

The Effect of Transformational Leadership on Innovative Work Behavior through Knowledge Sharing in Saudi Telecommunication Company (STC)

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Abstract

The aim of this research to investigate the effect transformational leadership (TL) (Idealized influence behavior, Idealized influence attributed, Inspirational motivation, Individual consideration and Intellectual stimulation) on innovative work behaviour (IWB) by evaluating the mediating role of knowledge sharing (KS) in Saudi Telecommunication Company (STC). This research used a quantitative approach to research the relationship between variables and the unit of analysis is individual employees in STC. By using random sampling technique, a total of 310 questionnaires were distributed via e-mail among the employees from STC in Saudi. The research also validates the proposed conceptual framework using a structural equation modelling, then uses smart PLS with the data collected. The finding of the research showed positive effect between TL (Idealized influence behavior, Idealized influence attributed, Inspirational motivation, Individual consideration and Intellectual stimulation) and IWB. In addition, the findings indicate that KS mediates the effects of TL on IWB. The research conclude that better IWB is achieved when a leader encourage employees to think critically in dealing with problems that they encounter in the course of their work, use their own initiative, and seek innovative methods to approach their work and assignments. It is believed that this research will be beneficial to the industry practitioners and academicians for future reference. In addition, the research significantly contributes to advancing the deeper insight of the specific conditions to strengthen the relationship between KS and.

Keywords: Transformational Leadership, Innovative Work Behaviour, Knowledge Sharing, Saudi Telecommunication Company (STC).

Introduction

Investment in computing and communications promotes competitive advantage, customer service, and other strategic and commercial benefits. Adaption and integration within the ITC

market is particularly important in order to recognize what qualifications are necessary, and subsequently build the right competencies within the organization. A TL style in STC employees are critical to the running and evolution of a successful and competitive business, particularly in the ITC world (Saad Alessa, 2021). The employees are an important part of an organization's resources and capabilities, supporting the organization through their vital know-how, experience, internal and external networks, and ability to strengthen the social identity and culture of the organization (Baškarada et al, 2019).

The Saudi Arabian Telecommunications and Information Technology sector is fast growing and it is characterized by dynamic changes. The companies which constitute this sector should see change as a major issue in their quests for survival, growth and development. STC is one of such companies. The executives of this company ought to STC that keep the activities abreast with the dynamic nature of the sector. When the revenue growth rate of Saudi Telecom is considered, then it becomes clear that all-around 16.6% of its economic growth is occurred due to its telecom sector, and it is located in 4th position among other developing nations except China (Alomari, 2020).

According to the above figure of revenue growth of Saudi Telecom among the other South Asian and Middle East Countries, it becomes clear that the performance level of the telecommunication based advanced industry is continuously growing. There are many reasons behind it like resources, capable workforce, efficient leadership and other ethical values of businesses in this state. Majority that companies are more developed in a state whose management is more efficient and capable as compared to the other ones. The kingdom of Saudi Arabia is ranked as 13th most economically competitive country in the world (Alharbi et al., 2021). In the Middle East countries, Saudi Arabia is more economically strong and have a large amount of oil reserves in the world. In this state, three major telecommunication companies earn a large amount of profit and market share of a company. In the last year research, Mobily, STC and Zain gain a large amount of market share of Saudi Arabia and plays a major role in its economic growth (Fodol and Aziz, 2019). According to the above ratios, it becomes clear that a large amount of share is earned by STC due to its advanced leadership style and technology. In the future perspective, there are more opportunities in front of the telecom industries in KSA that will enhance the economic situation of this state (Alharbi et al., 2021)

Many studies exist that look at professional and innovative project employees, however, works looking specifically at STC skilled middle project managers are few (Al-Mansour et al., 2024). Innovation is a fundamental solution to overcoming the challenges that take place in the contemporary and rapidly evolving environment. Employees have a direct and dramatic influence on the innovation performance of organizations, due to their involvement in the innovation process. The research of STC employees are therefore valuable in order to gain more insight into the characteristics of TL that encourage innovative work behavior. Apart from leadership styles and its influence on managerial effectiveness, the innovation culture plays a critical role in influencing managerial effectiveness keeping in mind that organizations are a collection of people who share information and knowledge as part of their daily routine (Alharbi et al., 2016). Simultaneously, innovation culture and leadership styles are interrelated as the culture in an organization is strongly shaped and affected by the personality and outlook of the owner-managers (leaders) since they have a strong dominance

in the firm (Alharbi et al., 2016). Thus, there seems to be some interrelated nature of relationships between the constructs of leadership, innovation culture and IWB.

