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**TOTAL QUALITY
MANAGEMENT: DESCRIPTIVE
ANALYSIS ON SUDANESE
ORGANISATION ON CRISIS
MANAGEMENT PREPAREDNESS**



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ABSTRACT

Organizations that have a crisis plan in place are seen to be better able to anticipate, recognize, manage, and respond to problems. A quantitative research method was used to administer a survey questionnaire in order to collect data for the purpose of assessing the level of preparedness among Sudanese companies. The survey received responses from 100 individuals who work for different companies. The participants' demographics were based on their age, gender, degree of education, employment, and marital status and work period. A two-sample t-test was performed to check for relationship between variable 1, Our organisation has a clearly defined crisis management plan in place strongly disagree and variable 2, there is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders. There was a positive correlation between the two variables, ($M = 25, V = 724$) and ($M = 25, V = 790$) $t(0) = 2.353363435, p = 0.5$. We can infer from this outcome that the organizations haven't taken any steps to be prepared for a last-minute disaster. We think highly successful businesses are typically crisis-ready, indicating that there may be a direct connection between overall economic success and organizational disaster preparedness.

Keywords: *Industry, Management, Improvement, Organisation, Performance, Quality*

JEL code: *H12*

INTRODUCTION

Traditional management prioritized generating high-quality goods and services while being more concerned with the organization's internal operations. Total quality management focuses on how to satisfy the customer rather than how to manufacture a good or service. One of the fundamental differences between comprehensive quality management and conventional management strategies is the delegation of quality responsibility to management. To "establish and maintain a climate in which employees consistently enhance their capacity to deliver on-demand products and services," TQM calls for efforts from all levels of a firm. Although there is no method that is widely approved, TQM operations frequently rely on quality control methods and instruments that have already been developed. Businesses employ Total Quality Management (TQM) as a method to enhance internal processes and increase customer satisfaction. The process's goal is to raise an organization's output quality through ongoing internal procedure improvement. Standards created as part of the TQM process may consider both business priorities and any current industry standards. One illustration of industry standards is adherence to multiple laws and regulations governing the business. TQM aims to set up a shared vision for systemic change that prioritizes long-term aims over short-term ones. Despite having its beginnings in the manufacturing industry, TQM's ideas are applied to a variety of businesses. Examples include manufacturing, banking, finance, and medicine. All employees take part in

reaching shared goals. Total quality management (TQM) and total productive maintenance (TPM) are the two core operational components of the quality management system (TPM). TPM requires the full cooperation of the entire workforce to be effective. On a regular basis, assess the efficiency of the team members (Nicolas Nicolaou & George Kentas, 2017).

If the candidate is unable to support the required pace or level of quality, you will need to replace him to "establish and sustain an atmosphere within which employees are always improving their capacity to deliver on-demand products and services that consumers will find particularly value," total quality management requires efforts at all levels of a firm. The ISO 9000 series of standards was developed and published by the International Organization for Standardization (ISO), Lean manufacturing, and Six Sigma" (Sabet et al., 2016). While there is no universally accepted approach, TQM operations often rely on quality control tools and techniques that have already been created. Total Quality Management (TQM) is a management concept designed to improve the quality of production and systems through time to meet the expectations of customers. TQM is a management method based on basic concepts and principles that encapsulate how a company should operate and, as a result, contribute to high levels of performance. (García-Alcaraz et al., 2019, Bigliardi and Galati, 2014, Vukomanovic, Radujkovic and Nahod, 2014) The TQM specifies the educational component's company strategy. Initiatives, approaches, and modes of education, as well as information technology and professional development, help improve the quality of instructional goals and the educational system. Aspects of the PDC are connected to the "Plan-Do-Check-Action" cycle. (Larina, 2015) Due to poor organizational performance in the Sudanese gold mining industry because of unethical leadership abilities and a weak quality management system. The answer put out in this article review is total quality management (TQM). By setting up a quality control system and strong leadership in the industry, total quality management will make it possible to develop and conduct high-quality performance concepts. Weak organizational effectiveness, in the opinion of experts, can result from poor leadership and management.

Rationale of Study

The study aims to ascertain the impact of total quality management on the development of strategic plans in the gold industry for both locally and internationally operated businesses in Sudan based on preparedness and communication by looking at the impact of long-term strategies on crisis management among mining companies operating in Sudan.

