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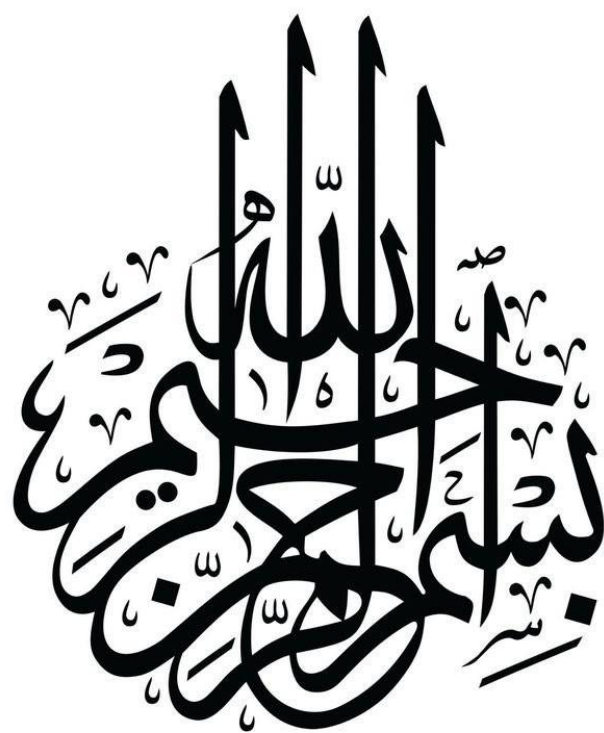
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شكر و تقدير

الحمد لله حمدا كثيرا، والصلاة والسلام على اشرف الانبياء والمرسلين سيدنا محمد عليه أفضل الصلاة واتم التسليم وبعد:

أتقدم بالشكر والتقدير لجامعتنا الموقرة جامعة ميدأوشن ممثلة في مؤسسها معالي المستشار الاستاذ/ ناصر المحيميد، ومديرها الدكتور/ محمد أحمد الذين اتاحوا لنا هذه الفرصة لمواصلة الدراسة والوصول لهذه المرحلة.

كما اتقدم بجزيل الشكر والعرفان للدكتور/ الفیصل عبد الحمید محمد و الدكتور / فايز علي جراد على جهودهم ونصائحهم وتقديمهم لنا كل الدعم لاستكمال هذا البحث.

كما اشكر جميع اعضاء هيئة التدريس الذين علمونا العلم بكل صدر رحب خلال الفترات السابقة ولم يبخلوا علينا بتقديم العلم والمعرفة الذي نفعنا في دراستنا وحياتنا.

وختاما اشكر كل من ساهم في ظهور هذا العمل من دعم وتوجيه.

واسأل الله لي ولكم كل التوفيق ،،،

الباحثون

بدر قبلاوي

روضة أبو الطاهر

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Abstract

This comprehensive study investigates the leadership factors critical for effective risk management and ensuring project success within Saudi Aramco. By employing qualitative research techniques, the study delves into the practices and challenges associated with risk management and business continuity in the organization. It incorporates in-depth interviews with management and meticulously designed questionnaires to gather relevant data on risk management and organizational resilience.

The literature review section lays a solid foundation, while the methodology elaborates on the qualitative approach and thematic analysis. This approach highlights key areas such as risk prevention, decision-making processes, and organizational culture, demonstrating the influence of transformational and transactional leadership on organizational outcomes.

The study underscores the importance of theoretical framing in developing models for future research. The findings have notable managerial implications, offering strategies to enhance business preparedness and resilience. Despite challenges like limited access to leaders and the inherent limitations of self-reported data, the study presents valuable insights.

A sample of 100 participants was selected for data collection. The empirical testing of the study's hypotheses was conducted using linear regression analysis, which confirmed all four hypotheses (H1, H2, H3, and H4). The results showed significant p-values ($p < 0.05$), indicating substantial relationships between the dependent and independent variables.

Keywords: Leadership, risk management, project success, transformational leadership, transactional leadership, organizational resilience.

الفصل الأول

Chapter 1: Introduction

Saudi Arabia being one of the biggest exporter of oil in the globe at the moment, is in the process of transition and reforms in order to execute Vision 2030. Saudi Arabia relies on projects to leverage the success for economic nourishment, and thus project leadership is quintessential to influence project teams and achieve the project intent (Holzmann & Mazzini, 2020). Since more organizations are embracing project management, more organizations are experiencing the need to use good project leaders (Ika, Diallo, & Thuillier, 2012).

Therefore, this research study seeks to establish the impact of leadership style on project success in Saudi Arabia with a focus on Saudi Aramco, the largest oil producer globally. The leadership styles are; they include the transactional and the transformational leadership styles. Hence, leadership has been proven by various research articles to play an important role in the growth of the organization and the success of projects (Saasongu, 2015; Zheng et al., 2021). More specifically, some of the gaps in the existing literature include the absence of empirical research on how project managers' leadership patterns are linked with the success of projects in the field of project management (Aboramadan & Kundi, 2020; Anantatmula, 2010; Hyväri, 2006).

Thus, having a strong leadership in the constantly evolving business environment is crucial for efficient management of risks and stability. Decision-making and strategic and tactical planning relate directly to the evaluation of risks and vulnerabilities, as well as response capabilities, on a firm's operational agility. Thus, this paper aims at examining the correlation between risk management and leadership with a focus on the leadership styles and their impact on organizational risk management. Organizational resilience as a key characteristic

of the organization devoted to the ability of the management to facilitate the organizational adaptation to the conditions of uncertainty and change is inextricably linked to the issues of risk management and leadership.