Although leadership and KS are recognised as determinants of successful innovation (Lei et al., 2019), the literature on the relationship between these determinants is yet inadequate (Shafique et al., 2020). In particular, studies gaps remain about the mechanism by which KS mediates the relationship between leadership and special aspects of innovation (Choi et al., 2016), especially in relation to TL. This limits our understanding of the different ways in which TL may affect KS behaviors to produce significant influence on innovation. Further, theoretical and practical evidences are required to detect and explain possible mediating effects of KS on the relationship between TL and IWB. Therefore, several scholars mentioned leadership in their research, there is still a lack of research using KS as a mediating variable. Therefore, to see the extent to which the impact of TL relationship on IWB, mediating factor is an important aspect in looking at the strength of the relationships. The KS is seen as an important factor to influence between two variables which are TL and IWB to improve and support the element in this process.

To conclude, researcher studied the relationship between TL, IWB and KS in STC. Although there are previous studies that discuss and explore the relationships between these variables, the studies are reported separately, in different contexts and show inconsistent and inconclusive study findings. Consequently, we contribute to the literature by suggesting the notion that TL contributes to IWB through KS. TL not only encourages staff to come up with innovative ideas, but to show their capabilities to solve complex problems and tackle challenging tasks through innovative methods (Li et al., 2020) by providing employees with an opportunity to share knowledge and apply what they have learned. By supporting employees' creativity (Choi et al., 2016) as well as inspiring new ideas, it helps organization innovate and remain competitive. Overall, this research work contributes to the literature on TL, IWB and KS in ST. Therefore, a comprehensive study needs to be conducted to look at the relationship between TL, KS, and IWB together.

Theoretical Literature and Hypothesis Development

The resource-based view (RBV) of the firm assumes that company's sustainable advantage in a given market can be determined by the organization's resources and capabilities. RBV proponents hold that organizations are distinctive entities defined by their private resources (Barney, 1991). TL of the organization is classified under such resources.

Transformational Leadership

TL is a leadership style that focuses on inspiring and motivating followers to not only achieve their goals, but also to become better versions of themselves (Bass and Riggio, 2006). Transformational leaders aim to create a positive and engaging work environment by providing individualized support and recognition, promoting creativity, and encouraging self-development (Bass, 1985). This type of leadership has been shown to promote job satisfaction, motivation, and organizational performance (Avolio and Bass, 2002). In this study, While discussing the crucial nature of transformational leadership, it consists of five scales with subscales: 1) Idealized influence (attribute) that demonstrates qualities that motivates respect and pride from association with him or her; 2) Idealized influence (behavior), communicates value, purpose, and importance of organization's mission,; 3)

Inspirational motivation, exhibits optimism and excitement about goals and future states; 4) Intellectual stimulation that examines new perspectives for solving problems and completing tasks; 5) Individualized consideration which focuses on development and mentoring of followers and attends to their individual needs.

Innovative Work Behavior

Farr and Ford (1990), defined IWB as employees' behaviour directed towards the generation, introduction and/or application of ideas, processes, products or procedures. This study refers to IWB as introduced by (De Jong and Den Hartog, 2010). IWB is explained into four dimensions, namely, (a) opportunity exploration which includes the identification of new opportunities spontaneity, discovery of opportunities, problems that need to be solved or problem triggers, (b) idea generation which refers to the generation of new concepts, products, services or process for the purpose of improvement), (c) championing that is selling ideas to parties in need, and, (d) implementation that is developing innovative ideas and implement through practical recommendations.

Knowledge Sharing

KS refers to the voluntary behaviour by individuals to provide others access to their knowledge and experiences referred to KS as "the process by which explicit or tacit knowledge can flow between individuals, or utilise from others as groups, departments, or organisations". KS can also be defined as the activities that lead to the transfer and dissemination of knowledge between individuals, groups, or organisations (Zakariya and Bashir, 2020). KS takes place between two individuals, one that possesses knowledge and the other acquires knowledge. This process includes the sharing of information, ideas, suggestions, and experiences related to an organisation.

The Relationship between TL and IWB

The previous studies indicated that leaders are playing an important role in stimulating and encouraging innovation by employees and work teams by creating an inspiring and supportive environment for the innovation process in organisations (Bauwens et al., 2024). It is worth stating that the previous studies acknowledge the role of leadership in forming employee behaviours, including the IWB (Bagheri et al., 2022). TL is a leadership style that directs employees to reach superior performance and organisational goals by identifying, exploiting and developing entrepreneurial opportunities through their creative contributions (Lin et al., 2020). Therefore, this leads to the first hypothesis:

Hypothesis 1: There are positive significant relationship between TL and innovative work behavior.