General Objective

The overall goal is to ascertain the extents to which top management in the organization uses strategic planning in crisis response by measuring preparedness and communication using survey scales that are obvious as a strategy and recognizing strategic planning and its significance in reducing the organization's crisis.

Research Question Guiding the study

To carry out the study, the following research questions listed below were formulated to guide the study data collection and analysis to be able to provide answers to the research hypothesis.

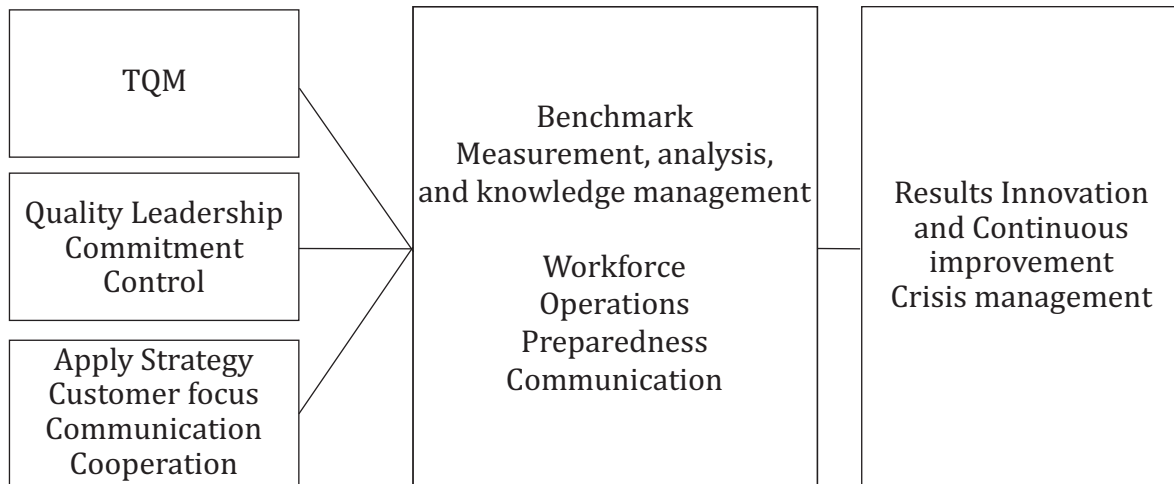
1. To what extent does the organizations in Sudan have a crisis management strategy in place for crisis management preparedness?
2. To what extent have the organizations in Sudan designated spokespersons who will communicate with all interested parties?

LITERATURE REVIEW

The review's objective is to provide a general overview of quality management practices in the Sudanese gold mining sector. A systematic review is a study that locates, gathers, and assesses all pertinent studies using systematic, repeatable techniques. The conceptual framework explains how comprehensive quality management is implemented in a firm using its seven areas. Every company leader should, for good reason, pay greater attention to customer input in order

to reframe their existing strategy and create improved communication and collaboration among employees in order to realize the same vision and goals. They also set a high bar for quality assurance and ensured that measurement, analysis, knowledge management, and retention were accurate. Employing the full quality management strategy would result in a workforce operation with high standards and ongoing improvement. These seven TQM categories are shown in Figure 1 below.

Figure 1. TQM Conceptual Framework on Communication and Preparedness



THE APPLICATION OF TOTAL QUALITY MANAGEMENT

Several studies have stated the application of total quality management (TQM) in their empirical studies ;some example a study conducted in Portugal, TQM implementation in Portuguese Higher Education Institutions(Antunes et al., 2018) and(Fitriani, 2019) This is where TQM, which values performance and consistency, can be used in the realm of education to deliver the highest quality education possible in the classroom. According to Lau, Tang and Li, (2015) Despite the fact that many of these improvement recommendations were implemented within ten years of the report's release, there is a paucity of literature documenting these accomplishments and the extent of TQM implementation. As stated by Nawelwa, Sichinsambwe and Mwanza, (2015)There is a scarcity of literature that documents accomplishments and the amount of TQM application in education. In other words, collaboration and teamwork are critical. Everyone is a client and a supplier in a TQM business; this perplexing idea underlines "the systematic structure of the activity in which all are involved." The key elements of TQM in secondary schools were discovered through research. The research focused on the principles 2, 6, 7, 10, and 13 of Deming's 14 fundamental principles, which were amended by Lockwood (1992). The "Four Pillars of Total Quality Management" are well-suited to these six ideas. Synergistic relationships, constant improvement, and self-evaluation are the four pillars(Kaiseroglou & Sfakianaki, 2020). Management, teachers as employers, students as employees and customers, and learning information as a product are all explored in this study. As stated in (Nawelwa et al., 2015) The 13 points of Deming's theory that can be applied to find improvement opportunities are seen in the table below.