1.1 Research Problem

Saudi Arabia is rich in natural resources and the country of great importance geographically and the politically. This study has focus on the leadership factors and styles i.e. transformational and transactional leadership styles. Further, the study considers the risk management which is crucial for the project success in Saudi Aramco. Strategic planning and processes are used to manage risk so that the project can be completed successfully.

1.2 Research Importance

The changing dynamics of the technology also affects the Saudi Kingdom and it changes the traditional styles of leadership. The employees are no longer treating like the earlier practice so it is dire need to evaluate the best suited leadership style. Leadership has numerous and critical effects on the project success because it not only affect the motivational level of employees but also helps in risk management. Due to technology advancement, the risk level also increases significantly and it is crucial to manage tactfully to make the project successful.

1.3 Research Objectives

The objectives of this study are to:

- Identify the leadership characteristics that help in managing risks and evaluate how various leadership beliefs influence organizational resilience in Saudi Aramco.
- Evaluate how various leadership styles affect risk management strategies and explore the challenges leaders face in managing risks.

- Recommend strategies for leaders to enhance risk management capabilities and develop a framework to improve organizational resilience through effective leadership.

1.4 Research Questions

To achieve these objectives, the study will address the following questions:

- What key leadership traits contribute to effective risk management in Saudi Aramco?
- How do different leadership philosophies affect organizational resilience and risk management strategies?
- What are the typical challenges leaders encounter while managing risks, and what steps do they take to enhance organizational resilience?
- What strategies can executives use to strengthen organizational resilience and risk management procedures?

1.5 Company Background

Saudi Aramco is the biggest oil producer in the world, providing almost ten percent of the world's oil demand. Since the beginning of its Top 50 Oil Company series, renowned energy trade publication Petroleum Intelligence Weekly (PIW) has placed Saudi Aramco as the top oil company on a continuous basis. These rankings are determined by six factors, including reserve size, production of oil and natural gas, capacity for refining, and volumes of sales of petroleum products (Jaffe &Elass, 2007).

In PIW's rankings, Saudi Aramco has been ranked #1 for eighteen years. The firm ranks fourth globally in managed gas reserves, is the top producer of gas output, petroleum product sales, and refining capacity. It is also the world's top exporter of crude oil and natural gas liquids. Saudi Aramco, the nation's state-owned energy company, controls all domestic

hydrocarbon production, exploration, development, refining, processing, marketing, and distribution.

After the Saudi government gave the business permission to take over all downstream operations in the nation, Saudi Aramco became the largest integrated oil company in the world in 1993. This involved buying the majority of the oil holdings held by the General Organization for Petroleum and Minerals (Petromin) as well as the Saudi Arabian Refining and Marketing Company (Samarec). By 1996, Saudi Aramco controlled every link in the hydrocarbon chain in the kingdom, including significant stakes in the lubricants industry through Petrolube and Luberef (Jaffe &Elass, 2007).

Among the roughly 80 oil and gas fields in Saudi Arabia are some of the biggest in the world, like Ghawar and Safaniya. About half of Saudi Arabia's total oil production capacity is accounted for by Ghawar alone. From Arabian Light to Arab Super Light, these fields yield a variety of crude types that make a substantial contribution to the world's energy supply.

In an organization the size and strategic significance of Saudi Aramco, project success depends on the leadership's comprehension of risk management. The purpose of this paper is to shed light on how strong leadership may improve risk management procedures, which will in turn help projects succeed and an organization's overall resilience.

الفصل الثاني

الدراسات السابقة

Chapter 2: Literature Review

2.1 Leadership

Research on leadership has mostly concentrated on the traits of leaders and how they affect companies since the 1980s (Pedraja-Rejas et al, 2006). This study is based on Bass' thesis, which holds that transformational leaders inspire followers by providing challenges, supporting personal growth, and inspiring them. Transformational leadership cultivates a shared mission and vision, as well as a feeling of purpose, to establish high standards for the group. On the other hand, transactional leadership functions as a kind of bargaining between a leader and their followers, whereby followers are motivated by particular prizes that are only given out after completing duties assigned to them. Furthermore, the leader of a "laissez-faire" style rejects control and gives subordinates the freedom to decide for themselves (Bass, 1985).

2.1.1 Transformational Leadership, organizational resilience and Project Success

Project management (PM) has been the focus of a lot of work on transformational leadership (TL). Studies have demonstrated the applicability of TL to project-based organizations, despite the dearth of substantial empirical research in this field. By encouraging people to meet project and organizational goals and imparting strong morals and values, TL has a good impact on staff members (Gundersen et al., 2012; Pieterse et al., 2009).

According to Robbins and Judge (2013), one of the century's most important theories is TL. Studies show that when it comes to accomplishing project and organizational goals, transactional leadership is not as effective as team leadership (Conger, 1999; Dubinsky et al., 1995; Yammarino et al., 1993). According to studies (Piccolo et al., 2010; Kissi et al., 2013; Burke et al., 2006), transformational leaders improve teamwork, dependability, and self-

organization skills. These findings demonstrate a substantial positive correlation between TL and project performance.

Team members put forth their best efforts to ensure project success in an environment that is created by transformational leaders. They foster a culture of support that motivates staff members to grow, take on new tasks, and contribute to the accomplishment of projects (Anantatmula, 2010). TL has gained acceptance as a successful leadership approach that boosts performance, encourages teamwork, and influences workers to complete tasks (Fareed & Su, 2022b; Raziq et al., 2018; Amin et al., 2016; Hassan et al., 2017).

