



From Inclusion to Innovation: How Inclusive Leadership Drives Creative Service Performance via Psychological Empowerment

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Article Details:

Received on 23 April 2025

Accepted on 21 May 2025

Published on 24 May 2025

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Abstract

Inclusive leadership has attracted considerable attention from both pharmaceutical industry leaders and academic researchers due to its potential to enhance creative service performance. This study aims to investigate the effect of inclusive leadership on employees' creative service performance within the pharmaceutical sector, while also examining the mediating role of psychological empowerment in this relationship. A total of 260 employees from pharmaceutical companies were selected through a simple random sampling technique to participate in the study. Data were collected using a structured questionnaire based on a five-point Likert scale. Reliability of the scales was confirmed through Cronbach's alpha, and construct validity was established using exploratory factor analysis (EFA). Hypotheses were tested through regression analysis, while the mediating effect of psychological empowerment was assessed using mediation analysis. The results revealed a significant and positive relationship between inclusive leadership and creative service performance. Furthermore, mediation analysis demonstrated that psychological empowerment significantly mediates this relationship. The findings suggest that pharmaceutical organizations can enhance service innovation by fostering inclusive leadership practices that empower employees. The study concludes with a discussion on theoretical and practical implications, limitations, and directions for future research.

Keywords: Inclusive leadership, creative service performance, pharmaceutical companies



Introduction

In the very competitive global economy of today, organizations must be creative to get a financial edge (Farza et al., 2021). In the present competitive environment, the capacity to produce and come up with unique concepts, as well as choose and apply the most successful ones, is critical for company expansion and advancement (Muhammadi et al., 2023). The creative behaviours of an organization's employees such as the development, acceptance, and use of novel concepts for goods, services, or procedures are the primary drivers of success in the competitive and dynamic business contexts (Wu et al., 2019). Businesses require creative employees to sustain their competitive edge in the market (Statsenko & Zubielqui, 2020; Coldevin et al., 2019). Businesses need to evolve in order to be successful because of fierce competition and rising client expectations (Mehta, Kumar, & Ramkumar, 2023).

According to Fairoos et al. (2020), companies may sustain their competitive advantage by endorsing and incentivizing creative work practices. These attributes are highly sought after by contemporary companies, as they significantly impact an organization's capacity for innovation (Audretsch & Belitski, 2023). It is becoming increasingly evident that individuals may make the difference between an innovative endeavors being successful or unsuccessful, even if a large portion of previous research on organizational innovation has focused on administrative views (Javed et al., 2021). Studies have indicated that inventive and creative staff members are frequently the originators of novel concepts inside a company (CSP). Most definitions of leadership place emphasis on the core concepts of "group," "influence," and "goal" (Bryman, 1992). A major concept in IL is the notion of rewarding a manager for motivating "performance beyond expectations" among employees. Furthermore, IL continues to be a top research topic since, according to a previous study by Bass and Riggio (2006), inclusive leadership is the most successful type of leadership.

Inclusive leadership has garnered significant attention and recognition within the fields of organizational behaviour and management (Tan & Wilderom, 2023). One of the most important elements in promoting organizational innovation is IL (Afsar et al., 2019). IL practitioners inspire and motivate people they lead to achieve at higher levels by instilling in them a sense of purpose and vision, offering individualized concern, intellectual stimulation, and idealized influence (Bass & Riggio, 2006; Sudibjo & Prameswari, 2021). In this leadership style, the focus is on motivating and enabling subordinates to achieve remarkable outcomes and surpass their own anticipations (Sudha & Tham, 2023). Transformational leaders aim to create a productive workplace by empowering and developing their subordinates in addition to achieving business objectives (Dang & Pham, 2020; Khalili, 2016). IL creates a positive work atmosphere that supports creativity, innovation, and the pursuit of greater objectives. At work, transformational leaders foster an atmosphere that encourages innovation, creativity, and the pursuit of greater objectives (Fibriandhini and Faerrosa, 2022). IL has been regarded as one of the best leadership philosophies for augmenting an organization's potential for innovation as it encourages transparency, ignites intellectual curiosity, and motivates individuals to take on "behaviours for innovation." Krel (2019); by creating an advantageous atmosphere, IL encourages innovation among staff members and inside the organizations (Nguyen et al., 2023). The positive effects of IL on innovative capacity have been shown in a number of prior researches (Almaskari et al., 2021; Gui et al., 2024).