According to Eyamba, and Apua, (2020) This study focuses on the effect of TL on innovative behavior of employees. The findings unearthed that there is a positive effect of idealised influence on innovative work behavior of employees. The researchers recommended that the superiors of the organization should give ample attention to the four components (idealize influences, intellectual stimulation, individualized consideration, inspirational motivation) of TL. It is therefore proposed that:

Hypothesis 1a: There are positive significant relationship between idealised influence behavior and innovative work behavior.

Idealized influence, representing the charismatic dimension of TL, plays a pivotal role in reinforcing employees' positive attitudes toward organizations and has been linked to positive organizational outcomes such as career satisfaction in previous studies (Bauwens et al., 2024). Employees who attribute idealized influence to their leaders, see those leaders as embodying power, confidence and charisma, and they are more likely to develop a positive attachment to the organization. When a leader exhibits idealized influence attributed that leader is capable of gaining employees' trust in the organization, which results in enhancing employee commitment to the organization. This research, therefore, proposes.

Hypothesis 1b: There are positive significant relationship between idealised influence attribute and innovative work behavior.

Avolio and Bass (2002), argued that certain aspects of transformational leadership, such as inspirational motivation, self-confidence, heightened awareness of goals and intellectual stimulation, foster and support the intrinsic motivation of the employees and their innovation and creativity, which closely match the predictors of IWB (Ogolla and Senaji, 2018). Therefore, we can hypothesize that:

Hypothesis 1c: There are positive significant relationship between inspirational motivation and innovative work behavior.

The relationship between individual consideration and IWB observed in this research is consistent with the perspectives of Afsar and Umrani, (2020), who found that personalized attention from leaders to their subordinates' needs and talents contributes to fostering innovative behaviours. Thus, hypotheses develop for this research as follow:

Hypothesis 1d: There are positive significant relationship between individualised consideration and IWB.

Intellectual stimulation represents an important component of transformational leadership. Through intellectual stimulation, transformational leaders encourage followers to question their own beliefs, assumptions, and values, and, when appropriate, those of the leader, which may be outdated or inappropriate for solving current problems (Ogolla and Senaji, 2018). Ogolla and Senaji (2018) assert that intellectual stimulation leads to the development of employee commitment to the organization. This, in turn, has implications for the ability of the organization to achieve goals based on the dedication and hard work of employees (Ogolla and Senaji, 2018). Therefore, we can hypothesize that:

Hypothesis 1e: There are positive significant relationship between intellectual stimulation and IWB.

The Relationship between TL and KS

Many studies have indicated the importance of leadership and its positive effect on desirable behaviours for employees in organisations, including knowledge-sharing behaviours (Lo et al., 2021). Lei et al. (2019), indicated that leadership is the most important factor influencing knowledge management processes for the organisations, where leaders are able to create appropriate conditions to knowledge management processes that allow individuals to practice and enhance their knowledge and skills, facilitate access to knowledge, and encourage them to spread and share knowledge and experiences among the employees. Although the relationship between leadership styles and KS has been studied and explored through many studies, however, until after reviewing the relevant literature, the study of the

relationship between TL and KS has not yet received much attention (Lei et al., 2019). But some studies have indicated that EL has a positive effect on KS. Based on the previous arguments, the following hypothesis is formulated:

Hypothesis 2: There are positive significant relationship between TL and KS.

The Relationship between KS and IWB

With regard to the relationship between KS and IWB, previous studies indicated that KS is an important process for enhancing capacity for the IWB (). Such importance is due to the fact that knowledge plays an important role in creating innovation, (Kmieciak, 2020). Therefore, specialised knowledge, including knowledge about past solutions and events, can be considered as the basis and inspiration for new solutions. By sharing knowledge with colleagues, the knowledge base of other employees increases and the opportunity for innovative ideas to emerge increases too. Based on these arguments, the hypothesis can be formulated:

Hypothesis 3: There are positive significant relationship between knowledge sharing and IWB.

The Role of Knowledge Sharing as Mediate

KS happens when a person is keen to engage in knowledge collecting and knowledge donating for rising novel ideas (Bock and Kim, 2002). KS is therefore “the process where individuals mutually exchange their knowledge and jointly create new knowledge”. More specifically, a recent interaction study identified that employees with a high level of KS are more likely to mobilise their creative potentials into creative outcomes (Wang and Noe, 2010). Further, KS plays an intensified role in increasing employee creativity (Wang and Noe, 2010) and has been investigated as a mediating variable between self-efficacy and employee creativity (Wang and Noe, 2010). Some studies have also found that knowledge-sharing behaviour can have a major effect on individual creativity (Tierney and Farmer, 2002; Husseini and Fen, 2019a ; 2019b).