Adopting TL has made it easier for project managers to create a work environment that prioritizes the welfare, well-being, and safety of their people. Project success rates are better when team members trust and appreciate these leaders (Boamah et al., 2018). Since TL inspires workers and helps them reach both organizational and personal objectives, it has a significant positive correlation with project performance (Fareed & Su, 2022b; Fareed et al., 2021; Andriani et al., 2018).

In order to steer the organization toward improved performance and successful change management during times of crisis, strong leadership is essential (Sommer et al., 2016; Teo et al., 2017). According to Zehir and Narcıkara (2016) and Southwick et al. (2017), resilient leadership fosters consistent and interdependent teams, which is crucial for organizational resilience. To promote resilience, leaders need to identify issues early, act decisively, coordinate well, and communicate clearly (Boin et al., 2013).

By articulating the organization's purpose, values, and vision, transformational leaders create a positive and productive conceptual orientation that greatly enhances organizational resilience. The process of making meaning of uncommon events aids in the comprehension and efficient response to such events by the organization and its people (Lengnick-Hall et al.,

2011). People's views during times of crisis are influenced by leadership style, especially transformational leadership, which also affects organizational performance (Teo et al., 2017). Transformational leaders set high standards for performance, convey a clear mission and vision, and show determination (Waldman et al., 2001).

Given the context of this study, it is hypothesized that:

H1: Organizational resilience and risk management effectiveness are positively impacted by transformational leadership.

Organizations such as Saudi Aramco can contribute to the wider aims of economic development defined in Saudi Arabia's Vision 2030 by achieving their strategic objectives and improving project performance through the integration of transformational leadership and risk management practices (Syed, Alaraifi, & Ahmad, 2019).

2.1.2 Transactional Leadership and Organizational Resilience and Risk Management

Transactional leadership refers to an organization's capacity to methodically handle, adjust, and reduce risks in a setting that is marked by uncertainty and fast change. It includes the organization's capacity to identify and manage risks, quickly adjust plans and procedures, and deftly handle difficulties and interruptions (Bass, 1985). Transactional leaders are excellent at setting clear objectives, articulating expectations, and enforcing performance-based incentives and sanctions. By fostering an organized and goal-oriented work environment, these measures enable firms to effectively manage risks and overcome obstacles (Robbins & Judge, 2013).

Rewards and incentives are frequently used by transactional executives as instruments for employee motivation. These benefits may be subject to performance, goal attainment, or the display of sensible risk-management practices. Transactional leaders create a motivating atmosphere that encourages staff members to follow risk guidelines, think creatively within

pre-existing frameworks, and move quickly in the face of new threats by tying rewards to risk management outcomes (Yukl, 2013). Motivated workers are more likely to demonstrate compliance and diligence in their work, which strengthens the overall resilience of the business (Bass, 1985).

In a similar vein, transactional leaders who place a high value on staff development can encourage organizational resilience. These executives improve the abilities, know-how, and competences of their staff members by implementing programs like training, coaching, and mentoring. By enabling workers to be more flexible, adaptive, and capable of handling changing circumstances, these development initiatives support organizational resilience. Individual development needs can be recognized by transactional leaders, who can then match them with the organization's risk management specifications (Northouse, 2018).

Performance evaluation and feedback are given top priority by transactional leaders. Employees are provided with opportunities to assess their performance, pinpoint areas in need of development, and make the required modifications through frequent feedback sessions. This focus on ongoing development is consistent with a risk-taking and learning mindset. According to Kaplan and Norton (1996), transactional leaders that provide their staff with constructive criticism and foster their personal development foster an environment of continuous learning and improvement, which strengthens the resilience of the firm.

Although transactional leadership emphasizes consistency and conformity, it can also provide freedom within predetermined parameters. Giving staff members the freedom to use their own discretion and initiative while adhering to policies and procedures is one way that transactional leaders can empower their workforce. This approach facilitates self-organization and response to risk, as well as accountability and ob servicing of organizational goals into making the organization resilient (Eagly& Carli, 2003).

It is apparent that transactional leadership is open to influences of the organizational context as far as its effectiveness in promoting organizational resilience and supporting risk management is concerned. Key decision variables are operational and strategic factors like size of the organization, nature of business, status of technological innovations and matters related to the external environment context that can influence the relationship of transactional leadership and resilience. It is therefore important that the Leaders apply transactional leadership in regards to the context of the organisation and the challenges that it faces in its operations (Avolio, Walumbwa & Weber, 2009).

Therefore, it has been revealed that effectiveness of transactional leadership is associated with the development of a culture of sustained improvement. Operationalizing the mechanisms of high-performance goals and setting high standards for performance, transactional leaders encourage their subordinates to consider ways of improving and optimizing processes and performances. This culture of refinement fits well with the spirit of resilience as organizational practices adapt in response to the risks as well as challenges and improvements are constantly made (Palmisano, 2007).

From this perspective, it can be assumed that the primary leadership style in an organization determines the organization's resilience and risk management, but the exact relationship between these concepts remains ambiguous in the literature. The impact of leadership on organizational resilience is well acknowledged by some leadership studies (Yukl, 2013). According to the findings of Ghadampour and Zandkarimi (2018) as well as Akkaya and Tabak (2016), transactional leadership significantly and favorably impacts organizational resilience and risk management. As a result, the following theory is put forth:

H2: Transactional leadership moderately impacts organizational resilience and risk management tactics.

