvement plans
- Specific incorporation in strategic planning
- This shows that TQM must be practiced in all activities, by all personnel, in Manufacturing, Marketing, Engineering, Sales, Purchasing, HR, etc.

# **Principles of TQM**

The key principles of TQM are as following:

- Management Commitment
- Plan (drive, direct)
- Do (deploy, support, participate)
- Check (review)
- Act (recognize, communicate, revise)
- Employee Empowerment
- Training
- Suggestion scheme
- Measurement and recognition

- Continuous Improvement
- Excellence teams
- Cross-functional process management
- Attain, maintain, improve standards
- Customer Focus
- Supplier partnership
- Service relationship with internal customers
- Never compromise quality
- Customer driven standards

## The Concept of Continuous Improvement by TQM

TQM is mainly concerned with continuous improvement in all work, from high level strategic planning and decision-making, to detailed execution of work elements on the shop floor. It stems from the belief that mistakes can be avoided and defects can be prevented. It leads to continuously improving results, in all aspects of work, as a result of continuously improving capabilities, people, processes, technology and machine capabilities (Gilbert, 1992).

Continuous improvement must deal not only with improving results, but more importantly with improving capabilities to produce better results in the future. The five major areas of focus for capability improvement are demand generation, supply generation, technology, operations and people capability.

A central principle of TQM is that mistakes may be made by people, but most of them are caused, or at least permitted, by faulty systems and processes. This means that the root cause of such mistakes can be identified and eliminated, and repetition can be prevented by changing the process.

#### There are three major mechanisms of prevention:

Preventing mistakes (defects) from occurring Where mistakes can't be absolutely prevented, detecting them early to prevent them being passed down the value added chain (Inspection at source or by the next operation).

Where mistakes recur, stopping production until the process can be corrected, to prevent the production of more defects. (Stop in time).

#### **Implementation Principles and Processes**

A preliminary step in TQM implementation is to assess the organization's current reality. Relevant preconditions have to do with the organization's history, its current needs, precipitating events leading to TQM, and the existing employee quality of working life. If the current reality does not include important preconditions, TQM implementation should be delayed until the organization is in a state in which TQM is likely to succeed.

If an organization has a track record of effective responsiveness to the environment, and if it has been able to successfully change the way it operates when needed, TQM will be easier to implement. If an organization has been historically reactive and has no skill at improving its operating systems, there will be both employee skepticism and a lack of skilled change agents. If this condition prevails, a comprehensive program of management and leadership development may be instituted. A management audit is a good assessment tool to identify current levels of organizational functioning and areas in need of change. An organization should be basically healthy before beginning TQM. If it has significant problems such as a very unstable funding base, weak administrative systems, lack of managerial skill, or poor employee morale, TQM would not be appropriate. However, a certain level of stress is probably desirable to initiate TQM. People need to feel a need for a change. Kanter (1983) addresses this phenomenon be describing building blocks which are present in effective organizational change. These forces include departures from tradition, a crisis or galvanizing event, strategic decisions, individual "prime movers," and action vehicles. Departures from tradition are activities, usually at lower levels of the organization, which occur when entrepreneurs move outside the normal ways of operating to solve a problem. A crisis, if it is not too disabling, can also help create a sense of urgency which can mobilize people to act. In the case of TQM, this may be a funding cut or threat, or demands from consumers or other stakeholders for improved quality of service. After a crisis, a leader may intervene strategically by articulating a new vision of the future to help the organization deal with it. A plan to implement TQM may be such a strategic decision. Such a leader may then become a prime mover, who takes charge in championing the new idea and showing others how it will help them get where they want to go. Finally, action vehicles are needed and mechanisms or structures to enable the change to occur and become institutionalized.

While Total Quality Management has proven to be an effective process for improving organizational functioning, its value can only be assured through a comprehensive and well thought out implementation process. The purpose of this chapter is to outline key aspects of implementation of large scale organizational change which may enable a practitioner to more thoughtfully and successfully implement TQM. First, the context will be set. TQM is, in fact, a large scale systems change, and guiding principles and considerations regarding this scale of change will be presented. Without attention to contextual factors, well intended changes may not be adequately designed. As another aspect of context, the expectations and perceptions of employees (workers and

managers) will be assessed, so that the implementation plan can address them. Specifically, sources of resistance to change and ways of dealing with them will be discussed. This is important to allow a change agent to anticipate resistances and design for them, so that the process does not bog down or stall. Next, a model of implementation will be presented, including a discussion of key principles. Visionary leadership will be offered as an overriding perspective for someone instituting TQM. In recent years the literature on change management and leadership has grown steadily, and applications based on research findings will be more likely to succeed. Use of tested principles will also enable the change agent to avoid reinventing the proverbial wheel. Implementation principles will be followed by a review of steps in managing the transition to the new system and ways of helping institutionalize the process as part of the organization's culture. This section, too, will be informed by current writing in transition management and institutionalization of change. Finally, some miscellaneous do's and don't's will be offered.

Members of any organization have stories to tell of the introduction of new programs, techniques, systems, or even, in current terminology, paradigms. Usually the employee, who can be anywhere from the line worker to the executive level, describes such an incident with a combination of cynicism and disappointment: some manager went to a conference or in some other way got a "great idea" (or did it based on threat or desperation such as an urgent need to cut costs) and came back to work to enthusiastically present it, usually mandating its implementation. The "program" probably raised people's expectations that this time things would improve, that management would listen to their ideas. Such a program usually is introduced with fanfare, plans are made, and things slowly return to normal. The manager blames unresponsive employees, line workers blame executives interested only in looking

good, and all complain about the resistant middle managers. Unfortunately, the program itself is usually seen as worthless: "we tried team building (or organization development or quality circles or what have you) and it didn't work; neither will TQM". Planned change processes often work, if conceptualized and implemented properly; but, unfortunately, every organization is different, and the processes are often adopted "off the shelf" "the 'appliance model of organizational change': buy a complete program, like a 'quality circle package,' from a dealer, plug it in, and hope that it runs by itself" (Kanter, 1983, 249). Alternatively, especially in the underfunded public and not-for-profit sectors, partial applications are tried, and in spite of management and employee commitment do not bear fruit. (Milakovich, 1991; Swiss, 1992).

## **TQM as Large Sale Systems Change**

TQM is at first glance seen primarily as a change in an organization's technology its way of doing work. In the human services, this means the way clients are processed the service delivery methods applied to them and ancillary organizational processes such as paperwork, procurement processes, and other procedures. But TQM is also a change in an organization's culture its norms, values, and belief systems about how organizations function. And finally, it is a change in an organization's political system: decision making processes and power bases. For substantive change to occur, changes in these three dimensions must be aligned: TQM as a technological change will not be successful unless cultural and political dimensions are attended to as well (Tichey, 1983).

Many (Hyde, 1992; Chaudron, 1992) have noted that TQM results in a radical change in the culture and the way of work in an organization. A fundamental factor is leadership, including philosophy, style, and behavior. These must be congruent as they are presented by a leader. Many so called enlightened leaders of today espouse a participative style which is not, in fact, practiced to any appreciable degree. Any manager serious about embarking on a culture change such as TQM should reflect seriously on how she or he feels and behaves regarding these factors. For many managers, a personal program of leadership development (e.g., Bennis, 1989) may be a prerequisite to effective functioning as an internal change agent advocating TQM. Other key considerations have to do with alignment among various organizational systems (Chaudron, 1992; Hyde, 1992). For example, human resource systems, including job design, selection processes, compensation and rewards, performance appraisal, and training and development must align with and support the new TQM culture. Less obvious but no less important will be changes required in other systems. Information systems will need to be redesigned to measure and track new things such as service quality. Financial management processes may also need attention through the realignment of budgeting and resource allocation systems. Organizational structure and design will be different under TQM: layers of management may be reduced and organizational roles will certainly change. In particular, middle management and first line supervisors will be operating in new ways. Instead of acting as monitors, order givers, and agents of control they will serve as boundary managers, coordinators, and leaders who assist line workers in getting their jobs done. To deal with fears of layoffs, all employees should be assured that no one will lose employment as a result of TQM changes: jobs may change, perhaps radically, but no one will be laid off. Hyde (1992) has recommended that we "disperse and transform, not replace, midlevel managers." This no layoff principle has been a common one in joint labor management change processes such as quality of working life projects for many years.