Hypothesis 4: KS mediate the relationship between TL and IWB

Conceptual Framework

The conceptual framework shown in Figure 1 shows all the independent variables as well as the dependent variables. The framework explains clearly how the postulated hypotheses relate to each other and provides the key input of this research. demonstrate the framework that has been adopted in this research. TL factors consist of five (5) variables namely idealized influence behavior, Idealized influence attributed, Inspirational motivation, individualised consideration, and intellectual stimulation. Meanwhile, dependent variable is IWB and mediator variable is KS. Based on the discussion above, a research framework has been developed as shown in Figure 1.

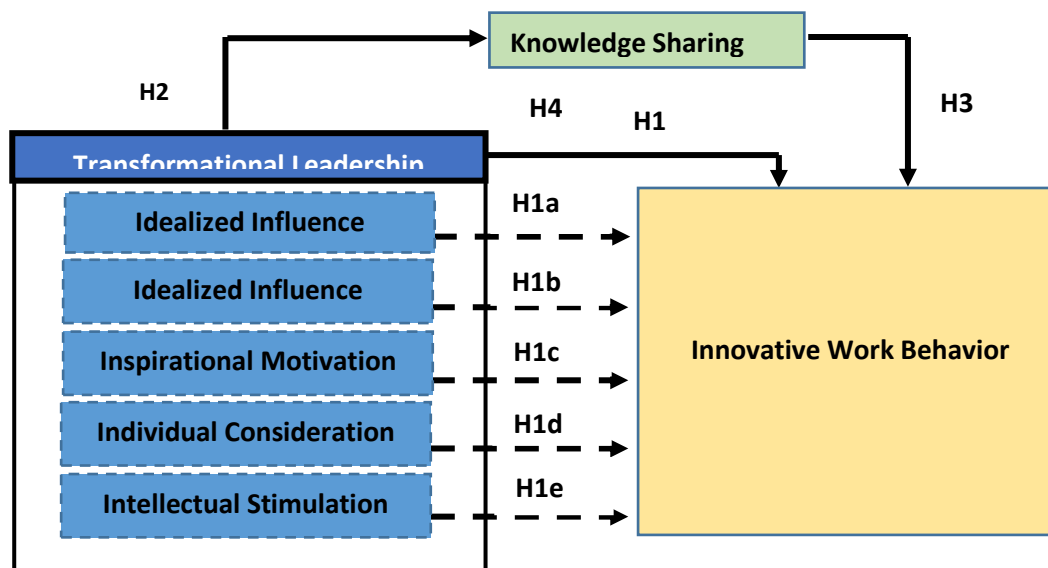


Figure 1. Conceptual framework

Data and Methodology

Respondents of the present study are STC employees. Out of the 378 questionnaires distributed, 338 were returned, indicating an initial engagement level of participants. However, not all returned questionnaires were fit for analysis; 28 were deemed unusable for reasons not specified in the table, which could include incomplete responses or improperly filled entries. The count of returned and usable questionnaires stands at 310, which after considering the total distributed, results in an admirable usable response rate of 82.1%. This figure is significant, as it surpasses the commonly accepted threshold of 80% for a good response rate in social science research, suggesting that the findings based on these responses are likely to be representative of the population. Furthermore, the overall response rate of 89.5% is exceptionally high and demonstrates a robust level of participation from STC employees. This sample response met the minimum sample requirement at which generalization may be achieved. A period of six (6) weeks was allocated to collect data. The results were downloaded from the online data collection platform and analyzed with Analysis of (Smart PLS). The collected data was originally entered into the online data collection platform based on the weights of the various responses.