2.2 Effects of Different Leadership Styles

An alternate framework to the Ecology of Organizations hypothesis is provided by the Upper Echelons hypothesis, which highlights a number of factors, including leadership style, as significant contributors to organizational effectiveness (Hambrick & Mason, 1984). It has been demonstrated that a leader's style has a direct impact on organizational outcomes and the decision-making process (Finkelstein, Hambrick, & Cannella, 2009). Research has shown that social climate, productivity, and group work processes are all impacted by leadership style. This means that leadership has a direct impact on productivity as well as an indirect effect through organizational climate (Podsakoff, MacKenzie, & Bommer, 1996; Yukl, 2013).

Various leadership philosophies have an impact on elements like accountability, clarity, dedication, standards, rewards, flexibility, and in certain situations, the general atmosphere of the company (Avolio, Walumbwa, & Weber, 2009). A leader's approach shapes individual behavior inside the organization through the establishment of reward systems, which in turn affects subordinates (Bass, 1985). Moreover, gender has been linked to leadership style and has an impact on how decisions are made (Eagly & Carli, 2003).

Leadership style has an impact on the competitive and inventive culture, which in turn affects organizational performance. Therefore, through its influence on organizational culture, the leadership style affects how well an organization performs (Schein, 2010). Subsequent studies have shown that organizational outcomes are explained collectively by leadership style, procedures, goods, services, people, and client focus (Kaplan & Norton, 1996).

It's critical to acknowledge the diversity of leadership philosophies and the difficulties in proving any one to be the best (Northouse, 2018). Determining a leadership style for a given decision in terms of performance necessitates examining elements like the decision's

significance, the value of dedication, the chance of success, the group's and the leader's experience, the group's support for reaching goals, and the team's proficiency (Vroom & Jago, 2007).

In order to steer the organization toward improved performance and successful change management during times of crisis, strong leadership is essential (Sommer et al., 2016; Teo et al., 2017). According to Zehir and Narcıkara (2016) and Southwick et al. (2017), resilient leadership fosters consistent and interdependent teams, which is crucial for organizational resilience. To promote resilience, leaders need to identify issues early, act decisively, coordinate well, and communicate clearly (Boin et al., 2013). Using the information given, we hypothesized the following claim:

H3: Leaders with strong mental abilities are more adept at risk management and building organizational resilience.

2.3 Competent Managerial and Interpersonal Abilities in Risk Management and Organizational Resilience

Effective risk management and organizational resilience in contemporary firms are largely dependent on the possession of strong managerial and interpersonal skills. In order to effectively traverse uncertainties and disruptions, risk management involves not just technical expertise but also strong leadership qualities (Carson et al., 2007).

Strong managers are skilled in seeing possible hazards, evaluating their implications, and formulating calculated plans of action to reduce them (Turner & Cochrane, 1993). They are able to put into practice risk management frameworks that include risk analysis, response planning, identification, and ongoing monitoring (Kutsch & Hall, 2010). This proactive strategy helps organizations to prevent threats, exploit opportunities, and ensure business as usual in changing contexts (Hämäläinen & Saarela, 2011).

Besides, interpersonal skills are crucial when it comes to coordination and cooperation in a team, especially in situations characterized by certain (Thite et al., 2012). Interpersonal skills used by the leaders would increase confidence and help the team members to report any emerging risks and make sound decisions (Yukl, 2010). Such an environment enhances organizational structures and foundations by creating an opportunity for management to adopt strategies, experiences, and knowledge from other specialists that will not easily succumb to pressure from the outside world (Coutu, 2002).

A study highlights credible managerial and interpersonal skills as crucial tools in the success of building an organization's resistance. Such abilities are also possessed by leaders who are capable of managing the crises and ensuring the development of the organizational resilience by the members (Linnenluecke, 2017). They allow the employees to be creative, have resourcefulness in situations of harsh business conditions, and turn disasters into lessons that can aid the organization, as well as improve its capability for carefully and deliberately thinking through opportunities for recovery in case of business reverses (Hamel and Välikangas, 2003).

Based on the literature reviewed we devised below hypothesis:

H3: Competent managerial and interpersonal abilities positively influence organizational resilience and enhance effective risk management strategies.

2.4 Research Hypotheses

Based on the above research, the study formulates the following hypotheses:

- H1: Transformational leadership positively affects organizational resilience and the efficacy of risk management.
- H2: Transactional leadership moderately impacts organizational resilience and risk management tactics.
- H3: Leaders with strong mental abilities are more adept at risk management and building organizational resilience.
- H4: Competent managerial and interpersonal abilities are essential for successful risk management and organizational resilience.

الفصل الثالث

منهجية الدراسة

Chapter 3: Methodology

This study on "The Role of Leadership in Managing Risk to Ensure Project Success in an Arabian American Oil Co. (Aramco) in Saudi Arabia" will adopt a qualitative research approach in an effort to unravel the complex interactions of leadership, risk management, and organizational resilience within this Saudi Aramco. The choice of the method was to remain qualitative in order to focus on outlook from industry pioneers and risk management professionals. More specific open-ended questions were also asked to capture their practices and emotions or attitude concerning on leadership factors that support risk management and organizational resilience. Furthermore, thematic analysis was used to categorize the information received from interviews in order to detect some kind of repetition of similar topics. Such an approach to analysis allowed for the deeper investigation of how specific leadership types affect organizational behaviors in relation to risks and crises and provide grounded recommendations on how to improve leadership and organization's responses to emergencies.