Another systems consideration is that TQM should evolve from the organization's strategic plan and be based on stakeholder expectations. This type of planning and stance regarding environmental relations is receiving more attention but still is not common in the human services. As will be discussed below, TQM is often proposed based on environmental conditions such as the need to cut costs or demands for increased responsiveness to stakeholders. A manager may also adopt TQM as a way of being seen at the proverbial cutting edge, because it is currently popular. This is not a good motivation to use TQM and will be likely to lead to a cosmetic or superficial application, resulting in failure and disappointment. TQM should be purpose oriented: it should be used because an organization's leaders feel a need to make the organization more effective. It should be driven by results and not be seen as an end in itself. If TQM is introduced without consideration of real organizational needs and conditions, it will be met by skepticism on the part of both managers and workers. We will now move to a discussion of the ways in which people may react to TQM.

## **People's Expectations and Perceptions**

Many employees may see TQM as a fad, remembering past "fads" such as quality circles, management by objectives, and zero-based budgeting. As was noted above, TQM must be used not just as a fad or new program, but must be related to key organizational problems, needs, and outcomes. Fortunately, Martin (1993) has noted that TQM as a "managerial wave" has more in common with social work than have some past ones such as MBO or ZBB, and its adaptations may therefore be easier. In another vein, workers may see management as only concerned about the product,

not staff needs. Management initiatives focused on concerns such as budget or cost will not resonate with beleaguered line workers. Furthermore, staff may see quality as not needing attention: they may believe that their services are already excellent or that quality is a peripheral concern in these days of cutbacks and multi problem clients. For a child protective service worker, just getting through the day and perhaps mitigating the most severe cases of abuse may be all that one expects. Partly because of heavy service demands, and partly because of professional training of human service workers, which places heavy value on direct service activities with clients, there may be a lack of interest on the part of many line workers in efficiency or even effectiveness and outcomes (Pruger & Miller, 1991; Ezell, Menefee, & Patti, 1989). This challenge should be addressed by all administrators (Rapp & Poertner, 1992), and in particular any interested in TQM.

Workers may have needs and concerns, such as lower caseloads and less bureaucracy, which are different from those of administration. For TQM to work, employees must see a need (e.g., for improved quality from their perspective) and how TQM may help. Fortunately, there are win win ways to present this. TQM is focused on quality, presumably a concern of both management and workers, and methods improvements should eliminate wasteful bureaucratic activities, save money, and make more human resources available for core activities, specifically client service.

## **Sources of Resistance**

Implementation of large scale change such as TQM will inevitably face resistance, which should be addressed directly by change agents. A key element of TQM is working with customers, and the notion of soliciting feedback/expectations from customers/clients and collaborating with them, perhaps with customers defining quality, is a radical one in many agencies, particularly those serving involuntary clients (e.g., protective services). Historical worker antipathy to the use of statistics and data in the human services may carry over into views of TQM, which encourages the gathering and analysis of data on service quality. At another level, management

resistance to employee empowerment is likely. They may see decision making authority in zero-sum terms: if employees have more involvement in decision making, managers will have less. In fact, one principle in employee involvement is that each level will be more empowered, and managers lose none of their fundamental authority. There will undoubtedly be changes in their roles, however. As was noted above, they will spend less time on control and more on facilitation. For many traditional managers, this transition will require teaching/training, self reflection, and time as well as assurances from upper management that they are not in danger of being displaced.

Resistance in other parts of the organization will show up if TQM is introduced on a pilot basis or only in particular programs (Hyde, 1992). Kanter (1983) has referred to this perspective as segmentalism: each unit or program sees itself as separate and unique, with nothing to learn from others and no need to collaborate with them. This shows up in the "not invented here" syndrome: those not involved in the initial development of an idea feel no ownership for it. On a broader level, there may be employee resistance to industry examples used in TQM terms like inventory or order backlog (Cohen and Brand, 1993, 122).

#### **Dealing with Resistance**

There are several tactics which can be helpful in dealing with resistance to TQM implementation. Generally, they have to do with acknowledging legitimate resistance and changing tactics based on it, using effective leadership to enroll people in the vision of TQM, and using employee participation.

A useful technique to systematically identify areas of resistance is a force field analysis (Brager & Holloway, 1992). This technique was originally developed by Kurt Lewin as an assessment tool for organizational change. It involves creating a force field of driving forces, which aid the change or make it more likely to occur, and restraining forces, which are points of resistance or things getting in the way of change. Start by identifying the change goal, in this case, implementation of TQM. Represent this by drawing a line down the middle of a piece of paper. Slightly to its left, draw a parallel line which represents the current state of the organization. The change process involves moving from the current state to the ideal future state, an organization effectively using TQM. To the left of the second line (the current state), list all forces (individuals, key groups, or conditions) which may assist in the implementation of TQM. These may include environmental pressures leading to reduced funds, staff who may like to be more involved in agency decision making, and the successful applications of TQM elsewhere. On the other side, list restraining forces which will make the change implementation more difficult. Examples may be middle management fear of loss of control, lack of time for line workers to take for TQM meetings, and skepticism based on the organization's poor track record regarding change. Arrows from both sides touching the "current state" line represent the constellation of forces. Each force is then assessed in two ways: its potency or strength, and its amenability to change. More potent forces, especially restraining
ones, will need greater attention. Those not amenable to change will have to be counteracted by driving forces.

The analysis of the force field involves looking at which driving forces may be strengthened and which restraining forces may be eliminated, mitigated, or counteracted. If it appears that, overall, driving forces are strong enough to move back restraining forces, adoption of TQM would be worth pursuing. The change plan would include tactics designed to move the relevant forces.

It is also important to note and validate any points of resistance which are, in fact, legitimate, such as the limited amount of staff time available for TQM meetings. Klein (cited in Bennis, Benne, & Chin, 1985) encouraged change agents to validate the role of the "defender" of the status quo and respond to legitimate concerns raised. This will allow appropriate adaptations of the TQM process to account for unique organizational circumstances. Sell TQM based on the organization's real needs, note legitimate risks and negatives, and allow improvements in your own procedures. This should enhance your credibility and show your openness to critically looking at the process.

Another way to address resistance is to get all employees on the same side, in alignment towards the same goal. Leadership is the mechanism for this, and specific models known as transformational or visionary leadership (Bennis & Nanus, 1985) are most effective. Research on change implementation (Nutt, cited in Robey, 1991) has identified four methods. The first, "intervention," involves a key executive justifying the need for change, monitoring the process, defining acceptable performance, and demonstrating how improvements can be made. This was found to be more successful than "participation," in which representatives of different interest groups determine the features of the change. Participation was found to be more successful than "persuasion" (experts attempting to sell changes they have devised) or "edict," the least successful. Transformational or visionary leadership, the approach suggested here, is an example of the intervention approach. This would involve a leader articulating a compelling vision of an ideal organization and how TQM would help the vision be actualized.

A powerful way to decrease resistance to change is to increase the participation of employees in making decisions about various aspects of the process. There are actually two rationales for employee participation (Packard, 1989). The more common reason is to increase employee commitment to the resultant outcomes, as they will feel a greater stake or sense of ownership in what is decided. A second rationale is that employees have a great deal of knowledge and skill relevant to the issue at hand (in this case, increasing quality, identifying problems, and improving work processes), and their input should lead to higher quality decisions. A manager should consider any decision area as a possibility for employee participation, with the understanding that participation is not always appropriate (Vroom and Yetton, 1973). Employees or their representatives may be involved in decision areas ranging from the scope and overall approach of the TQM process to teams engaging in quality analysis and suggestions for improvements. They may also be involved in ancillary areas such as redesign of the organization's structure, information system, or reward system. Involvement of formal employee groups such as unions is a special consideration which may also greatly aid TQM implementation.

A change agent should understand that, overall, change will occur when three factors (dissatisfaction with the status quo, desirability of the proposed change, the practicality of the change) added together are greater than the "cost" of changing (time spent in learning, adapting new roles and procedures, etc.) (Beckhard and Harris,

1987). Any key group or individual will need a level of dissatisfaction with the status quo, must see a desired improved state, and must believe that the change will have minimal disruption. In other words, the change (TQM) must be seen as responding to real problems and worth the effort or cost in getting there. Conditions favoring change may be created by modifying these variables. The change agent may try to demonstrate how bad things are, or amplify others' feelings of dissatisfaction; and then present a picture of how TQM could solve current problems. The final step of modifying the equation is to convince people that the change process, while it will take time and effort, will not be prohibitively onerous. The organization as a whole and each person will be judging the prospect of TQM from this perspective. A variation of this is the WIIFM principle: "What's in it for me?" To embrace TQM, individuals must be shown how it will be worth it for them.