Demographic Analysis

Table 1 shows the respondent's profiles for those who participated in the study, Table 4.7 presents a demographic breakdown of the 310 participants who engaged in the study from Saudi Telecom Company's (STC). Gender representation among the respondents leans significantly towards males, comprising 69.3% of the sample, while females account for 30.7%. This distribution reflects the gender composition within the context of the organization's employees and may influence the study's insights into leadership and innovative work behavior. The age range of participants is predominantly within the 31-40 years bracket, encompassing 54.6% of the respondents, followed by the 41-50 years category at 30.5%. The 21-30 years age group makes up 14.9%, with no respondents reported as 20 years or under. This age distribution suggests a mature workforce, likely to possess considerable professional experience. In terms of educational attainment, the majority of respondents hold a Bachelor's degree (38.3%), followed by those with a Master's degree

(22.6%), and then a significant portion listed under 'Other' (30.7%), which may include a range of postgraduate qualifications or certifications not specified in the table. Diplomas are held by 8.4% of respondents, and notably, there are no respondents with only a high school level of education. Work experience appears varied, with a larger proportion of respondents having 6 to 10 years of experience (27.3%), followed closely by those with 16 to 20 years (22.8%), and 21 or more years (17.1%). The representation decreases with fewer years of experience, with 19.7% having 1 to 5 years, and the lowest, 13.1%, with 11 to 15 years of experience. The absence of respondents with no experience highlights that the sample is composed of individuals with at least some level of professional exposure. Lastly, the length of time with the current organization also varies, with the most significant number of respondents (37.0%) having been with STC for 6 to 10 years, followed by those with 11 to 15 years (22.2%), and 1 to 5 years (16.9%). A smaller group has been with the company for less than a year (4.3%).

Table 1

Profile of Respondents (N = 310)

	n	%		n	%
Gender			Age		
Male	214	69.3	20 years or under	-	-
Female	96	30.7	21-30 years	46	14.9
			31- 40 years	169	54.6
			41- 50 years	95	30.5
Education Level			Work Experience		
High School	-	-	No Experience	-	-
Diploma	26	8.4	1 to 5 years	61	19.7
Bachelor's Degree	119	38.3	6 to 10 years	84	27.3
Master Degree	70	22.6	11 to 15 years	40	13.1
Other	95	30.7	16 to 20 years	70	22.8
			21 or more years	55	17.1
Length of time with current organization					
Less than a year				13	4.3
1 to 5 years				52	16.9
6 to 10 years				114	37.0
11 to 15 years				69	22.2
15 or more years				62	19.6

Measurement Model Evaluation

Reliability is an estimation of the degree of accuracy of a variable between different measures of a variable. It reflects the degree to which a variable or set of variables is consistent with what it is supposed to calculate is accurate. The constructs within this study exhibit high levels of convergent validity. The factor loadings are mostly well above the conventional threshold, and the AVEs for all constructs are above 0.5, indicating that the measurement model is valid in terms of the constructs capturing a significant proportion of the variance in their respective items

Discriminant validity ensures that non-overlapping elements in the research do not overlap. The results indicate that the square roots of the AVEs for all constructs are greater than the

correlations with other constructs, thus confirming discriminant validity according to the Fornell-Larcker criterion. This implies that each construct in the model is capturing unique variance and is distinct from the other constructs, supporting the validity of the measurement model.

Table 2
Results of Discriminant Validity by Fornell-Larcker Criterion

	IIB	IIA	IM	IC	IS	KS	IWB
Idealized Influence behavior	0.835						
Idealized Influence attribute	0.425	0.763					
Inspirational Motivation	0.452	0.112	0.794				
Individual Consideration	0.334	0.374	0.253	0.836			
Intellectual Stimulation	0.189	0.246	0.333	0.215	0.902		
Knowledge sharing	0.211	0.291	0.420	0.194	0.388	0.811	
Innovative Work Behaviour	0.238	0.318	0.425	0.274	0.353	0.287	0.831

Finally, the measurement model of the study is presented in figure 2 below. Based on the above discussion, it can be confirmed that the measurement is valid for further analysis as suggested by Hair et al. (2019).