Inclusive leadership demonstrated a positive effect on the innovative work behaviour of 178 Iranian agriculture specialists; hope and self-efficacy served as partial mediators in this connection (Karimi & Liobikienė, 2023). Inclusive leadership has a favorable impact on innovative work behaviour; psychological capital components such as self-efficacy and hope operate as a partial mediator (Karimi & Liobikienė, 2023). Explicit information sharing outperformed implicit knowledge sharing as a mediating element in the causal relationship between inventive ability and inclusive leadership style. Whereas this link was both increased and controlled by a knowledge-centered culture (Phong & Thanh, 2023). Separate transactional leadership, which has little association with psychological empowerment, transformational, servant, and empowering leadership styles all provide an identical contribution (Schermuly et al., 2022). According to Salem et al. (2023), employing emerging technologies and experimenting with creative problem-solving techniques are examples of creative service performance (CSP).

It is known to increase worker happiness, performance, and organisational effectiveness (Gelaidan & Al-Hakimi, 2023). Innovative work behavior of employees has been linked to a number of things, such as interpersonal interactions, institutional features, work-related needs, and team dynamics (Karimi et al., 2023; Tajeddini et al., 2023; Puni et al., 2022). Organizational and individual level is two levels of analysis for the factors of CSP: Employees with an entrepreneurial attitude and a proactive approach are often highly valued by SMEs. Corporations require workers that are ready to adapt and make adjustments in order to create CSP; however, they also often need leadership support and encouragement to act in a creative way. Inadequate leadership causes SMEs to have difficulties managing their workforce (Vo & Huynh, 2023). More and more aware of the critical role that people play in the success or failure of innovation projects (Javed et al., 2021). Psychological empowerment has become more and more popular in organizational research and practice (Schermuly & Koch, 2022).

Organizations may handle a lot of new obstacles in the corporate world with the help of employee psychological empowerment; yet, some organizations have had difficulties implementing various empowerment initiatives. This failure may have resulted from the implementation of such empowerment without taking into account the mental health of the empowered people (Pada & Wahyudin, 2023). While empowerment is an important component of the plan to implement changes in organizational contexts, according to Ochoa (2023), it can only be sustained if the practice is successful in giving subordinates a psychological sense of empowerment (Gelaidan & Al-kwafi, 2022).

In the context of motivation, empowerment may be broadly classified into three categories: structural, psychological, and leadership (Younas et al., 2023). When workers have confidence at work, it represents an atmosphere that encourages the growth of personal connections and makes them more equipped to handle interactions with and expectations from the organizations (Zhang & Ding, 2023). It is expected that empowered workers would experience reduced constraints and produce positive outcomes, like CSP (Koch et al., 2023). Psychological empowerment increases intrinsic job motivation and has an impact on employee attitudes and performance (Llorente-Alonso & Topa, 2023). Because they perceive their work as more important, employees who have more psychological empowerment are better able to undertake challenging assignments (Mukherjee & Dasgupta, 2022). The notion of proactive personality has gained a lot of attention in organizational psychology and management research because it offers



valuable insights on the characteristics and behavioral features that distinguish individuals who actively impact their workplace (Ullah & Mahmood, 2023).