According toAwwad and Mashagba, (2014) TQM is a management concept and practice that strives to maximize the effectiveness of an organization's human and material resources in order to achieve its goals. Many organizations hold organizational development programs such as seminars, workshops, and conferences to raise quality awareness and change employees' attitudes about TQM. We start out by providing a description of Edwards Deming's conceptual model, highlighting the key stages of development that have been discussed in the literature.(Busu, 2019) On the other hand, L.K. Ejionueme, (2015) also described the procedure

in their study, saying that TQM can be viewed as an administrative tool. It is a client-centered, fact-based, team-driven, and seminar-led management approach that seeks to bring happiness in the accomplishment of organizational goals. Incorporating a range of beneficial educational trends, such as teamwork, site-based management, cooperative learning, and outcomes-based education, is also made possible by this worldview.

Total quality management is a systematic method to education improvement, according to Deming (2004). TQM highlights teacher competency, creativity, commitment, teamwork, effective communication, and how educational administrators must lead to reach the full potential of all educational employees (Okorie and Uche, 2004). In conclusion, TQM has been incorporated into Deming's mode and can be applied to any functioning organisation as stated in the literature. Evaluation of available research, comprising W. Edward Deming's publications, from the internet and other sources: fourteen quality assurance principles" (Billah & Karim, 2021).

THE IMPACT OF TOTAL QUALITY MANAGEMENT

In this comprehensive literature review, several studies have emphasized the importance of TQM in their study. Nicolas Nicolaou and George Kentas, (2017) The study's major findings imply that by implementing both TQM and JIT production techniques, flexibility performance may be improved, and TQM should be viewed as the platform for maximizing the influence of JIT production on flexibility performance. A study conducted in India by (Sinha et al., 2016) TQM principles such as "Process Approach," "Mutually Beneficial Supplier Relationship," and "Factual Approach to Decision-Making" (TQM) have a favourable impact on the performance of Indian auto component SMEs, according to the study. The article examines the important QMPs that can have an impact on organizational performance in SMEs in the Indian automotive component business. Neyestani and Juanzon, (2016) stated that ten key performance indicators (KPIs) were identified and presented as an effective quality measures framework within the BSC system, allowing for the evaluation of essential issues that are critical to the success of TQM implementation in construction firms at the project and enterprise levels. (Alanazi, 2020) In their research, they discovered that primary TQM variables and strategy have a mediating role in the relationship between supportive TQM factors and organizational outcomes: The MBNQA model was used to make an empirical assessment. Primary variables and strategy alter the link between supportive factors and outcomes, while supportive aspects boost primary factors. The results support the MBNQA model's systems-based approach. Another study conducted in Turkey by Sadikoglu and Olcay, (2014) The findings revealed that the main challenges those Turkish businesses confront are a lack of staff involvement, employee knowledge and dedication, an inadequate firm structure, and a lack of resources. Firms should continue to use TQM across all factors in order to increase performance. "Sari and Firdaus, (2018) The application of TQM has a substantial impact on competitive advantage. Similarly, a competitive edge has a major impact on the company's performance. Permana, Purba and Rizkiyah, (2021) The findings reveal that this concept is still in use by numerous firms throughout the world, and that it has helped them improve their competitiveness, company growth, and sustainability, as well as staff morale. It is a comprehensive evaluation of the literature from a variety of industry areas that was gathered and thoroughly examined.