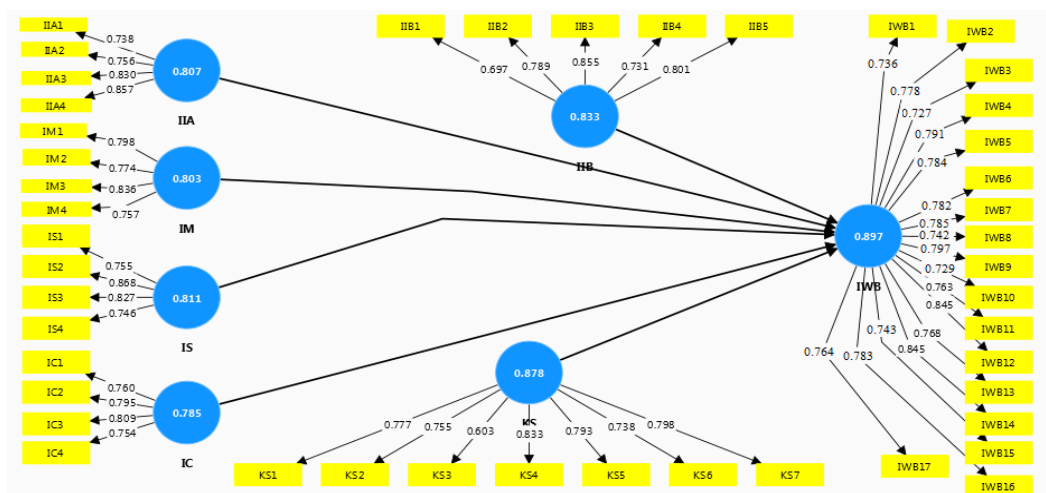


Figure Measurement model of the study 2

Reliability Test for EFA

The reliability test was conducted using Composite Reliability and Cronbach Alpha. The results are presented in Table 3. All the tests for both Composite Reliability and Cronbach Alpha were passed successfully. All the scores were above 0.7, as Hair et al. (2019) recommended.

Table 3

Composite Reliability and Cronbach Alpha Results

Factor	Cronbach Alpha	Composite Reliability	Average Variance Extracted (AVE)
Individual Consideration	0.785	0.789	0.608
Idealized Influence attribute	0.807	0.81	0.635
Idealized Influence behavior	0.833	0.836	0.603
Inspirational Motivation	0.803	0.811	0.627
Intellectual Stimulation	0.811	0.809	0.641
Innovative Work Behaviour	0.897	0.875	0.507
Knowledge Sharing	0.878	0.893	0.578

Results and Discussion*Hypothesis Testing (Direct Effect)*

The direct effect test is used to examine the relationships between the (independent and mediating) variables and the dependent variable. This section presents the result of hypotheses testing for direct effect. The results are presented in table 4 and explained in the following conclusions.

Table 4

Summary of the direct effect

Hypothesis	Path Relationship	Std. Beta	Standard Deviation	T-value	P Values
H1a	IIB -> IWB	0.608	0.061	5.397	0.000
H1b	IIA -> IWB	0.428	0.049	8.734	0.000
H1c	IM -> IWB	0.829	0.080	4.193	0.000
H1d	IC -> IWB	0.640	0.044	2.864	0.007
H1e	IS -> IWB	0.193	0.098	5.651	0.000
H2	TL -> KS	0.749	0.054	13.870	0.000
H3	KS -> IWB	0.117	0.054	2.166	0.004

Where: IIB: Idealized Influence behavior; IIA: Idealized Influence attribute; IM: Inspirational Motivation.

IC: Individual Consideration; IS: Intellectual Stimulation; KS: Knowledge sharing; IWB: Innovative Work Behaviour.

TL: transformational leadership

According to results showed in the above table 4, the following conclusions were drawn:

- The relationship between Idealized Influence Behavior (IIB) and Innovative Work Behaviour (IWB) is significant, with a standardized beta (β) of 0.608, a standard deviation of 0.061, a T-value of 5.397, and a P-value of 0.000. This strong positive relationship suggests that higher levels of idealized influence behavior are associated with higher levels of innovative work behavior.
- The path from Idealized Influence Attribute (IIA) to Innovative Work Behaviour (IWB) also shows a significant positive relationship, with a standardized beta of 0.428, a standard

deviation of 0.049, a T-value of 8.734, and a P-value of 0.000. This indicates that idealized influence attributes positively impact innovative work behavior. Inspirational Motivation (IM) has a standardized beta of 0.829, a standard deviation of 0.080, a T-value of 4.193, and a P-value of 0.000 in its relationship with Innovative Work Behaviour (IWB).

- The relationship between Individual Consideration (IC) and Innovative Work Behaviour (IWB) is significant, with a standardized beta of 0.640, a standard deviation of 0.044, a T-value of 2.864, and a P-value of 0.007. This positive relationship suggests that individual consideration by leaders fosters innovative work behavior among employees. Intellectual Stimulation (IS) shows a standardized beta of 0.193, a standard deviation of 0.098, a T-value of 5.651, and a P-value of 0.000 in its relationship with Innovative Work Behaviour (IWB)
- The relationship between Transformational Leadership (TL) and Knowledge Sharing (KS) is significant, with a standardized beta of 0.749, a standard deviation of 0.054, a T-value of 13.870, and a P-value of 0.000. This strong positive relationship suggests that transformational leadership greatly enhances knowledge sharing within organizations. The path from Knowledge Sharing (KS) to Innovative Work Behaviour (IWB) also shows a significant positive relationship, with a standardized beta of 0.117, a standard deviation of 0.054, a T-value of 2.166, and a P-value of 0.004.
- All hypothesized path relationships between the leadership constructs (IIB, IIA, IM, IC, IS, TL) and innovative work behavior (IWB) are significant. These results support the theoretical framework that transformational leadership components positively influence innovative work behavior. Each construct contributes uniquely to fostering an environment conducive to innovation within the organization.