Because proactive behaviour is important for individual and organizational success, researchers have studied the causes and implications of proactive personality in great detail (Saleem et al., 2023). A proactive personality has a propensity to innovate and create new chances at work (Ahmad et al., 2023). This will demonstrate "a stable disposition to take the lead in numerous endeavors and circumstances (Cutherell, 2023). In contrast to passive workers, active personnel will try to meet standards and objectives. However, sit about patiently awaiting openings or information to strike. Powerful proactive workers are more probable to actively seek out novel ideas and take action to improve their situation rather than letting their surroundings shape (Nguyen et al., 2022). While prior research has primarily focused on management perspectives on organizational innovation, individuals' critical roles in the success or failure of innovation initiatives are increasingly being recognized (Javed et al., 2021). The psychological empowerment associating IL with innovative work behaviours have not been thoroughly examined in recent studies (Muhammadi et al., 2023). To sum up, in order to better understand the mechanism that spurs innovation, this study will examine the role of inclusive leadership as well as an intervening variable psychological empowerment that hasn't been thoroughly explored in earlier research in the context of pharmaceutical companies in Pakistan.

RESEARCH OBJECTIVES

- 1- To investigate the effect of inclusive leadership on creative service performance.
- 2- To investigate the mediating role of psychological, empower among inclusive leadership and creative service performance.

RESEARCH QUESTIONS

- 1- Is inclusive leadership effect creative service performance.
- 2- Is psychological employment mediating the association between inclusive leadership and creative service performance.

LITERATURE REVIEW

It's possible that inclusive leadership personalized attention to and support of their followers encourages and objectives have a greater impact on how much of a creative work environment their followers engage in. These leaders persistently challenge followers' beliefs and ways of thinking, inspiring followers to participate in innovation and idea implementation. By connecting the company vision to individual objectives, these leaders are skilled at inspiring followers and creating a sense of motivation (Bednall et al., 2018). Inclusive leadership encourages and develops new work practices by building a strong feeling of shared purpose and company identity. Inclusive leadership has considerable influence on organizational innovation (Zuraik & Kelly, 2018). These transformative leaders inspire employees to set aside their personal interests and work fervently towards the goals of the company. This impact gives the organization's innovative goals a life of their own and makes them seem legitimate and even important. It is brought about by the leader's drive, emotional pull, and intellectual stimulation (Khan et al., 1994).

Through their creative efforts, functional proficiency, tailored coaching, encouraging environment, and ability to stimulate the mind, IL can inspire employees to exhibit novel work behaviours (Afsar et al., 2014). These leaders typically foster a welcoming atmosphere that inspires staff members to embrace creative work practices



(Bednall et al., 2018). A supportive work environment is established by transformational leaders via inspiration, motivation, and personalized considerations. Workers are inspired to come up with and execute original ideas in a welcoming environment where they may get guidance and support for resolving issues. Cieřlik et al. (2018) used a sample of 420 leader-follower interactions from a mainland Chinese energy company and found that IL had a significant impact on workers' creative accomplishments.

They found that inclusive leadership enhances inventive performance among their workers. According to a study by Choi et al. (2016), inclusive leadership style promoted creative working methods among 356 workers in Korean manufacturing businesses. According to Fu & Jiang (2019) and Brav (2018), innovation is a risky and expensive activity. As such, leaders need to know when and how to support their followers' creative performance. According to Zhang et al. (2021), workplace innovation is enhanced by transformational leaders who foster employees' experimentation, openness, and willingness to take risks. Beyond leadership, other institutional aspects including HR policies and other social and work contexts might impact the follower's view of psychological empowerment. Pieterse et al. (2010) looked at how psychological empowerment affected the relationship between innovative behaviour and transformational and transactional leadership. They conducted interviews with 230 employees of a Dutch government agency as part of their empirical study. According to the findings of their investigation, inventive behaviour and transactional leadership are only negatively correlated in some circumstances. Style of inclusive leadership and worker innovative behaviour, however, are only favorably associated when PE is high. According to Ibrahim et al. (2023), psychological empowerment which ought to be seen as a psychological state that can be partly independent of it should act as a mediator between the effects of authentic leadership. One may make a similar case for transformative leadership.