A final possible area of resistance, the "not invented here" syndrome may be seen after TQM is successfully adopted in one part of the organization and attempts are made to diffuse it, or spread it to other areas. Such resistance may be prevented or reduced in three ways. First, the general techniques mentioned above should be helpful. Second, each new area (program, division, and department) should have a new assessment and contracting process: different circumstances should be expected in each part of the organization (Chaudron, 19). Finally, a general principle of TQM implementation mentioned below is relevant here: every TQM application should be uniquely adapted: don't use "off the shelf" models or try to standardize all aspects of the process.

#### **Implementation Principles and Processes**

Specifics of TQM implementation will be discussed in two ways. First, a model for organizational transformation through visionary leadership will be presented. A full implementation of TQM does, as was emphasized earlier, represent a significant change in the culture and political economy of an organization, and a comprehensive change strategy is therefore required. After discussion of a change model, several do's and don't's culled from the literature on TQM in the public sector and the human services will be reviewed.

#### **Current Reality and Preconditions**

A preliminary step in TQM implementation is to assess the organization's current reality: relevant preconditions have to do with the organization's history, its current needs, precipitating events leading to TQM, and the existing employee quality of working life. If the current reality does not include important preconditions, TQM implementation should be delayed until the organization is in a state in which TQM is likely to succeed. The force field analysis discussed above is one useful tool in reviewing the current situation.

If an organization has a track record of effective responsiveness to the environment, and if it has been able to successfully change the way it operates when needed, TQM will be easier to implement. If an organization has been historically reactive and has no skill at improving its operating systems, there will be both employee skepticism and a lack of skilled change agents. If this condition prevails, a comprehensive program of management and leadership development may be instituted. A management audit (Sugarman, 1988) is a good assessment tool to identify current levels of organizational functioning and areas in need of change. An organization should be basically healthy before beginning TQM. If it has significant problems such as a very unstable funding base, weak administrative systems, lack of managerial skill, or poor employee morale, TQM would not be appropriate.

However, a certain level of stress is probably desirable to initiate TQM: people need to feel a need for a change. Kanter (1983) addresses this phenomenon be describing building blocks which are present in effective organizational change. These forces include departures from tradition, a crisis or galvanizing event, strategic decisions, individual "prime movers," and action vehicles. Departures from tradition are activities, usually at lower levels of the organization, which occur when entrepreneurs move outside the normal ways of operating to solve a problem. A crisis, if it is not too disabling, can also help create a sense of urgency which can mobilize people to act. In the case of TQM, this may be a funding cut or threat, or demands from consumers or other stakeholders for improved quality of service. After a crisis, a leader may intervene strategically by articulating a new vision of the future to help the organization deal with it. A plan to implement TQM may be such a strategic decision. Such a leader may then become a prime mover, who takes charge in championing the new idea and showing others how it will help them get where they want to go. Finally, action vehicles are needed: mechanisms or structures to enable the change to occur and become institutionalized. TQM processes and models of employee participation are such mechanisms.

Essential or desirable preconditions may be identified in two areas: macro and micro. Macro factors include those which are concerned with issues such as leadership, resources, and the surrounding infrastructure. Micro issues have to do with internal issues such as employee training and empowerment and organizational processes such as quality assurance.

At the macro level, Osborne and Gaebler (1992, 3267) have listed several "factors supportive of fundamental change" which showed up in their research on reinventing government. These factors, are consistent with research cited earlier about effective organizational change. It should be noted that Osborne and Gaebler researched governmental organizations only; but several factors, including leadership and a longterm perspective, are relevant in not for profit settings as well. The first factor, a crisis, was also identified by Kanter as a driving force for change. Next, Osborne and Gaebler noted the importance of leadership. Such leaders are usually at the executive level of the organization, where they can champion new ideas and protect risk takers. At the political level, a continuity of leadership is desirable: a long-term commitment is necessary, and politicians are often not willing to adopt this perspective. A healthy civic infrastructure is also valuable: an organization in a community with citizens, community organizations, and businesses committed to the public welfare is more likely to be able to engage in large-scale change. Furthermore, key leaders in the community having a shared vision and goals, and a level of trust among those in power (e.g., executives and union leadership), are valuable. Outside resources, in the form of help from foundations, consultants, civic organizations, or other governments, will usually be necessary. Finally, while there is no one best way to implement particular change efforts, it does help to have models to follow: other organizations who have implemented change can offer useful guidance and reassurance that change is possible. At least half of these factors were present when "wholesale reinvention" occurred. Many of these factors are present in successful case studies of TQM and other large-scale change.

On the micro level, the US Federal Quality Institute identified several key factors related to successful TQM. First, as many researchers have noted, top management

support is necessary. This is typically represented partly through strategic planning regarding TQM. Second, a customer focus is an important precondition, since TQM often involves improving quality from a customer's point of view. Employees or their representatives (i.e., unions) must be involved early, particularly in addressing employee training and recognition and employee empowerment and teamwork issues. Attention to these issues is important in changing the organization's culture in the direction of teamwork and a customer and quality focus. The measurement and analysis of products and processes and quality assurance are final elements which need attention (cited in Hyde, 1992). Assessing these factors and private sector applications, Hyde (1992) listed the following implications regarding TQM implementation in the public sector. First, basic quality measurement systems have to be developed. These need to be accessible to all levels, and, in fact, must be designed and implemented with employee involvement. More specifically, any unions in the organization must be substantively involved. Consistent with a systems perspective, budgeting and resource allocation systems will need to be realigned to fit with the TQM culture: TQM cannot be used as a mechanism to simply cut costs or rationalize cutbacks. The same is true of human resource management systems: work may be redesigned to implement self-directed work teams; performance appraisal and compensation systems may be change to reward team based performance; and massive training for managers, supervisors, and workers will be necessary. Finally, thoughtful attention needs to be paid to the ways in which customer feedback is used.

#### Visionary Leadership

With these principles and preconditions in mind, the following implementation steps will be discussed: using leadership to articulate a vision of the future for the organization and how TQM fits into it, designing a comprehensive change process, implementing TQM & related new systems, and ensuring institutionalization.

As was emphasized earlier, leadership is a key element in successful implementation of large scale change (Norman & Keys, 1992): the leader shows the need and sets the vision, defining the basic purpose, goals, and parameters or requirements of TQM. The leader needs to take a long-term perspective, and must be able to motivate others to stick with the process during early stages when resistance and obstacles may seem insurmountable. The preferred leadership style would be a participative one, so that staff may be involved in the design of the specific system elements. This may seem in contradiction to the earlier stated preference for an "intervention" approach as opposed to traditional participative decision making. In the former, the leader is, in fact directive regarding the big picture and overall goals. Once that strategic direction has been determined, a participative style may be used on implementation details. Prior to this decision, of course, the manger should study TQM, talk to others who have used it, and perhaps attend a preliminary training session. This is important in order for the manager to accurately assess the fit between TQM and her/his style. This will be necessary in establishing an organizational culture which is compatible with TQM, nurturing and reinforcing continuous quality improvement (Cohen and Brand, 1993, 118).

In designing a comprehensive change process, the leader must acknowledge the existing organizational culture (norms and values, managers' leadership philosophies and styles at all levels) to ensure a good fit. TQM also needs to be congruent with or aligned with other organizational processes, including reward systems, financial & information systems, and training systems.

Implementing TQM essentially involves organizational transformation: beginning to operate in new ways, developing a new culture. This also includes redesigning other systems, as has been described above. Such change, while difficult, is possible in the public sector, in spite of Swiss's (1992) reservations (Packard and Reid, 1990).

#### **Steps in Managing the Transition**

Beckhard and Pritchard (1992) have outlined the basic steps in managing a transition to a new system such as TQM: identifying tasks to be done, creating necessary management structures, developing strategies for building commitment, designing mechanisms to communicate the change, and assigning resources.