Hypothesis Testing (Mediation Effect)

The goal of a mediation study might be to uncover ways to modify the level of the dependent variable, understand the mechanism by which the independent variable impacts the dependent variable, or forecast the outcome of the study.

Mediation analysis is essential for understanding the indirect effects of independent variables on dependent variables through a mediator. In this study, knowledge sharing (KS) is examined as a mediator in the relationship between transformational leadership (TL) and innovative work behavior (IWB). The mediation effect is assessed using standardized beta (β) coefficients, standard deviations (SD), T-values, and P-values (Hair et al., 2019). The mediating effect of Knowledge Sharing (KS) in the relationship between Transformational Leadership (TL) and Innovative Work Behaviour (IWB) is significant, with a standardized beta (β) of 0.498, a standard deviation of 0.094, a T-value of 5.298, and a P-value of 0.000. This indicates that knowledge sharing significantly mediates the relationship between transformational leadership and innovative work behavior, enhancing the impact of transformational leadership on innovation within the organization.

The significance of the mediation effect supports the theoretical framework that transformational leadership not only directly influences innovative work behavior but also fosters an environment where knowledge sharing acts as a crucial mechanism. This finding aligns with previous research indicating that effective leadership promotes a culture of knowledge sharing, which in turn stimulates innovation among employees (Wang and Noe, 2010). The substantial positive mediation effect implies that transformational leaders can

enhance their influence on innovative work behavior by promoting knowledge sharing practices. Leaders who inspire, motivate, and intellectually stimulate their employees are likely to create a supportive environment that encourages the exchange of ideas and knowledge, leading to greater innovation.

Table 5

Mediation testing indirectEffect

Hypothesis	Path Relationship	Std. Beta	SD	T-value	P Values
H4	TL -> KS -> IWB	0.498	0.094	5.298	0.000

Discussion

The findings of this study support H1, i.e., TL is positively associated with IWBs. This conclusion is in agreement with the previous research (Sangperm and Chienwattanasook, 2020). As a new leadership style that has evolved from existing leadership and entrepreneurship literature. The current research adds to the discourse established by Al Ahmad, Easa, and Mostapha (2019) and Tănase (2020), illustrating that while all dimensions of TL positively impact IWB, the most substantial influence comes from the ability of leaders to inspire and motivate their workforce. This finding is particularly relevant to organizations like STC, where innovation is a critical driver of competitive advantage in the rapidly evolving telecommunications sector.

H2 is also supported by the results, TL is positively associated with KS. The results of this study complement the findings of a previous study as a result, according to Latif et al. (2020), effective leadership as a decisive tool in sharing information and knowledge within the organisation. Therefore, realistic and timely decisions can be taken. Consequently, TL is considered as a critical enabler of KS, which enables the organization to harmonies knowledge management behaviors to exploit organisational opportunities in the circumstances of a changing environment, facilitate the learning process, enhance knowledge management capabilities and provide standards for verifying the impact of the success of knowledge management processes, and in particular Anser et al. (2022) argued that proactive TL was crucial to successful KS. Leadership conduct is vital when it comes to KS within an organisation because leaders have an enormous impact on its direction and effectiveness. In detail, TL behaves as a dynamic capability, with initiatives to articulate, share, and leverage knowledge benefiting a firm's knowledge position. The firm's strong TL position requires it to invest in and develop initiatives related to knowledge management (Lo et al., 2021).

The findings also support H3, KS is positively associated with IWB, the results support the findings of a previous study (Malik et al., 2022). It is believed that knowledge is an important source for innovation and imparting IWB, so employees always need to interact to acquire and spread knowledge. Besides, KS is seen as a source of innovation for organisations as the rapid exchange of knowledge and experiences through sharing, it also promotes and assists in the development of thinking and creativity and thus encourages innovative behaviour of the employee (Usmanova et al., 2021).

Likewise, the results support the H4, the results of this study show that KS mediates the relationship between leadership and IWB. The results of this study support those of a previous study which concluded that leadership promotes IWB through KS, which found the significant

mediating role of KS processes (Abualoush et al., 2022). “The entrepreneurship team” always looks to an entrepreneurial leader for the sake of vision, direction, and selection of team members for various tasks and creating the necessary environment to facilitate innovation, encourage creativity, and facilitate knowledge creation and knowledge exchange” (Knezović and Drkić, 2021).