3.1 Data Analysis

Interviews conducted aimed at qualitative data which went through thematic analysis to find out information closely related to the objectives of the research. At the start, the interview notes were thoroughly read by the authors to assign all the interviews and codes in connection with the leadership characteristics, risk mitigation measures and organizational preparedness or organizational resiliency of Saudi Aramco. By using iterative coding and categorization, these themes arose for leadership philosophies and the leadership practices that were considered to be most effective in order to manage risk and create resilience. These themes were systematically analyzed and categorized and this helped in getting a broad perspective of how leadership impacted on the organizations' orientation towards challenge and uncertainties. To increase credibility of the study and confirm effectiveness of certain leadership strategies in the management of risks in the organization, the study adopted a multi-source data assurance technique, which involved cross-checking and comparing different participant's views. Finally, the data analysis phase provided recommendations for improving Saudi Aramco's leadership capacity to respond and build organizational resiliency to risk in a constantly evolving operating context.

For the testing of hypotheses, linear regression analysis was used to get the significance level and percentage of variations in dependent variable due to independent variables.

3.2 Pros and Cons of Qualitative Data

Qualitative research essentially brings certain unique benefits which enhance the depth and scope of the knowledge in some multifaceted researching situations. It is also important because it is known to offer numerous insights: the depth of insights is quite impressive. Quantitative methods collect numerical data and provide insights into the structure of the phenomenon, while qualitative approaches introduce more comprehensive information about participants' point of view and data richness insufficient for the quantitative analysis. This depth enables the researchers to study the complexities of factors like the leadership characteristics in risk management and or the organizational resilience in the context of certain cultures and organizations. Furthermore, qualitative research is very effective in that it identifies factors surrounding individuals and their context, making it all-inclusive in the best way that mere quantitative approaches can only dream of. Another main strength of using qualitative methods is the flexibility, because during the data collection process, the researcher can change his/her strategies accordingly if new information appears during the research process. This maneuverability allows researchers to search for other possibilities that may arise in the course of research and shift concentration on most of the proposing themes.

However, there is also a list of challenges that certainly qualify research as well, associated with the use of qualitative research. One of the flaws that many people note is the issue of bias in data analysis. In contrast to such numerical data, qualitative analysis means that the results are interpreted by the researchers based on such features as themes and patterns identified in the data. Such an approach brings the problem of subjectivity, as the coders' bias and expectations may affect the search results and analysis. Another disadvantage is the fact that qualitative research is time consuming. Qualitative data requires extra precision when compiling and processing information by means of interviews, transcriptions, coding, and analysis. This process may be quite involving and time consuming, more so when one has to handle a bulky raw material in the form of qualitative data.

Furthermore, there is the problem of generalization in qualitative research configuration. On the downside, compared with quantitative investigations that seek generalizable findings about broader samples, qualitative results can be situation-bound and generally cannot be readily transferred to other contexts or groups. The nature of qualitative research to produce small sample size also contributes to the issues of generalization of results beyond the specific participants and settings.

3.3 Addressing Limitations

In an attempt to limit the aforementioned sources of weakness and invalidity inherent in qualitative data, certain strict procedures were followed in this research. Data source triangulation (applying interviews) helped confirm the identified themes, thus increasing the study's credibility. Moreover, reflexivity strategies were used to account and reduce the researcher's biases at the data collection and analysis stages. Thematic analysis was done through systematic methods that make the process rigid to enhance credibility in the studies interpretation of qualitative data. The used methodological approaches enabled to decrease the essential limitations of qualitative research while enhancing their relevance for the Saudi Aramco context.

الفصل الرابع

النتائج والتوصيات

Chapter 4: Results and Discussion

4.1 Interview Questions

Interviews were conducted with 15 leaders at Saudi Aramco in order to elicit their views on risk management and organizational resilience. Altogether, 15 participants were interviewed and each was on average 45 minutes of length. This paper used thematic analysis to analyze data to emerge with relevant themes and patterns of leadership concerning risks. Each of the interviewers was asked 5 questions. The responses were seen to be quite fluid across all the interviewed leaders, a factor seen to emanate from the different sample population. The response to each question is given a code as described below:

4.1.1 Question 1: How do leaders at Saudi Aramco approach risk management?

Description: Managers were asked questions concerning risk management, prevention, procedures used in implementing the preventive measures, and organizational culture.

Interview Response	Themes Identified	Code
Leaders prioritize proactive risk assessment and mitigation.	Proactive Risk Management	T1
They emphasize strategic decision-making in risk scenarios.	Strategic Decision-Making	T2
Cultural factors influence risk perception and management.	Cultural Dynamics	T3

4.1.2 Question 2: What leadership philosophies promote organizational resilience?

Description: This question focused on searching for the leadership philosophies that foster organization resilience such as the transformation leadership and transactional leadership.

Interview Response	Themes Identified	Code
Transformational leadership fosters adaptability and innovation.	Transformational Leadership	T4
Transactional leadership ensures structured risk management.	Transactional Leadership	T5

4.1.3 Question 3: What are the main challenges leaders face in managing risks at Saudi Aramco?

Description: This question focused on important issues, like the volatility of markets, cultural differences or limitations on the use of resources during risk management.

Interview Response	Themes Identified	Code
Uncertainty in market conditions poses significant challenges.	Market Uncertainty	T6
Cultural diversity requires adaptive risk management strategies.	Cultural Diversity	T8

Resource allocation and budget constraints affect risk management.	Resource Allocation	T9
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4.1.4 Question 4: How do different leadership styles impact risk management strategies?