GOLD MINING IN SUDAN

In Sudan, there are more than 40,000 gold mining locations. In the country's 13 states, there are about 60 gold processing businesses, 15 of which are in South Kordofan. In various areas of Sudan that have been damaged by gold mining, different requests are being made. Some advocate for the total demolition of mining factories. Others desire safer working conditions as well as a decrease in the usage of cyanide and other harmful chemicals that have an impact on the environment and the population. Others favours the adoption of stronger environmental regulations and standards. The million people employed in the sector, particularly in gold

mining, have been the target of government controls. However, many activities in Sudan are crude and depend on conventional extraction techniques. 60 miners perished in one disaster last year when their tunnel collapsed, which is a typical occurrence in the mining industry. The substances used to extract gold, like as mercury, offer additional risks and have been linked to high cancer rates among employees (Dabanga, 2017). According to "Fadlallah et al., (2020) The recent gold rush in Sudan has escalated and spurred internal movement throughout the nation, ultimately drawing in a huge number of migrant workers.

According to government estimates from 2015, 14 out of Sudan's 18 states are home to more than a million miners who are directly employed. As a result, even though there are large mining companies, some of which are partially owned by the government, the informal prospector business still rules the gold market in Sudan. These unofficial prospectors then sell their finds to a small number of dealers. The Central Bank of Sudan (hereafter referred to as the CBOS), which is the Government's sole gold exporter (Ahmed Elbadawi & Madani Suliman, 2018). To oversee and manage the investigation and exploitation of the nation's mineral resources, the Geological Research Authority of the Sudan was established within the Ministry of Energy and Mining. Although Sudan has a long history of traditional, unofficial gold mining, organized, large-scale commercial gold production only began in the 1990s.

TOTAL QUALITY MANAGEMENT IN MINING INDUSTRY

We examine the effects of TQM on the mining sector in this section of the review, and we highlight some of the successful implementations from those nations. As stated in "Mireku et al., (2022) other nations in Asia and South America followed Bangladesh and the United States in adopting TQM after those two countries' utility service companies did so successfully. To repair their reputation and raise consumer satisfaction, utility firms in these areas started using quality control methods. When properly implemented, the quality control idea is a procedure supported by an organization's structure that guarantees development and advancement. Internal quality control is crucial because it offers a framework for ensuring effective resource use. One of the most widely used metaphors for achieving organizational success and growth in current literature is the concept of quality control principles.

An empirical study in Ghana stated in the findings of the study that the use of total quality management (TQM) methods in the small-scale gold jewellery sector and determining the extent to which TQM practices have been applied in the jewellery industry of Ghana, this study fills a knowledge vacuum. Fening, (2022) The study found that there are disparities in managerial education levels, managerial commitment to TQM, managerial awareness of TQM, utilization of new technology, putting the customer first, effective supervision, and enforcement of quality practices amongst the industries. When it comes to managerial dedication, managerial commitment level, and effective supervision, there are differences between the industries. Managers in these industries will benefit from the findings so they may start the process of achieving organizational excellence. However, the results of this study showed that there were insufficient resources for employee education and training, which had a detrimental impact on TQM practices. Another study conducted in Ghana based on implementation of TQM in manufacturing companies provided successful evidence as stated by (Hwy et al., 2013) The study proved that Ghanaian and foreign-owned manufacturing firms think that overall quality management is a critical component of a company's ability to survive. On the other hand, in another study conducted Abubakar et al., (2018) The results of the interview responses lead researchers to the conclusion that public HEIs lack the TQM philosophy, the management's attitude toward TQM is biased. It became clear that management does not support total quality management, but rather only quality assurance and quality control, which are components of TQM. A study was also conducted in India marble mining industry and the findings showed that India's marble mining sector lags well behind other sectors of the economy, with ISO 9000 being the most often used method for quality improvement. The outcomes demonstrate the level of

understanding, implementation problems, and outcomes attained through the use of ISO in this sector (Devpura et al., 2014). Combining TQM-TPM initiatives, as opposed to concentrating just on TPM, can considerably increase manufacturing performance in the organization (Singh & Ahuja, 2015).