THEORETICAL FRAMEWORK

This study theoretical framework consists of one independent variable inclusive leadership (IL), one dependent variable (creative service performance (CSP), and one mediator psychological empowerment (PE).

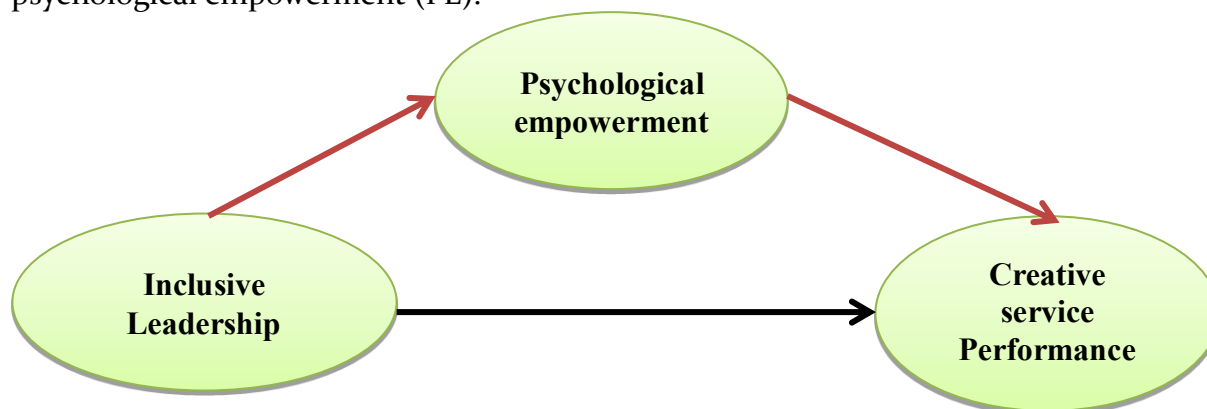


FIGURE 1: *THEORETICAL FRAMEWORK OF THE STUDY*



METHODS

POPULATION OF THE STUDY

The population is the whole group of objects or humans that the researcher wants to conduct research or gather data from. Verifying that the unexplored phenomena occur in this specific group or demographic is crucial when choosing the research population. This study examines at the relationship between inclusive leadership and creative service performance. The scholars were noted by the researcher to occur among pharmaceutical companies' employees.

Hence, the population of the research consists of workers in pharmaceutical companies. The pharmaceutical companies were selected because companies operating in the Peshawar cities must be able to adjust to new developments resulting from technical innovation, competitive markets requiring novel concepts, and creative organizational environments.

SAMPLE SIZE AND SAMPLING METHODS

The stratified random sample approach was employed in this study since there are seven distinct institutions, each with a different personnel count, resulting in seven distinct strata. The current study selected its sample size based on a random process. The scholar was chosen 260 workers from eight pharmaceutical companies i.e., Saydon pharmaceutical company, Nenza pharmaceutical company, Unisa pharmaceutical company, Rehman medicine company, Meditechpharma company, Zynoonpharma company, Heal pharmaceutical company, Chemiworld company, to take part in the study using this method. The number of employees from each stratum who was chosen to take part in the study by proportional stratified sampling method.

MEASUREMENT

Inclusive leadership consists of a ten-item scale used in this study developed by (Carmeli et al., 2013). We measured creative service performance using 6 items scale adopted from (Wang and Netemeyer, 2004). Psychological empowerment as a mediating variable were assessed using its four dimensions impact, meaning, autonomy, and self-determination using a 12-item scale that was adapted from Spreitzer's research (1995).

DATA ANALYSIS TECHNIQUE

SPSS-Process Macro (V.24) was used in this study to analyze quantitative data. To ensure that the study's findings are broadly applicable, reliability, validity, regression analysis, and mediation analysis were performed.