Task identification would include a study of present conditions (assessing current reality, as described above); assessing readiness, such as through a force field analysis; creating a model of the desired state, in this case, implementation of TQM; announcing the change goals to the organization; and assigning responsibilities and resources. This final step would include securing outside consultation and training and assigning someone within the organization to oversee the effort. This should be a responsibility of top management. In fact, the next step, designing transition management structures, is also a responsibility of top management. In fact, Cohen and Brand (1993) and Hyde (1992) assert that management must be heavily involved as leaders rather than relying on a separate staff person or function to shepherd the effort. An organization wide steering committee to oversee the effort may be appropriate. Developing commitment strategies was discussed above in the sections on resistance and on visionary leadership.

To communicate the change, mechanisms beyond existing processes will need to be developed. Special all staff meetings attended by executives, sometimes designed as input or dialog sessions, may be used to kick off the process, and TQM newsletters may be an effective ongoing communication tool to keep employees aware of activities and accomplishments.

Management of resources for the change effort is important with TQM, because outside consultants will almost always be required. Choose consultants based on their prior relevant experience and their commitment to adapting the process to fit unique organizational needs. While consultants will be invaluable with initial training of staff and TQM system design, employees (management and others) should be actively involved in TQM implementation, perhaps after receiving training in change management which they can then pass on to other employees. A collaborative relationship with consultants and clear role definitions and specification of activities must be established.

#### Institutionalization of TQM

Ledford (cited in Packard & Reid, 1990) has proposed a model including four processes which are forces which determine whether a change will persist through the phases of institutionalization. These processes are concerned with congruence among these variables: the change (TQM) with the organization, the change with other changes initiated at the time, the change with environmental demands, and with the level of slack resources in the organization. TQM needs to be congruent with the organization's current culture, and with other changes occurring in the organization. In this period of diminishing resources, organizations are likely to be trying to cope, by downsizing or other methods. In some organizations there are increasing demands for quality or client service improvements. Many such changes are likely to be driven by environmental demands, and TQM may be more likely to be successful than at times of less environmental pressure. Unfortunately, the fourth element, slack resources, is less likely to be present: under current conditions, extra resources (money and staff time) are less likely to be easily available. The challenge is to find a way to make the initial investment outlay to start a process which will pay off in the long term.

Institutionalization may also be enhanced by overlaying another, but compatible, change model: the learning organization (Senge, 1990). This involves, at both the micro and systems levels, staff always learning how to do better and management learning how to be more responsive to staff and the community. Leaders help staff develop their own visions and align these with the organization's vision of quality.

Beckhard and Pritchard (1992) emphasized top management commitment to the change, and Cohen and Brand (1993) apply this specifically to TQM by recommending finding and nurturing a core group which is interested in organizational change. They also emphasize the importance of personal leadership and example: managers need to apply TQM in their daily work and to get people to think about and use the concepts and tools. Ongoing monitoring, and action research to make changes as needed, will be required. And, once again, the systems perspective must be noted: TQM must be built into other systems, particularly those involving planning and rewards. Leaders should expect a long term process, including a transition period. They will need to be persistent, using constant reinforcement, for example, through continuous training. Cohen and Brand suggest that TQM should eventually be made an "invisible" part of the organization, permeating all areas and the responsibility of everyone. TQM may be instituted organization wide or started in one unit or program and then expanded. Diffusion occurs as TQM is spread from its initial application to other units. Dynamics of resistance mentioned earlier will have to be addressed at this stage.

#### Some Do's and Don'ts in quality management

Following are some miscellaneous do's and don'ts which are based on experiences with TQM in the public sector and the human services. Many are drawn from Cohen and Brand (1993), Hyde (1992), and Chaudron (1992).

First, don't "do TQM": a canned approach is likely to be met with skepticism and ultimately fail because it is not adapted to the uniqueness of a particular organization. TQM is particularly susceptible to this phenomenon, because some adherents adopt almost a religious fervor, (they have been described by one observer as "Deming lemmings" (Reid, 1992). "Deming as demigod" is another way this phenomenon has been described: a statement takes on an added aura when prefaced by "Dr. Deming said..." (Chaudron, 1993). Don't copy any particular model but use relevant basic principles such as an emphasis on quality, continuous analysis of tasks to improve performance, and work with suppliers to enable the organization to start with high quality supplies. TQM should be seen as a process, not a program. It should be integrated into ongoing agency operations, and the focus should be on how an organization can better accomplish its goals and objectives. At the tactical level, don't overemphasize techniques such as statistical process control and the use of charts. Focus instead on the systems the analysis and improvement of processes not on statistics or individual variations.

Whereas some large-scale organizational change efforts are often driven by a centralized steering committee or group of executives, in TQM it may be best to not centralize the effort and establish a separate quality management bureaucracy ("qualiticrats", according to Hyde). Don't believe that top management support is necessary at first, as is axiomatic in organization development. While an organization needn't start TQM at the top, successes in particular units or programs should set the

stage for diffusion in other directions. Change from below may be appropriate for those at lower levels who want to initiate TQM. It may work best to start TQM with a temporary task force and then hire trainers, expose staff, and hope that managers will be motivated to learn more. People responsible for leading shouldn't devote full time to TQM; they should maintain their regular work as well. Cohen and Brand believe that TQM is best taught by people doing it day to day in their work. Implement it gradually to ensure meaningful culture change, and use frequent feedback to ensure that change isn't just superficial. There is no need for a "grand plan" (a quality council, etc.); just start where the organization is.

Perhaps the most important "do" worth repeating is to involve employees in the decision making process, at whatever stages and levels possible. As a specific aspect of this, advance negotiations and discussions with any unions present should occur. Create "atmosphere of amnesty" (Cohen & Brand, 1993, 202) so workers and managers feel free to share improvement needs. Tell people what the quality standards are so that inspection and review isn't necessary. Emphasize client feedback and both quantitative and qualitative performance tracking. Make sure quality teams have the necessary tools and resources, such as training, facilitation, and time to meet. In large organizations, regional offices in particular will need lots of support in order to keep the process alive and thriving.

Several suggestions may be offered to managers. First, understand the direct service work of your organization. "Management by walking around" is a useful way to stay in touch with direct service workers and their needs. Practice what you preach: use TQM on your own processes. Meet frequently with middle managers regarding their personal efforts to use TQM. Focus on the nature of the work and try to establish in employees' minds excitement about a new way of working. TQM training will be needed for all involved work groups. Also, horizontal and vertical communication training may be useful to get groups communicating with each other. Team building is a core element of the process, to ensure employee involvement and effective problem solving. Build analysis into the culture: "stop and think about how we work," according to Cohen and Brand. Insist on objective measures of results. Look for visible improvement, but not optimization; and try to generate some quick results in terms of time or money saved. Constantly check with employees to assess their comfort with the process. If people are feeling threatened, slow down. Human resources aspects such as team functioning and analysis must be kept in balance. Prevent or watch for schisms between TQM and human resources functions or other parts of the organization.

# Chapter 3

# Methodology

#### Study design:

The design of this study is mainly descriptive cross sectional design. It has been selected because this method is useful for answering the study questions. It is less expensive than other designs and enables the author to meet the study objectives in a short time period, besides that this type of studies generates further research questions for future studies.

#### **Study population:**

The target population consists of all health providers who were trained in the quality improvement project and who are still working in the MoH. Selecting all teams that had experience in QI activities would ensure that all teams who had valuable experience in QI were surveyed, not just the most successful teams that had completed all activities of the QI unit.

# Setting of the study:

The study will be conducted at both hospitals and primary health care centers operated by MoH at Gaza Strip.

#### **Study duration:**

Data collection for this study took place in April 2005 and consumed two months. Data analysis was carried out in June 2005. However, due to special circumstances the researcher was not able to complete the reporting process till recently.

#### Sample size:

The sample size was non-probability purposive sample, which includes all health providers who are enrolled in the quality improvement project as a tem member as well as a team leader.

A list of the entire sample been received from the Director of Quality Improvement Unit at the MoH- Gaza. The total number of the list were 114 subjects, the number of respondent was 81 distributed as 35 physician, 27 nurses , 2 lab technician , 13 administrator and 4 others. So the actual number of the respondents was 81 subjects with a response rate of 71.05%.