EFFECTIVE CRISIS COMMUNICATION

Effective crisis communication will help the organisation before, during, and after the situation. According to Ray, (1999) Inner crisis communication manages members of the organisation as they react to the situation while external situation communication calls the media and publics in order to guarantee safe, present the position accurately, guide public action, and preserve goodwill. This way can take you to focus on the team that forms the organization's crisis communication policies. You can see to do these things: Situation communicating tactics within this crisis phase may consider the following:

This recognition of this occurrence as the situation by the organization's situation management team; the collecting and process of pertinent information to the crisis management team for decision making; and also, the dissemination of crisis messages to both internal and external publics of the organization. The reason organizations should describe these questions first. However, this strategy itself is essentially counter-intuitive Fischer & Heracleous, (2012). Companies are reluctant to disclose their situation because there is a danger that the world will never learn. Also, many individuals don't find the opportunities that matter most to their job. Individuals don't move themselves enough to the beats of the market or heed to their consumers/clients. Nor are they listening and working upon what the work is attempting to say them. Often individuals lack the needed mental assets and know-how to learn when and how to take action. When they go too slowly and lack the entrepreneurial life to course correct quick, they can't exploits the resources and human assets that exist within their own organizations. (Llopis, G., Jul. 2015) Crisis communication is the sub-specialty of the PR business that is designed to protect and defend the individual, company, or organisation facing the common situation to its reputation. The communication student Timothy Coombs defines situation as "the knowledge of an uncertain event that threatens critical expectancies of stakeholders and will severely affect the organization's performance and yield bad outcomes" and crisis communication as "the collection, processing, and distribution of information needed to communicate the crisis situation."

REVIEW SUMMARY

The review's conclusions state that top management is directly accountable for quality improvement as it relates to preparedness and communication in the organisation. Quality control and in-depth analysis can enhance operational procedures, resulting in more development and higher quality. It also demonstrates how quality improvement is a continuous process in all businesses that are interested in finding rapid fixes for operational issues. TQM's considerable impact on organizational development and the delivery of high-quality services has been further demonstrated. Table 1 below present the results of the systematic review finding of the literature.

Table 1.

TQM	Findings
Quality Leadership	Customers' requirements define quality. Quality improvement is a direct responsibility of top management. Thorough assessment and enhancement of operational activities leads to increased quality. Quality improvement is a continuous process that takes place throughout the company. Organizations dedicated with resolving rapid operational concerns. Long organization transformation is the responsibility of established cross-functional teams.
Commitment	
Control	
Apply Strategy	
Customer focus	
Communication	
Cooperation	
Preparedness knowledge management	
Continuous improvement	

METHOD AND MATERIALS

The research study is quantitative, a data gathering survey to examine the organization's preparation and communication in Sudan. In Sudan, a total of 100 participants who work for various companies responded to the survey. The participants' demographics were based on their age, gender, degree of education, employment, and marital status and work period as seen in the table below:

Table 2. Participants demographic data

work period		job				education level			
more than ten	less than ten	other	seller	jeweler	metallurgist	Graduate Studies	graduate	secondary	elementary
40	60	4	25	25	46	9	42	30	19
40%	60%	4%	25%	25%	46%	9%	42%	30%	19%

Table 3. Participants demographic data

Marital status		Age			sex	
single	married	from 51 -65	from 36 -50	from 20-35	female	male
19	81	21	31	48	14	86
19%	81%	21%	31%	48%	14%	86%

Procedure and Process

The survey was distributed to our research assistant, who visited participants at various companies to ask them to complete the form. Data was gathered, then uploaded for analysis using SPSS and Excel.

Data analysis

Using SPSS and an Excel worksheet, a descriptive analysis was carried out to address the investigation's questions listed below.

To what extent does the organizations in Sudan have a crisis management strategy in place for crisis management preparedness?

Is there a written crisis management plan in place, up to date, circulated and accepted by all stakeholders?