Description: This question looked at how different leadership approaches impacted on the development and implementation of risk management plans.

Interview Response	Themes Identified	Code
Transformational leaders encourage innovative risk responses.	Innovative Risk Responses	T10
Transactional leaders focus on compliance and structured processes.	Structured Risk Processes	T11

4.1.5 Question 5: What strategies do leaders use to enhance organizational resilience through effective risk management?

Description: Managers discussed measures which can be implemented in order to promote the efficient risk management and leadership with the purpose to improve organizational readiness.

Interview Response	Themes Identified	Code
Building a resilient organizational culture through leadership support.	Organizational Culture	T13
Integrating risk management into strategic planning processes.	Strategic Planning	T14
Investing in employee training and development for risk awareness.	Employee Development	T15

Qualitative data analysis of the interviews proved fruitful in terms of understanding modes of leadership in Saudi Aramco when addressing risks, the effects of varying leadership styles on risk management strategies, and the barriers that organizations face in this context. Thus, these findings extend leader knowledge on how to manage risks and enhance resiliency in the organization.

4.2 Results of Analysis

4.2.1 H1: Organizational resilience and risk management effectiveness are positively impacted by transformational leadership.

The R-value tells about the strength and direction between the two variables i.e. dependent variables and independent variables whereas R square tells the variation explained in dependent variable due to independent variable. R-square informs about the coefficient of determinants which indicates that how much the regression line fit in the model. Here the linear regression between the dependent variable (building a resilient organization culture through leadership support) and the independent variables (firstly, transformational leadership fosters adaptability and innovation and secondly the leaders prioritize proactive risk assessment and mitigation) has significant relationship as the value is 0.05.

Further, the R-value is .44 and shows the significant relationship between the dependent and independent variables. R square shows the value of 0.56 which means that 56% variation created in the organizational resilience is due to the change in risk management effectiveness and transformational leadership the remaining 44% change is due to error or other variables that are not included in this model. Adjusted R-square means that all the chosen independent variables of this model explained the total of 49% variation in dependent variables keeping the other factors constant.

Table 1:

Model Summary ^b									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.44	.56	.49	.93061	.068	13.525	2	97	.05
a. Predictors: (Constant), Transformational leadership fosters adaptability and innovation, Leaders prioritize proactive risk assessment and mitigation.									
b. Dependent Variable: Building a resilient organizational culture through leadership support.									

Here in the following table, f-test shows the significant value i.e. it fits to the model and thus the first hypothesis is accepted.

Table 2:

ANOVA^a						
Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	6.105	2	3.053	13.525	.05 ^b
	Residual	84.005	97	.866		
	Total	90.110	99			
a. Dependent Variable: Building a resilient organizational culture through leadership support.						
b. Predictors: (Constant), Transformational leadership fosters adaptability and innovation, Leaders prioritize proactive risk assessment and mitigation.						

Assuming that the one unit increase in leaders prioritizes proactive risk assessment and mitigation then it results in 28 units increase in the organizational resilience. Similarly, one unit increase in the transformational leadership results in 63 units increase in organizational resilience.

Table 3:

Coefficients^a								
Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	95.0% Confidence Interval for B	
		B	Std. Error	Beta			Lower Bound	Upper Bound
1	(Constant)	3.231	.629		5.137	.000	1.983	4.479
	Leaders prioritize proactive risk assessment and mitigation.	.282	.112	.246	2.507	.014	.059	.505
	Transformational leadership fosters adaptability and innovation	.630	.089	.069	.706	.02	.238	.113
a. Dependent Variable: Building a resilient organizational culture through leadership support.								

4.2.2 H2: Transactional leadership moderately impacts organizational resilience and risk management tactics.

Here the linear regression between the dependent variable (leaders prioritize proactive risk assessment and mitigation) and the independent variables (firstly, transactional leadership ensures structured risk management and secondly building a resilient organization culture through leadership support) has significant relationship as the value is 0.03.

Further, the R-value is .43 and shows the significant relationship between the dependent and independent variables. R square shows the value of 0.41 which means that 41% variation created in the risk management tactics is due to the change in organizational resilience and transactional leadership the remaining 59% change is due to error or other variables that are not included in this model. Adjusted R-square means that all the chosen independent variables of this model explained the total of 45% variation in dependent variables keeping the other factors constant.

Table 4:

Model Summary^b									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.437 ^a	.413	.45	.79270	.113	26.204	2	97	.003
a. Predictors: (Constant), Transactional leadership ensures structured risk management. Building a resilient organizational culture through leadership support.									
b. Dependent Variable: Leaders prioritize proactive risk assessment and mitigation.									

Here in the following table, f-test shows the significant value i.e. it fits to the model and thus the second hypothesis is accepted.

Table 5:

ANOVA ^a						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	7.797	2	3.899	26.204	.003 ^b
	Residual	60.953	97	.628		
	Total	68.750	99			
a. Dependent Variable: Leaders prioritize proactive risk assessment and mitigation.						
b. Predictors: (Constant), Transactional leadership ensures structured risk management. Building a resilient organizational culture through leadership support.						

If the one unit increases in building a resilient organizational culture through leadership support results in 34 units increase in the risk management tactics. Similarly, one unit increase in the transactional leadership results in 22 units increase in risk management tactics.