## **Instrument:**

The author has developed a structured self administered questionnaire for the team members (Annex 5). The questionnaire has been designed to be clear and simple without leading or double parallel questions, consists of two sections and took approximately 20 minutes to complete. The first section covers the sociodemographic profile, the second section includes a likert scale questions with 5 options (strongly disagree=1, disagree=2, uncertain=3, agree=4, and strongly agree=5). The main items cover information about awareness of quality concept, institutionalization and quality culture. Worth noting, the questionnaire was translated into Arabic language to ensure the credibility of the answers (Annex 4).

For the purpose of the analysis the author divide the questions of the questionnaire according to the institutionalization elements. (annex 7)

#### **Piloting:**

Piloting was conducted before the actual phase of data collection started to assess the validity and suitability of the questionnaire. Therefore, the author selected about 10 subjects from different health facilities for piloting. Some changes and modifications were considered and introduced.

#### **Eligibility criteria:**

For the purposes of this study, a number of terms defined are used in this study. The definitions are as follows.

**Team members:** all team members who were participated actively in the quality improvement project at the MoH.

#### **Inclusion criteria:**

All team members who were participated actively in the quality improvement project at the ministry of health and still working in the MoH.

#### **Exclusion criteria:**

Team members who were partially participated in the quality improvement project at the MoH or moved to other non-governmental facilities or retired.

# **Ethical consideration:**

The author was obtained all the necessary ethical documents to conduct the study. The author was requested a permission from Helsinki committee in the Gaza Strip (Annex 1). Furthermore, an official letter of request was obtained from the Ministry of Health. Confidentiality was maintained at all levels during the study; a full explanation was given for all participants both verbally and written to assure confidentiality. Participants in the study received a complete explanation about the research purpose and know that participation in the research is optional, and then consent forms was distributed and signed at the time of data collection (Appendix 2).

## **Data collection:**

A list of the team members who were actively participated in the quality improvement project (sample frame) was obtained officially from the Quality Improvement Unit at the MoH, and then the author distributed the questionnaire. The questionnaire was attached with explanation letter that contains the purpose and the objectives of the study (annex1)

The data collection consisted of gathering information from sources of data using data collection tools.

#### **Statistical Analysis:**

The Statistical Package for Social Sciences (SPSS) version eight was used for analysis (windows version 10, SPSS, Chicago, USA). The variable was coded numerically, then advance statistical analysis was done including descriptive such as frequency distribution.

Statistical relationships between variables were assessed using relevant statistical test. A p-value of less than 0.05 was considered statistically significant with 95% confidence interval.

### **Study limitations:**

- Since the sample was non-probability purposive sample, therefore, generalization beyond this study is limited.
- Limited resources such as educational material, for example journals and books.
- Due to the political situation and the difficulties in reaching all governmental hospitals and primary health care centers made it difficult for the researcher to meet all objects at the time of data collection.

# **Chapter 4**

# **Results and Analysis**

# Introduction

This chapter presents the result of statistical analysis of the data and the characteristic and distribution of the respondents. Additionally, the chapter presents some statistical tests to explore the relationships between the dependent and the independent variables. The dependent variable was institutionalization of quality program. The independent variables included organizational and personal characteristics such as gender, age, residency place, marital status, job title of the participants, place of work, years of experience, and other variables.

# **Characteristics of the study population**

Table 1 summarizes important sociodemographic variables that reported in this study. As shown in Figure 1, the majority of the study subjects (86.4%) were males, while females represented only 13.6% of the participants.

It seems that there was more focus on training males than females who usually represent a large proportion in the demography of the health care personnel in Palestine.



Figure1: Distribution of participants by gender

Figure 2 illustrates the distribution of participants by age group. About half of the participants (50.6%) age were between 41-50 years. While the age group from 32-40 years represented 25.9%. The least age group (23.5%) was those from 51-60 years. Interestingly, when the researcher examined the list of participants who attended or participated in Quality improvement projects it is found that some considerable number of them either retire or died. Assuming that quality requires the involvement of all, it is important that all health providers from different categories need to be involved in such quality improvement projects.





Also, the same table represents the distribution of the participants according to the governorates; about 53.1% of the participants were from Gaza City, Rafah 14.8%, Middle Area 13.6, North Gaza 13.6% and Khanyounis 4.9%. The highest percent of the participants being from Gaza City reflects the majority of health services at the ministry of health that are located at Gaza city, specially the main public hospitals (Shifa Hospital, the pediatric Hospital and the Ophthalmic Hospital).

Additionally, participants were categorized according to the average monthly income into three groups, the first group less than 2500 NIS, the second group was from 2600 to 3500 and the third group was more than 3500 NIS; the highest monthly income (42%) was among the third group, and the second highest monthly income was (32.1%), while the first group represented 25.6%.

Socio-demographic characteristics	Frequency	%
Gender		
Male	70	86.4
Female	11	13.6
Total	81	100%
Age group		
32-40	21	25.9
41-50	41	50.6
51-60	19	23.5
Total	81	100%
Residential area		
North Gaza	11	13.6
Gaza City	43	53.1
Middle area	11	13.6
Khanyounis	4	4.9
Rafah	12	14.8
Total	81	100%
Monthly income (NIS)		
< 2500	21	25.9
2600-3500	26	32.1
> 3500	34	42.0
Total	81	100%

# Table 1: Characteristics of the study population

# Work profile of the study population

Table 2 shows the distribution of the study population by occupation, place of work, job title and experience. As depicted in table 2 as well as figure 3, doctors represented the highest percent (43.3%) of the participants, followed by the nurses who represented 33.3%, administrators 16% and others health professionals such as laboratory technicians and other paramedical represented 7.4%. The highest percent of doctors in the sample reflects their highest actual number compared with other occupations.

Figure 3: Distribution of participants by occupation



As describes in figure 4 the majority of participants (88.9%) were worked in hospitals compared with those who worked in PHC (11.1%).



# Figure 4: distribution of participants by place of work

Further, the job title was categorized into four categories, regular employee, department head, supervisor and manager, this arrangement been made regardless of the participants occupation. Figure 5 shows that about half of the subjects (43.2%) were department head, the second highest category was regular employee whom represented about one quarter of the subjects (25.9%), the third category was the supervisor (12.3%), and the least category was the manager (18.5%). The highest percent of department head reflects their highest actual number compared with other job title.



Figure 5: Distribution of participants by job title

Additionally the same table presents the distribution of subjects by their experience; the first group those who had less than 25 years of experience and they constituted 29.6%, the second group was those between 15-25 years of experience and they constituted 50.6% and the third group those how had more than 25 years of experience and they constituted 19.8% of the total subjects.

Table 2: Distribution of participants by occupation, place of work, job title andexperience

Occupation	Frequency	%
Physicians	35	43.3
Nurses	27	33.3
Administrators	13	16.0
Others	6	7.4
Total	81	100%
Place of work		
Hospital	72	88.9
РНС	9	11.1
Total	81	100%
Job Title		
Regular employee	21	25.9
Department Head	35	43.2
Supervisor	10	12.3
Manager	15	18.5
Total	81	100%
Years of experience		
< 15 years	24	29.6
15-25ear	41	50.6
> 25 years	16	19.8
Total	81	100%

# Table 3: Participant's attitudes towards QI culture

	Y	es	N	lo	DK	
	Ν	%	Ν	%	Ν	%
Do you think that implementing the quality	59	72.8	17	21.0	5	6.2
through the quality improvement project						
was the appropriate approach to your						
institution?						
Do you think that the health workers, at your	34	42.0	33	40.7	14	17.3
work sitting, got enough knowledge and						
awareness of the quality development						
activities						
Health workers at my institution dealing	33	40.7	33	40.8	15	18.5
positively towards achieving the quality						
development activities						
Do you think that workers in your institution	17	21.0	53	65.4	11	13.6
are having appropriate feedback regarding						
their performance					_	
Within the context of quality development	15	18.5	59	72.9	7	8.6
activities do you think that workers been						
offered more responsibility						
Do you think quality development activities	63	77.8	12	14.8	6	7.4
at your institution had contributed to some						
extent in defining the concept of quality at						
your side						
After implementing The Quality	79	97.5	1	1.2	1	1.2
Improvement Activities , do you think that						
you nave the will to improve and						
implementation quality culture within your						
institution						

Table 3 describes the attitude of participants toward quality improvement culture. The vast majority (97.5%) of participant had the intention to implement the quality culture within their institution, and about three quarters (77.8%) of the participants believed that quality improvement activities were contributed in defining the concept of quality, and also about tow thirds (72.8%) of the participants believe that the projects were appropriate. However, large proportion of the participants claimed that health workers having no appropriate feedback regarding their performance and less responsibilities. Moreover, About 41% of participants believe that health workers

dealing positively towards achieving the quality development activities and about 42% got enough knowledge and awareness of the quality development activities.