Findings

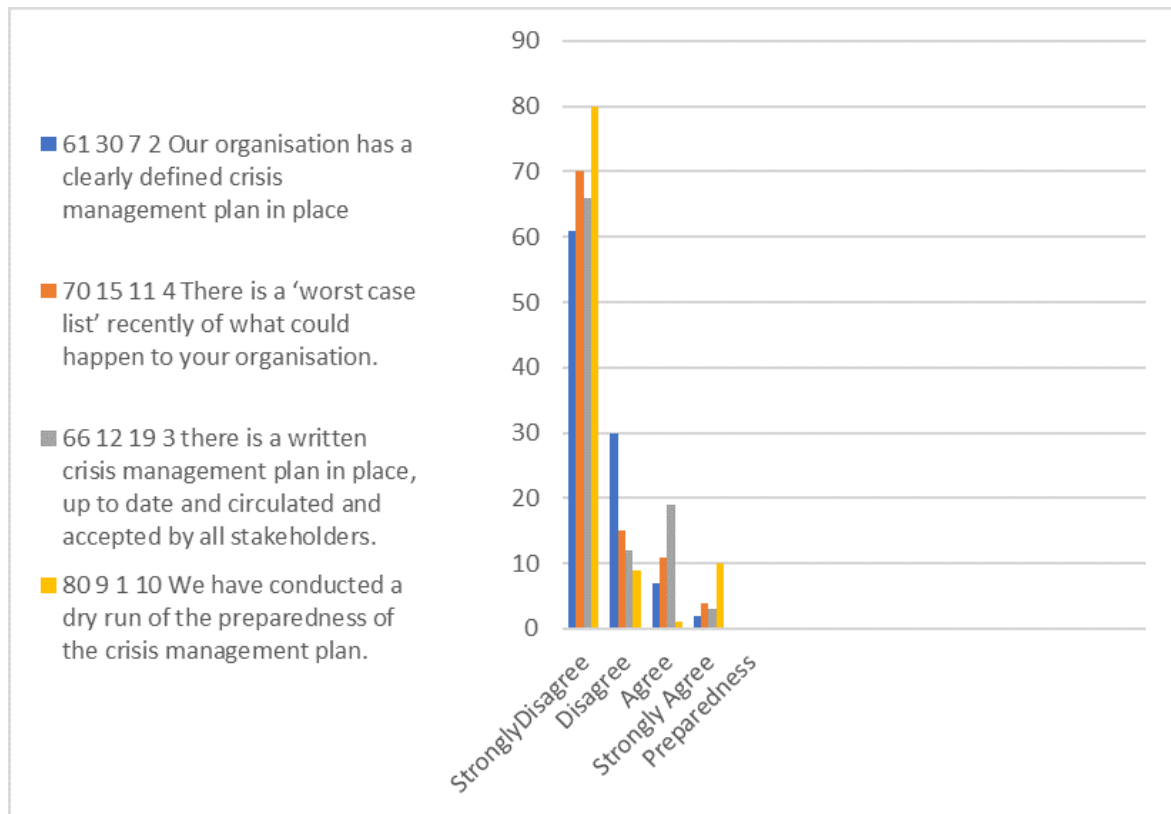
1. To what extent does the organizations in Sudan have a crisis management strategy in place for crisis management preparedness?

The descriptive analysis showed that, according to the participants n= 100, Responses to Our organisation has a clearly defined crisis management plan in place Strongly Disagree (, n=61), Disagree (n=30), Agree (n=7) Strongly Agree (n=2). Responses to There is a 'worst case list' recently of what could happen to your organisation. Strongly Disagree, (n=70) Disagree (n=15), Agree (n=11) Strongly Agree (n=4). Responses to there is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders Strongly Disagree, (n=66) Disagree (n=12), Agree (n=19) Strongly Agree (n=4). Responses to there is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders Strongly Disagree, (n=80) Disagree (n=9), Agree (n=1) Strongly Agree (n=10) as seen in (**Table 4**) *Descriptive table for organisation Preparedness for crisis*

Table 4. Descriptive table for organisation Preparedness for crisis

Preparedness (Items)	N	Strongly Disagree	Disagree	Agree	Strongly Agree
Our organisation has a clearly defined crisis management plan in place	100	61	30	7	2
There is a 'worst case list' recently of what could happen to your organisation.	100	70	15	11	4
There is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders.	100	66	12	19	4
We have conducted a dry run of the preparedness of the crisis management plan.	100	80	9	1	10

Figure 2. Descriptive analysis



A two-sample t-test was performed to check for relationship between variable 1, Our organisation has a clearly defined crisis management plan in place strongly disagree and variable 2, there is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders. There was a positive correlation between the two variables, (M = 25, V = 724) and (M = 25, V = 790) $t(0) = 2.353363435$, $p = 0.5$. on Item between and strongly disagree count. The result indicated that there is a significant correlation at 0.00 between the two variable and the result is shown below in *Table 5* t-Test: Paired Two Sample for Means.