Table 6:

Coefficients ^a								
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95.0% Confidence Interval for B	
		B	Std. Error	Beta			Lower Bound	Upper Bound
1	(Constant)	2.828	.417		6.775	.000	2.000	3.657
	Building a resilient organizational culture through leadership support.	.342	.090	.162	1.578	.018	.036	.320
	Transactional leadership ensures structured risk management.	.222	.095	.241	2.349	.021	.034	.410
a. Dependent Variable: Leaders prioritize proactive risk assessment and mitigation.								

4.2.3 H3: Leaders with strong mental abilities are more adept at risk management and building organizational resilience.

Here the linear regression between the dependent variable (organizational resilience) and the independent variables (firstly, risk management tactics and secondly innovative risk responses) has significant relationship as the value is 0.01.

Further, the R-value is .45 and shows the significant relationship between the dependent and independent variables. R square shows the value of 0.55 which means that 55% variation created in the organizational resilience is due to the change in risk management tactics and innovative risk responses the remaining 45% change is due to error or other variables that are not included in this model. Adjusted R-square means that all the chosen independent variables of this model explained the total of 46% variation in dependent variables keeping the other factors constant.

Table 7:

Model Summary ^b									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.45 ^a	.55	.46	.93205	.065	33.364	2	97	.01
a. Predictors: (Constant), Transformational leaders encourage innovative risk responses. Leaders prioritize proactive risk assessment and mitigation.									
b. Dependent Variable: Building a resilient organizational culture through leadership support.									

Here in the following table, f-test shows the significant value i.e. it fits to the model and thus the third hypothesis is accepted.

Table 8:

ANOVA^a						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	5.844	2	2.922	33.364	.01 ^b
	Residual	84.266	97	.869		
	Total	90.110	99			
a. Dependent Variable: Building a resilient organizational culture through leadership support.						
b. Predictors: (Constant), Transformational leaders encourage innovative risk responses. Leaders prioritize proactive risk assessment and mitigation.						

If the one unit increases in risk management tactics results in 29 units increase in the organizational resilience. Similarly, one unit increase in the innovative risk responses results in 57 units increase in organizational resilience.

Table 9:

Coefficients^a								
Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.	95.0% Confidence Interval for B	
		B	Std. Error	Beta			Lower Bound	Upper Bound
1	(Constant)	3.170	.696		4.553	.000	1.788	4.551
	Leaders prioritize proactive risk assessment and mitigation.	.294	.113	.257	2.592	.001	.069	.519
	Transformational leaders encourage innovative risk responses.	.570	.128	.044	.443	.009	.311	.198
a. Dependent Variable: Building a resilient organizational culture through leadership support.								

4.2.4 H4: Competent managerial and interpersonal abilities positively influence organizational resilience and enhance effective risk management strategies.

Here the linear regression between the dependent variable (strategic planning) and the independent variables (firstly, organizational resilience and secondly employee development) has a significant relationship as the value is 0.000. Further, the R-value is .58 and shows the significant relationship between the dependent and independent variables. R square shows the value of 0.35 which means that 35% variation created in the strategic planning is due to the change in organizational resilience and employee development the remaining 65% change is due to error or other variables that are not included in this model. Adjusted R-square means that all the chosen independent variables of this model explained the total of 43% variation in dependent variables keeping the other factors constant.

Table 10:

Model Summary^b									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.589 ^a	.347	.433	.64643	.347	25.734	2	97	.000
a. Predictors: (Constant), Investing in employee training and development for risk awareness. Building a resilient organizational culture through leadership support.									
b. Dependent Variable: Integrating risk management into strategic planning processes.									

Here in the following table, f-test shows the significant value i.e. it fits to the model and thus the fourth hypothesis is accepted.

Table 11:

ANOVA ^a						
Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	21.507	2	10.753	25.734	.000 ^b
	Residual	40.533	97	.418		
	Total	62.040	99			
a. Dependent Variable: Integrating risk management into strategic planning processes.						
b. Predictors: (Constant), Investing in employee training and development for risk awareness. Building a resilient organizational culture through leadership support.						

If the one unit increases in organizational resilience then it results in 29.5 units increase in the strategic planning. Similarly, one unit increase in the employee development results in 33 units increase in strategic planning.

Table 12:

Coefficients ^a								
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95.0% Confidence Interval for B	
		B	Std. Error	Beta			Lower Bound	Upper Bound
1	(Constant)	1.563	.368		4.252	.000	.834	2.293
	Building a resilient organizational culture through leadership support.	.295	.076	.356	3.906	.000	.145	.445
	Investing in employee training and development for risk awareness.	.332	.089	.339	3.726	.000	.155	.509
a. Dependent Variable: Integrating risk management into strategic planning processes.								

4.3 Discussion

The interview participants were 15 of the leaders in Saudi Aramco and they were asked questions on risk management and organizational resilience. On average, every interview took about 45 minutes of the respondent's time. Levin's method of coding analysis was used to capture thematic trends and patterns as pertains to leadership and management of risks. Each of the interviewees was asked five questions, and their answers are different, which indicates that there are differences between the leaders. The recommendations are grouped according to the research objectives and the anticipated results.

The first research objective was therefore to understand the leadership's role in the management of risks in their respective groups. Several leaders mentioned risk management as part of their prevention strategy (T1) and the importance of decision-making (T2). A number of the leaders endorsed the need to identify possible threats and contain them as they evolve because this way decisions are made more especially when they are informed of the consequences. Cultural factors (T3) were also significantly different, because leaders who are always culturally sensitive can manage the risks better within the Saudi Aramco organizational contexts. These findings support the assertion that leadership is an essential component of risk management since it encourages the use of best practices that are compatible with people's culture.