### Factor analysis and related sub-scale dimensions

It was so difficult for the researcher to study each item of the 49 presented in the questionnaire. The researcher conducted factor analysis, as a result of factor analysis; eight factors (dimensions) were emerged and labeled as policy, leadership, core value, resources, structure, capacity building and Information and Communication.

Factors name	No of items	Mean	Std. d
Policy	6	3.16	0.53
Leadership	6	2.36	0.53
Core value	7	3.26	0.44
Resources	6	2.67	0.65
Structure	3	2.26	0.66
Capacity Building	6	3.05	0.48
Information and Communication	4	2.19	0.66
Rewarding	4	2.56	0.57

Table 4: Factor label, number of items, means, standard deviation and variance

The table above as well as figure (6) showed that the mean of factors was ranged from 3.26-2.19. The highest mean was seen with leadership factor (mean 3.36) whereas the lowest level of perception was seen with information and communication factor (mean 2.19).





# Relationships between institutionalization elements and participant characteristics

An independent t-test was used to compare the means of the quality institutionalization scores and gender.

Table 5 shows that males and females had relatively similar mean scores in all subscale dimensions, therefore, there were no significance statistical differences observed between both female and male in all sub dimensions.

Element.	Cardan	NT	Мала		4 4 4	Р
Elements	Gender	IN	Mean	<b>Sta.</b> a	t. test	value
Policy	Male	70	3.33	0.63	-0.37	0.63
	Female	11	3.41	0.62	-0.38	
Leadership	Male	70	3.18	0.49	-0.93	0.75
	Female	11	3.33	0.53	-0.88	
Core value	Male	70	3.61	0.59	-0.56	0.49
	Female	11	3.71	0.49	-0.64	
Resources	Male	70	2.75	0.68	-1.97	0.87
	Female	11	3.18	0.67	-1.98	
Structure	Male	70	3.34	0.69	-0.80	0.78
	Female	11	3.52	0.62	-0.86	
Capacity building	Male	70	3.42	0.58	-1.32	0.24
	Female	11	3.66	0.43	-1.65	
Information &						
communication	Male	70	3.03	0.59	-1.16	0.85
	Female	11	3.25	0.55	-1.21	
Rewarding	Male	70	3.04	0.61	0.65	0.85
	Female	11	2.91	0.55	0.70	

 Table 5: Independent T-test comparing gender with institutionalization elements

Elements	Dependent variable	Sum of Squares	df	Mean Square	F	P. value
policy	Between Groups	0.28	2	0.14	0.35	0.71
	Within Groups	31.13	78	0.40		
	Total	31.41	80			
Leadership	Between Groups	0.36	2	0.18	0.73	0.48
	Within Groups	19.36	78	0.25		
	Total	19.72	80			
Core value	Between Groups	0.08	2	0.04	0.12	0.89
	Within Groups	26.14	78	0.34		
	Total	26.22	80			
Resources	Between Groups	0.64	2	0.32	0.67	0.52
	Within Groups	37.39	78	0.48		
	Total	38.03	80			
Structure	Between Groups	0.21	2	0.10	0.22	0.81
	Within Groups	37.17	78	0.48		
	Total	37.38	80			
Capacity Building	Between Groups	0.29	2	0.14	0.44	0.64
	Within Groups	25.34	78	0.32		
	Total	25.62	80			
Information &						
Communication	Between Groups	0.44	2	0.22	0.64	0.53
	Within Groups	26.63	78	0.34		
	Total	27.07	80			
Rewarding	Between Groups	0.72	2	0.36	1.01	0.37
	Within Groups	27.88	78	0.36		
	Total	28.60	80			

Table 6: comparison between institutionalization elements with age groups

One way ANOVA was used to examine the differences between the age groups and the institutional elements. The respondent's age groups were categorized as the following; (32-40), (41-50), (51-60). The results revealed no statistical significance difference between age groups and all subscale dimensions (table 6).

Independent	Dependent	Sum of		Mean		
Var.	Var.	Squares	df	Square	F	P. Value
Policy	Between Groups	2.56	4	0.64	1.68	0.16
	Within Groups	28.85	76	0.38		
	Total	31.41	80			
Leadership	Between Groups	1.47	4	0.37	1.53	0.20
	Within Groups	18.26	76	0.24		
	Total	19.72	80			
Core value	Between Groups	3.34	4	0.84	2.77	0.03*
	Within Groups	22.88	76	0.30		
	Total	26.22	80			
Resources	Between Groups	1.89	4	0.47	0.99	0.42
	Within Groups	36.14	76	0.48		
	Total	38.03	80			
Structure	Between Groups	3.02	4	0.75	1.67	0.17
	Within Groups	34.36	76	0.45		
	Total	37.38	80			
Capacity						
Building	Between Groups	1.83	4	0.46	1.46	0.22
	Within Groups	23.79	76	0.31		
	Total	25.62	80			
Information &						
communication	Between Groups	3.32	4	0.83	2.66	0.04*
	Within Groups	23.74	76	0.31		
	Total	27.07	80			
Rewarding	Between Groups	0.64	4	0.16	0.44	0.78
	Within Groups	27.96	76	0.37		
	Total	28.60	80			

Table 7: Comparison between institutionalization elements and residency

\* Statistically significant

As shown in table 7, participants from different residency showed no statistical significance differences in all sub-scale dimensions, except for the core value factor and the Information & communication factor (P value = 0.03 and 0.04 respectively). Scheffe test revealed no statistical significance; however, participants from Rafah (mean 3.8) had more mean scores than the other residents in Core Value dimensions. And Mid Zone with (mean 3.6) had more than scores than the other residents in Information and communication

Dependent	Independent	Sum of		Mean		Р
variable	variable	Squares	df	Square	F	value
Policy	Between Groups	0.19	2	0.10	0.24	0.78
	Within Groups	31.21	78	0.40		
	Total	31.41	80			
Leadership	Between Groups	0.17	2	0.08	0.34	0.71
	Within Groups	19.55	78	0.25		
	Total	19.72	80			
Core value	Between Groups	0.06	2	0.03	0.09	0.92
	Within Groups	26.17	78	0.34		
	Total	26.22	80			
Resources	Between Groups	1.67	2	0.84	1.80	0.17
	Within Groups	36.36	78	0.47		
	Total	38.03	80			
Structure	Between Groups	1.07	2	0.53	1.15	0.32
	Within Groups	36.31	78	0.47		
	Total	37.38	80			
Capacity						
building	Between Groups	0.34	2	0.17	0.53	0.59
	Within Groups	25.28	78	0.32		
	Total	25.62	80			
Information &						
communication	Between Groups	0.92	2	0.46	1.37	0.26
	Within Groups	26.15	78	0.34		
	Total	27.07	80			
Rewarding	Between Groups	0.59	2	0.29	0.82	0.44
	Within Groups	28.01	78	0.36		
	Total	28.60	80			

 Table 8: Comparison between institutionalization elements and monthly income

The results revealed that, there were no significant statistical difference between the average monthly income and all subscale dimensions. Moreover, Scheffe test shows no significant statistical differences between groups (Table 8).