Table 5. Test: Paired Two Sample for Means

	<i>Our organization has a clearly defined crisis management plan in place1</i>	<i>There is a written crisis management plan in place, up to date and circulated and accepted by all stakeholders 2</i>
Mean	25	25
Variance	7.246.666.667	790
Observations	4	4
Pearson Correlation	0.892115499	
Hypothesized Mean Difference	0	
df	3	
t Stat	0	
P(T<=t) one-tail	0.5	
t Critical one-tail	2.353.363.435	
P(T<=t) two-tail	1	

DISCUSSION

A word that was first accustomed describe a managerial strategy to improving quality. TQM may be a management technique that focuses on customer satisfaction as the way of achieving long-term success. During the late 1980s and early 1990s, TQM drew attention before being eclipsed by ISO 9000, Lean manufacturing, and 6 Sigma. there is no universally accepted approach, however efforts typically rely significantly on control technologies that have already been proved. The human aspect, it is visiting be said, plays a profound influence in TQM. Everyone's contribution to the attainment of one goal is exceptionally significant and beneficial, leading to their adoption of TQM. A management approach of an organisation centred on quality, supported the participation of all its members and aiming at future success through customer satisfaction and benefits to any or all or any members of the organisation and society. Total Quality Management is also a technique for continuously improving performance at every level, and everyone told areas of responsibility. one ideal is that the Sadikoglu and Olcay study in Turkey (2014). the foremost issues that Turkish enterprises confront are a scarcity of employee involvement, employee knowledge and dedication, and an insufficient organizational structure. TQM implementation has a considerable influence on performance, based on the studies. As shown in a study conducted in India, TQM themes such as "Strategic Process," "Improved Supplier Partnership," and "Truthful Methodology to Decision-Making" (TQM) have a favourable impact on the development of Indian auto sector SMEs. (Sinha, Garg, and Dhall, 2016). The article looks at the foremost QMPs which can affect the performance of SMEs within the Indian automotive part industry. These are other studies that have also supported the findings of this current review manuscript (Mehralian et al., 2016) if social responsibility toward stakeholders is entrenched in operational routines and procedures, managers can deepen their relationships with stakeholders and, as a result, increase organizational performance. This proposed framework would aid firms in implementing TQM efficiently in their organizations while taking into consideration both internal and external organizational aspects. The findings raise previous research that has revealed mixed results when it involves the direct link between social responsibility and organizational success (Nasim, 2018). Alaghbari, Al-Dubai & Arishi, (2022) result also supported the impact of TQM in organisation management they stated that there is a strong link between employee engagement and organizational performance, between understanding of the company and rewards and recognition, and between education and training and organizational performance." (Androwis et al., 2018) also confirmed that the finding TQM is regarded as a major component in a firm's survival. Additionally, it offers actual evidence that TQM deployment in manufacturing firms improves their performance and likelihood of surviving. A study was carried out in Vietnam, and the findings matched this review's findings identically. Their analysis implies that Vietnamese businesses should adhere strictly to the TQM philosophy and put it into practice at this early stage of the process to reap significant benefits for long-term development, which is exactly what we were advocating for the Sudanese gold mining sector. On the other hand, Sader, Husti and Daróczy, (2019) provides a theoretical framework for integrating Industry 4.0 elements with TQM principles (in accordance with the ISO 9000:2015 standards family) in order to pave the way for future study into the true effects of utilizing Industry 4.0 for servicing TQM implementation methodologies. 'Kalogiannidis, (2021) According to their study's findings, marketing and TQM procedures have a significant impact on quality, hence they should constantly be used in businesses. The results of the study supported the existence of a link between TQM procedures and organizational performance.