The second research question of this study was to examine the leadership beliefs that enhance organization's ability to withstand various shocks. Hypothesis 4 was supported by the results revealing that T4 which is characterized by leadership support for innovation promotes adaptability in organizations. With transformational leadership, organizational leaders encourage their followers to desire personal and organizational change and more so innovation hence improving the capacity of the organizational system to cope with and recover from disruptions. Transactional leadership (T5) provides a certain order in risk

management because of compliance and clear goals that are set for work. The third aim was about assessing the effectiveness of the leaders of Saudi Aramco in relation to risk management and the formulation of a framework that would enhance the organization's stability through enhanced management of risks. Aligning with the other findings, leaders noted that there are indeed challenges in the market uncertainty (T6), cultural diversity (T7), and limited resources to allocate in managing the market (T8). Fluctuations in the markets hinder a leader from determining future risks since they are unpredictable while cultural differences call for a change in the management of risks. Availability of resources and control over expenditure also act as hindrances to risk management thus calling for strategic resource management. Some of the methods mentioned by leaders included structuring for organizational resilience (T12), Risk Management incorporated into the planning of the organizational strategies (T13), and spend on risk awareness training for the employees (T14). This paper has underlined the following risk management and resilience strategies and this shows that there is need to adopt a systematic manner in undertaking such activities.

4.4 Framework Development

Based on the findings, a framework aimed at enhancing organizational resilience based on efficient management of hazards has been proposed. This framework is useful for leaders who want to improve risk management function and strengthen the organization's coping mechanisms.

Figure 1:



This framework illustrates how leadership approaches, risk management plans, risk management issues, and the measures applied to improve organizational resilience apply to the Saudi Aramco organization. Types of leadership include the transformational and transactional leadership determining how risks are addressed in organization. Such leadership approaches affect comprehensive risk management activities in organizations, such as strategic planning and organizational culture, concerning problem-solving strategies, including market risks, cultural diversity, and resource distribution. Thus, the creation of organizational culture, strategic planning, and the improvement of the personnel's competencies involve leadership styles and proactive risk management; in turn, it contributes

to the organization's resilience and the successful completion of projects in a constantly developing industry.

الفصل الخامس

الملخص والاستنتاج

Chapter 5: Summary and Conclusion

5.1 Practical Implications

The insights derived from this study will be instrumental in enlightening Saudi Aramco and other such organizations that want to improve their organizational resilience. In this way, the findings indicate that concepts from the field of leadership, specifically transformational and transactional kinds, enhance risk management and organizational resiliency when used selectively by executives in accordance with their circumstances. The identified findings can act as evidence of the necessity for engaging in effective risk management, making sound decisions, and developing an organization's readiness culture. Managers and top-level employees can subsequently employ these findings to design and develop training and development activities, incorporate risk management in strategic management, and facilitate teamwork, which enhances an organization's capacity to respond to risks and accomplish its projects.

5.2 Policy Recommendations

Based on the findings, various policies that can be proposed to enhance the firms' resilience through the proper use of risk management and leadership approaches can be formulated. Leadership development of these ideal types should be given special priority in organizations because such leadership development is more oriented to transformational and servant leadership, which has been proven to enhance adaptive and innovative mind-sets together with cooperation within teams. The federal government should recommend risk management as part of organizational strategy processes, and demand constant worker training to improve the understanding of risks and methods to manage them. Moreover, the policies in the areas of organizational culture, and specifically tolerance that enable organizations to maintain and increase their ability to recover, including diversity and inclusion policies, can also add to the performance of firms in the face of disruptions.

5.3 Research Limitations

First of all, it will be noteworthy to point out that not all leaders in the industry were available for interview implying that the extent and depth of information gathered may have been compromised. Thus, the use of interviews and surveys based on respondents' questionnaire increases the risk of bias because respondents can provide pertinent information which corresponds to social norms or can remember events in a wrong way. Furthermore, there is a limitation of time since the data gathering and analysis were done in a short period, thus might have failed to capture some vital changes and effects in the long run. As such, it recommends that subsequent analyses should strive to secure a diverse sample of participants, examine the physical activity patterns of patients and controls over a more extended period, using a varied range of data collection methods so as to increase the validity of the conclusions.

5.4 Conclusion

This study contributes to the theory of leadership, risk management, and organizational resilience especially as applies to Saudi Aramco. In addition to this, it addresses the empirical research question of how one or both of the two leadership philosophies, transformational leadership and transactional leadership affects risk management practices, and therefore, organizational resilience. Ideas like preventive risk management, strategic management, and culture have been realized and scientifically proved, which gives a new perspective to studying leadership processes and its effects on the born organization. These elements amalgamate to form the proposed theoretical framework that is postulated to inform future research endeavors concerning leadership and risk management. The study also provided research questions of immense importance and relevance to a study of leadership characteristics that enhance company risk management and evaluate the various leadership beliefs and its influence on organizational risk management especially in SA. Consequently,

the studies also offer leaders' practical suggestions for improving organizational readiness and managing risks successfully. In essence, this research makes both a theoretical and constructive contribution to the general area of research although its main thrust has been toward the practical application of leadership and risk management strategies. The study highlighted that the style of leadership has direct effect on the management as the style of leadership directly influences the risk taking ability and the coordination with the team members.

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The Role of Leadership in Managing Risk to Ensure Project Success in the Arabian American Oil Company (Aramco) In Saudi Arabia

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