Dependent	Independent	Sum of		Mean		
variable	variable	Squares	df	Square	F	P value
		0.690	3	0.230	0.577	
Policy	Between Groups					0.622
	Within Groups	30.718	77	0.399		0.632
	Total	31.408	80			
Leadership	Between Groups	0.468	3	0.156	0.623	0.602
	Within Groups	19.255	77	0.250		
	Total	19.722	80			
Core value	Between Groups	9.007E-02	3	E-023.002	0.088	0.966
	Within Groups	26.133	77	0.339		
	Total	26.223	80			
Resources	Between Groups	0.646	3	0.215	0.444	0.722
	Within Groups	37.388	77	0.486		
	Total	38.034	80			
Structure	Between Groups	1.831	3	0.610	1.322	0.273
	Within Groups	35.546	77	0.462		
	Total	37.377	80			
Capacity		0.636	3	0.212	0.653	0.583
building	Between Groups					
	Within Groups	24.988	77	0.325		
	Total	25.624	80			
Information &		1.829	3	0.610	1.860	0.143
communication	Between Groups					
	Within Groups	25.238	77	0.328		
	Total	27.066	80			
Rewarding	Between Groups	1.075	3	0.358	1.003	0.396
	Within Groups	27.522	77	0.357		
	Total	28.597	80	0.230		

 Table 9: Comparison between Jobs and institutionalization elements

One way ANOVA statistical test was used to examine the differences of mean scores among different occupation of participants which was categorized into four groups; physicians, nurses, administrators and other health professionals. Table 9 shows that there was no significant statistical difference in all sub scale dimensions.

	Work					Р
Dependent variable	place	Ν	Mean	SD	Т	value
_						
Policy	Hospital	72	3.30	0.62	-1.86	0.64
	PHC	9	3.70	0.59	-1.92	
Leadership	Hospital	72	3.16	0.49	-2.19	0.57
	PHC	9	3.54	0.45	-2.35	
Core value	Hospital	72	3.58	0.57	-1.71	0.43
	PHC	9	3.93	0.51	-1.88	
Resources	Hospital	72	2.73	0.66	-3.09	0.64
	PHC	9	3.44	0.58	-3.41	
Structure	Hospital	72	3.31	0.67	-2.15	0.94
	PHC	9	3.81	0.65	-2.21	
Capacity Building	Hospital	72	3.39	0.57	-2.83	0.03*
	PHC	9	3.94	0.27	-4.87	
Information						
&Communication	Hospital	72	3.02	0.54	-1.66	0.05*
	PHC	9	3.36	0.80	-1.23	
Rewarding	Hospital	72	3.00	0.61	-0.64	0.57
	PHC	9	3.14	0.47	-0.79	

Table 10: Comparison between place of work and institutionalization elements

\* Statistically significant

An independent t-test was used to examine the differences in mean scores between place of work and the majority of subscale dimensions. It was found a significant statistical difference between work place and capacity building sub-scale dimension (p 0.03). In addition the study revealed a marginal statistical significance between work place and information and communication sub-scale dimension (p 0.05). However, participants working in PHC had more mean scores in all subscale dimensions than those participants working in hospitals (Table 10).

Dependent	Independent	Sum of		Mean		Р
variable	variable	Squares	df	Square	F	value
	Between					
Policy	Groups	1.88	3	0.63	1.64	0.19
	Within Groups	29.53	77	0.38		
	Total	31.41	80			
	Between					
Leadership	Groups	0.80	3	0.27	1.09	0.36
	Within Groups	18.92	77	0.25		
	Total	19.72	80			
	Between					
Core value	Groups	0.13	3	0.04	0.13	0.94
	Within Groups	26.09	77	0.34		
	Total	26.22	80			
	Between					
Resources	Groups	0.21	3	0.07	0.15	0.93
	Within Groups	37.82	77	0.49		
	Total	38.03	80			
	Between					
Structure	Groups	0.98	3	0.33	0.69	0.56
	Within Groups	36.40	77	0.47		
	Total	37.38	80			
Capacity	Between					
building	Groups	0.31	3	0.10	0.31	0.82
	Within Groups	25.31	77	0.33		
	Total	25.62	80			
Information &	Between					
communication	Groups	3.94	3	1.31	4.38	0.01*
	Within Groups	23.12	77	0.30		
	Total	27.07	80			
	Between					
Rewarding	Groups	0.18	3	0.06	0.17	0.92
	Within Groups	28.41	77	0.37		
	Total	28.60	80			

Table 11: Comparison between job title and institutionalization elements

Three main types of positions were included in this study, including physicians, nurses and administrators. A high statistical relationship between information and communication sub scale dimension and the job title of the employee (p value= 0.01). the highest mean were 3.3 with Managers and Department head were (3.2). The study could not find any statistical relationship between the job title and the remaining subscale (table 11).

				~		Р
		Sum of Squares	df	Mean Square	F.	value
Policy	Between Groups	0.25	2	0.12	0.31	0.73
	Within Crowns	21.16	2 70	0.12	0.51	0.75
		31.10	/0	0.40		
	Total	31.41	80			
Leadership	Between Groups	0.30	2	0.15	0.61	0.55
	Within Groups	19.42	78	0.25		
	Total	19.72	80			
Core value	Between Groups	0.21	2	0.10	0.31	0.74
	Within Groups	26.02	78	0.33		
	Total	26.22	80			
Resources	Between Groups	0.12	2	0.06	0.12	0.89
	Within Groups	37.92	78	0.49		
	Total	38.03	80			
Structure	Between Groups	0.21	2	0.10	0.22	0.80
	Within Groups	37.17	78	0.48		
	Total	37.38	80			
Capacity Building	Between Groups	0.20	2	0.10	0.30	0.74
	Within Groups	25.43	78	0.33		
	Total	25.62	80			
Information &						
communication	Between Groups	0.24	2	0.12	0.35	0.70
	Within Groups	26.82	78	0.34		
	Total	27.07	80			
Rewarding	Between Groups	0.18	2	0.09	0.25	0.78
	Within Groups	28.41	78	0.36		
	Total	28.60	80			

Table 12: Comparison between institutionalization elements and experience

The working experience of participants included in this study varied between 9-34 years. For the convenience of this study the years of experience were divided into three categories; less than 15, 16-22 and more than 22 years. ONE WAY ANOVA statistical test found no significant differences between years of experience and all sub-scale dimensions (Table 12).
		Sum of	df	Mean Square	F	P value
		Squares				
Policy	Between Groups	.129	3	.043	.127	.944
	Within Groups	26.094	77	.339		
	Total	26.223	80			
leadership	Between Groups	.802	3	.267	1.087	.360
	Within Groups	18.921	77	.246		
	Total	19.722	80			
Core value	Between Groups	1.881	3	.627	1.635	.188
	Within Groups	29.527	77	.383		
	Total	31.408	80			
resources	Between Groups	.215	3	.072	.146	.932
	Within Groups	37.819	77	.491		
	Total	38.034	80			
Structure	Between Groups	.981	3	.327	.692	.560
	Within Groups	36.396	77	.473		
	Total	37.377	80			
Capacity Building	Between Groups	.309	3	.103	.314	.815
	Within Groups	25.315	77	.329		
	Total	25.624	80			
Information	Between Groups	3.943	3	1.314	4.376	.007*
and						
communicatio	on					
	Within Groups	23.124	77	.300		
	Total	27.066	80			
Rewarding	Between Groups	.183	3	.061	.165	.919
	Within Groups	28.414	77	.369		
	Total	28.597	80			

 Table 13: Comparison between institutionalization elements and position

As shown in table 13, Participants were categorized according to there position into regular employee, department head, supervisors and manager. The result revealed no significant statistical differences between different positions in all subscale dimensions, except information and communication factor (p 0.007). Manager had mean scores more than the other position.

# Chapter 5

### **Conclusions and Recommendation**

#### Conclusion

Although evaluating projects in general is very important area, it is largely neglected in the Palestinian organizations including the Ministry of Health (MOH). QIP project was one of the long term development projects that lasted for long period. After a 10year of this project a lot of efforts been implemented, thus the Ministry of Health is in a crucial need of an evaluation of this efforts and this would be a good opportunity for the decision maker and the researcher to assess to which level the Quality Improvement Project has institutionalized into the MoH organization. Assessment the project sustainability will be closely linked with its relevance, because this is the question of whether the positive effect will continue in the long run.

The researcher conducted this study to assess to which level the Quality Improvement Project (QIP) met its objectives and the QA concepts and activities have been institutionalized into the Ministry of Health units. The researcher developed a self administered questionnaire to gather data from all those involved in quality improvement activities and focused on evaluating the impact of the QA project on their work settings particularly in terms of sustainability and institutionalization. Institutionalization means that people know what needs to happen to provide quality care, they have the skills to make it happen, and they are committed to making it happen over time within the available resources.