The success of organizations and marketing strategies were positively correlated. The study's notion, which relates to its conceptual framework and shows how organizational performance and market strategies are associated, and (Jimoh et al., 2019) Better organizational performance depends on the mediating functions of methods for continual improvement. Therefore, it is essential for businesses seeking a competitive edge to place a high value on TQM processes while putting the proper continuous improvement techniques in place. Salhieh & Abu-Doleh, (2015) A research by the Bank of Jordan found that TQM methods in technical systems and

human resource management influenced the technical efficiency of banks. The study found a link between TQM practices and successful organizational outcomes. Only commercial banks listed on the Amman Stock Exchange's first market were examined in this study. TQM activities, quality, and innovation performance were found to be positively correlated' (Zehir et al., 2012). In addition, (Baird et al., 2011) The research results help organizations by offering advice on how to create an environment that supports total quality management, which helps them achieve their operational goals. Nonetheless (Talib et al., 2013) asserted that there was only a tenuous relationship between TQM methods and the high calibre of the output generated by Indian service businesses. The key TQM practice in terms of quality performance was also showed to be quality culture. (Obeidat et al., 2016) stated that the concept of knowledge management relies on comprehensive quality management techniques. Their study intends to highlight the significant influences of knowledge management usage on total quality management methods based on a thorough literature assessment. Same as the intention of this current systematic review of total quality management on gold mining industry performance in Sudan.

CONCLUSION

The study's aims were to present theoretical evidence of total quality management's effects on organizational improvement and to suggest TQM as an alternative model for the development of Sudan's gold mining sector. Based on a systematic evaluation of a small number of research, the review's findings showed that TQM practices were linked to companies' quality performance, which was incredibly helpful to top management in the service industry in improving quality performance by changing their current TQM procedures. The review's findings further show that top management bears primary responsibility for quality enhancement with respect to customer expectations. Operational methods can be improved by quality control and in-depth analysis, leading to more advancement and higher quality. It also proves how quality improvement is an ongoing effort in all companies that are looking for quick remedies for operational problems. It also proven how TQM significantly influences organizational development and the delivery of high-quality services. The conclusion is that although most organizations used other methods before implementing TQM, however, TQM model delivered successful results for organizational change.

RECOMMENDATION

To contribute to future studies that are more pertinent to the global community, it is advised that the techniques used in this study be applied to other sectors of the same segment or other segments. This review study outlines and suggests total quality management (TQM) for the Sudanese gold mining industry, as well as the essential elements of TQM.

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**ÜMUMİ KEYFİYYƏTİN İDARƏ EDİLMƏSİ:
BÖHRANIN İDARƏ EDİLMƏSİ HAZIRLIĞI ÜZRƏ
SUDAN TƏŞKİLATININ TƏSVİRİ TƏHLİLİ**

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SUMMARY

Böhran planı olan təşkilatların problemləri qabaqcadan daha yaxşı görmək, tanımaq, idarə etmək və onlara cavab vermək bacarığı olduğu görülür. Sudan şirkətləri arasında hazırlıq səviyyəsini qiymətləndirmək məqsədi ilə məlumat toplanması üçün sorğu anketindən istifadə edilmiş və kəmiyyət tədqiqat metodu tətbiq edilmişdir. Sorğu müxtəlif şirkətlərdə çalışan 100 nəfər arasında keçirilmişdir. İştirakçıların demografik göstəriciləri onların yaşı, cinsi, təhsil dərəcəsi, məşğulluğu, ailə vəziyyəti və iş müddətinə əsaslanıb. İki nümunəli t-testi aparılmışdır ki, dəyişən 1 -təşkilatımızın dəqiq müəyyən edilmiş böhran idarəetmə planı var, qəti şəkildə razi deyiləm və dəyişən 2 -yazılı böhran idarəetmə planı mövcuddur, aktualdır, yayılır və bütün maraqlı tərəflər tərəfindən qəbul edilir, arasında əlaqə yoxlanılsın. İki dəyişən arasında müsbət korrelyasiya var idi, ($M = 25, V = 724$) və ($M = 25, V = 790$) $t(0) = 2,353363435, p = 0,5$. Bu

Yekundan belə nəticə çıxara bilərik ki, təşkilatlar qəfil baş verəcək fəlakətə qarşı hazır olmaq üçün heç bir addım atmayıblar. Biz hesab edirik ki, yüksək dərəcədə uğurlu bizneslər adətən böhrana hazırlıqlıdır və bu, ümumi iqtisadi uğur və instutsional fəlakətlərə hazırlıq arasında birbaşa əlaqənin ola biləcəyini göstərir.

Açar sözlər: *sənaye, idarəetmə, təkmilləşdirmə, təşkilat, performans, keyfiyyət*

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