Managerial and Practical Implications

The managerial implications of this research are particularly salient for leaders within the fast-paced and innovation-driven telecommunications sector, such as STC. The research's delineation of the most impactful TL behaviors on innovative work behavior (IWB) offers strategic insights for management practices. The pronounced effect of inspirational motivation, as highlighted by the findings and supported by Kariuki (2021), indicates that managers should prioritize the articulation of a compelling vision and demonstrate commitment to inspire their teams. Amankwaa, Gyensare, and Susomrith (2019) further emphasize the role of inspirational motivation in fostering an innovative mindset, suggesting that managers should engage in regular, meaningful communication that aligns team objectives with organizational goals to spur innovation.

The practical implications of this research are valuable for organizations seeking to harness TL to drive IWB, especially within the context of the Middle Eastern corporate environment. The research's revelation that inspirational motivation is the most influential aspect of TL on IWB offers a clear directive for organizational development initiatives. The results of the study confirmed that KS is a “Driving force for innovation” and that employees play a major role in the process of KS. Therefore, the organisations and managers should focus on finding the effective path and appropriate ways to create the incentive that motivates employees to participate positively and actively in the knowledge-sharing process of innovation (Abualoush et al., 2022).

Limitations and Directions for Future Research

This study was applied in STC which is specialised in telecommunication company. This limits the possibility of generalising the results of this study, as it is limited to a special region, which is Saudi, and in a special industry where other industries may differ in other regions. Therefore, among other contexts, may be misapplied in terms of data, and, hence, may not give the expected results. Future research can be applied in other fields, including industrial or service sectors, and other contexts so as to increase the generalisation of search results. Hence, transformational leaders will develop a clear vision and a better understanding of the pathways that encourage employees to conduct innovative work in different contexts. According to the results of this research, transformational leaders should focus on creating a strong knowledge environment that motivates employees to share their knowledge that helps them open up and create new ideas. In light of the research's limitations, it is also suggested that future research explores the impact of TL on innovation across different industries and cultural contexts. This would help in understanding the generalizability and applicability of the findings and in identifying any industry or culture-specific variations in the way TL influences innovative behaviours.

Conclusion

Leadership has become the key issue in managing organizations, societies, and entire nations. The emerging business and economic environments have forced organizations to be flexible, adaptive, entrepreneurial, and innovative in order to effectively meet the changing demands of the present-day business environment. The objective of this research was to investigate the role of TL factors, KS and innovative work behavior in Saudi Arabia ICT industry. The research conclude that better IWB is achieved when a leader encourage employees to think critically in dealing with problems that they encounter in the course of their work, use their own initiative, and seek innovative methods to approach their work and assignments.

The study on "Transformational Leadership on Innovative Work Behavior Through Knowledge Sharing in Saudi Telecommunication Company (STC)" seeks to explore how transformational leadership influences innovative work behaviors among employees, particularly through the mechanism of knowledge sharing. Here's a breakdown of the motivation and contribution of this study:

Understanding Leadership Impact: In the fast-paced telecommunication sector, effective leadership is crucial for fostering innovation. This study aims to investigate how transformational leadership can inspire employees to engage in innovative behaviors.

Promoting Knowledge Sharing: Knowledge sharing is vital for innovation, yet it can often be hindered by organizational culture. The study focuses on how transformational leaders can create an environment conducive to sharing knowledge among employees.

Relevance to STC: As a leading telecommunication company in Saudi Arabia, STC plays a significant role in the industry. Understanding these dynamics can help STC enhance its competitive edge through improved leadership practices and innovation.

Theoretical Framework: The study contributes to existing literature by linking transformational leadership, knowledge sharing, and innovative work behavior. It adds to the understanding of how these constructs interact in the context of a specific industry.

Practical Implications: The findings could provide actionable insights for STC and similar organizations on cultivating transformational leadership practices that enhance knowledge sharing and, subsequently, innovation.

Cultural Context: By focusing on the Saudi context, the study enriches the global discourse on leadership and innovation, highlighting the unique challenges and opportunities in the region.

Strategic Recommendations: The study can lead to recommendations for training and development programs aimed at enhancing leadership capabilities and fostering a culture of collaboration and innovation.

Overall, this research has the potential to influence both academic understanding and practical applications within the telecommunications sector, particularly in the context of Saudi Arabia's rapidly evolving market.

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