The study found that about half of the participants were middle age between 41-50 years. The highest percent of the participants being from Gaza City reflects the majority of health facilities at the MOH that are located at Gaza city, especially the

main public hospitals (Shifa Hospital, the Pediatric Hospital and the Ophthalmic Hospital). Doctors represented the highest percent (43.3%) of the participants, followed by the nurses who represented 33.3%, administrators 16% and others health professionals such as laboratory technicians and other paramedical represented 7.4%. Participants profile showed that about half of the subjects were department head, the second highest category was regular employee whom represented about one quarter of the subjects, the third category was the supervisor (12.3%), and the least category was the manager (18.5%). The highest percent of department head reflects their highest actual number compared with other job titles.

The study indicated that large proportion of the participants claimed that health workers having no appropriate feedback regarding their performance and less responsibilities. Moreover, About 41% of participants believe that health workers dealing positively towards achieving the quality development activities and about 42% got enough knowledge and awareness of the quality development activities.

To facilitate the analysis in a more consolidated the researcher conducted factor analysis, as a result of factor analysis; eight factors (dimensions) were emerged and labeled as policy, leadership, core value, resources, structure, capacity building and information and communication. The findings showed that the mean of factors was ranged from 3.26- 2.19. The highest mean was seen with leadership factor (mean 3.36) whereas the lowest level of perception was seen with information and communication factor (mean 2.19).

Males and females had relatively similar mean scores in all sub-scale dimensions, therefore, there were no significance statistical differences were observed between both female and male in all sub dimensions. Similarly, participants from different residency showed no statistical significance differences in all sub-scale dimensions, except for the core value factor and the Information & communication factor. The study findings showed that there was no significant statistical difference in all sub scale dimensions except policy factor. However, nurses had higher mean score than other occupation.

A significant statistical difference between work place and capacity building sub-scale dimension was revealed. In addition, the study revealed a marginal statistical significance between work place and information and communication sub-scale dimension. However, participants working in PHC had more mean scores in all subscale dimensions than those participants working in hospitals.

#### Recommendations

- So far quality improvement activities focused on introducing the concepts of quality improvement in the health care systems. Achievements made by this project need further support and enrichments to move it from the desensitization phase to the implementation phase.
- The study showed that a considerable number of male participants have participated in the QIP activities, however, the number and distribution of those participants is still inadequate and imbalanced; therefore, more focus on PHC sector and on pursuing female participation should be considered.
- It is clear that the approach used to introduce the quality improvement wasn't the appropriately perceived one. Any future quality improvement efforts must consider the pitfalls of the approached used to introduce quality.
- Extra efforts need to be taken to ensure that quality improvement is taking care at health facilities as a part of routine day to day operations.

- Although participants have been trained on quality improvement approached, few of them engaged in quality improvement activities, or have good knowledge about quality, therefore, quality should be seen as a continuous process that requires follow up and monitoring.
- From institutionalization perspective, more focus should be directed on increasing communications and information about quality. Unless quality initiatives are adequately communicated, it could not be institutionalized.
- For increasing institutionalization, focus should be directed at developing and empowering an effective rewarding system that acknowledges proper performance.
- To institutionalize quality as a part of the organizational culture it is important to develop an effective organizational structure supportive to quality.

# **Chapter 6**

# References

Aspinwall, K. (1996), "Becoming a learning organisation: the implications for professional development". *Management in Education*, *10*,*4*,*7-9*.

Beckhard, R. & Harris, (1987). *Organizational Transitions: Managing Complex Change*. (2<sup>nd</sup> ed.) Reading, MA: AddisonWesley.

Beckhard, R. & Pritchard, W. (1992). *Changing the Essence*. San Francisco: Jossey-Bass.

Bennis, W. & Nanus, B. (1985). Leaders. New York: Harper & Row.

Bennis, W. (1989) On Becoming a Leader. Reading, MA: Addison Wesley.

Bennis, W., Benne, K, & Chin, R., Eds. (1985). *The Planning of Change*. 4<sup>th</sup> Ed., New York: Holt, Rinehart, & Winston, 98105.

Brager, G. & Holloway, S. (1992). "Assessing the Prospects for Organizational Change: The Uses of Force Field Analysis." *Administration in Social Work*. 16(3/4), 1528.

Chaudron, D. (1992). "How OD can help TQM." OD Practitioner. 24(1), 1418.

Chaudron, D. (1993, June). Organization Development Does not Equal Total Quality Management. Presentation to the San Diego Organization Development Network.

Cohen, S. & Brand, R. (1993). *Total Quality Management in Government*. San Francisco: JosseyBass, Inc.

Ezell, M., Menefee, D., & Patti, R. (1989). "Managerial Leadership and Service Quality: Toward a Model of Social Work Administration," *Administration in Social Work*. 13(3/4), 7398.

Gilbert, G. (1992). "Quality Improvement in a Defense Organization," *Public Productivity and Management Review*. 16(1), 6575.

Gilbert, G. (1992). Quality Improvement in a Defense Organization. Public Productivity and Management Review, 16(1), 65-75.

Hill Stephen, 1991. "Why Quality Circles failed but Total Quality management might succeed." British journal of industrial relations, 29(4), 541-568.

Handy, C. (1993), Understanding Organisations. London: Penguin.

Hyde, A. (1992). "The Proverbs of Total Quality Management: Recharting the Path to Quality Improvement in the Public Sector," *Public Productivity and Management Review*. 16(1), 2537.

Hyde, A. (1992). The Proverbs of Total Quality Management: Recharting the Path to Quality Improvement in the Public Sector. Public Productivity and Management Review, 16(1), 25-37.

Ishikawa, K, 1985.What is Total Quality Control? The Japanese way. Englewood Cliffs, New Jersey, Prentice- Hall.

Kanter, R. (1983). The Change Masters. New York: Simon & Schuster.

Martin, L. (1993). "Total Quality Management in the Public Sector," National Productivity Review, 10, 195-213.

Martin, L. (1993). "Total Quality Management: The New Managerial Wave." *Administration in Social Work*. 17(2), 115.

Massoud, R (1994). Total Quality Management of Health Care. Harvard School of Public Health

Ministry of Health (1999), *Strategic National Health Plan for the Palestinian People*. Palestine: MOH

Misener, T.R., Haddock, K.S., Gleaton, J.U. and Abu Ajamieh, A.R. (1996), "Toward

an international measure of job satisfaction". Nursing Research, 45,2,87-91.

Milakovich, M. (1991). "Total Quality Management in the Public Sector," *National Productivity Review*. 10, 195213.

Ministry of Health (2004). The Status of Health in Palestine (2003). Palestine

Nanus, B. (1992). Visionary Leadership. San Francisco: Jossey Bass.

Osborne, D. & Gaebler, T. (1992). *Reinventing Government*. Reading, MA: Addison-Wesley.

Packard, T. (1989). Participation in decision making, Performance, and job satisfaction in a social work bureaucracy. *Administration in Social Work*. 13(1), 5973.

Packard. T. & Reid, R. (1990). "OD in a Fire Department: Lessons in Using Parallel Structures and Institutionalization," *Consultation*. 9, 167184.

Pruger, R. & Miller, L. (1991). "Efficiency," Administration in Social Work. 15(1/2), 42.

Rapp, C. & Poertner, J. (1992). *Social Administration: A ClientCentered Approach*. New York: Longman.

Reid, R. (1992). Personal communication.

Robey, D. (1991). *Designing Organizations* 3<sup>rd</sup> ed., Homewood, IL: Irwin, p. 42.

Senge, P. (1990). The Fifth Discipline. New York: Doubleday Currency.

Smith, AK, 1993. Total Quality Management in the Public sector. Quality Progress, June 1993, 45-48.

Sugarman, B. (1988). "The WellManaged Human Service Organization: Criteria for a Management Audit," *Administration in Social Work*. 12(2), 1727.

Swiss, J. (1992). "Adapting TQM to Government," *Public Administration Review*. 52, 356362.

Swiss, J. (1992). Adapting TQM to Government. Public Administration Review, 52, 356-362.

Tichey, N. (1983). Managing Strategic Change. New York: John Wiley & Sons.

Tichey, N. (1983). Managing Strategic Change. New York: John Wiley & Sons.

Vroom, V. and Yetton, P. (1973). *Leadership and Decision Making*. Pittsburgh: University of Pittsburgh Press.

World Bank (1997), West Bank and Gaza: Medium-Term Development Strategy for Health Sector. Washington, D.C.: World Bank.