RESULTS

The study results based on the sample data gathered from the target sample are highlighted in this chapter. The scale reliability is displayed in the first portion. The study's regression analysis and mediation results are displayed in the following sections after confirmation.

RELIABILITY TEST

The table given illustrates the reliability of the scale employed in the present study. Scale reliability is the degree to which the scale utilized in this study is reliable or exhibits consistent results when assess repeatedly. Verifying the accuracy of data acquired through questionnaires is crucial in social science research. The scholar validates the scale reliability of the study variables in this study, which include inclusive leadership, creative service performance, and mediating variable psychological empowerment. Several approaches, including Cronbach's Alpha, are used to confirm the scale's consistency. To



ensure scale reliability, academics advise using Cronbach's approach. Alpha has a value between 0 and 1. For scale reliability confirmation that a value reported above 0.7 is the most acceptable value.

TABLE 4.1 RELIABILITY RESULTS

Sr.	Name of Variables	Elements	Value of Alpha
1	Inclusive leadership	10	.941
2	Creative service performance	06	.810
3	Psychological empowerment	12	.904

The reliability statistics of the research variables (IL, CSP, and PE) are presented in Table 4.1. The results indicate that all of the study scales' alpha values are significantly higher than the threshold of 0.7. Based on these findings, it can be concluded that the scale used to measure the variables IL, CSP, and mediating variable PE is reliable. This confirms and satisfies a fundamental requirement of conducting research using questionnaires as a data collection tool.

SCALE VALIDITY

TABLE 4.2 KMO AND BTS

KMO test (IL)		.845
BTS	Approx. Chi-Square	502.632
	df	10
	P	.000

The KMO and BTS test results are displayed in table 4.2 above. The results show that the KMO and BTS analysis values fall within the range that the researchers had suggested. There must be more than 0.6 in the KMO value. As a result, the current study's KMO value of .845 indicates a strong case. Furthermore, the BTS value needs to be significant; in our study, the BTS value is less than 0.05, indicating that the sample size selected is sufficient and the null hypothesis is rejected.

TABLE 4.3: COMMUNALITIES

	Initial	Extraction
IL1	1.000	.766
IL2	1.000	.818
IL3	1.000	.712
IL4	1.000	.788
IL5	1.000	.668
IL6	1.000	.846
IL7	1.000	.866
IL8	1.000	.781
IL9	1.000	.843
IL10	1.000	.753

Extraction Method: Principal Component Analysis.

In the above table 4.3, shows the loading values of the independent variable (IL). To assess IL, the study ten items was used. According to past recommendations, loading values should be higher than .5 for retaining element in the questionnaires. Hence, in the above test, all the items' values are greater than the suggested value and confirm that all the questions in the questionnaire retained.

**TABLE 4.4: KMO AND BARTLETT'S TEST**

KMO test for CSP		.864
BTS	Approx. Chi-Square	1000.878
	df	28
	Sig.	.000

The KMO and BTS test results of creative service performance are displayed in table 4.4 above. The results show that the KMO and BTS analysis values fall within the range that the researchers had suggested. There must be more than 0.6 in the KMO value. As a result, the current study's KMO value of .864 indicates a strong case. Furthermore, the BTS value needs to be significant; in our study, the BTS value is less than 0.05, indicating that the sample size selected is sufficient and the null hypothesis is rejected.

TABLE 4.5: COMMUNALITIES

	Initial	Extraction
CSP ₁	1.000	.893
CSP ₂	1.000	.935
CSP ₃	1.000	.942
CSP ₄	1.000	.758
CSP ₅	1.000	.824
CSP ₆	1.000	.792

Extraction Method: Principal Component Analysis.

In the above table 4.4, shows the loading values of the dependent variable (CSP). To assess IL, the study ten items was used. According to past recommendations, loading values should be higher than .5 for retaining element in the questionnaires. Hence, in the above test, all the items' values are greater than the suggested value and confirm that all the questions in the questionnaire retained.

TABLE 4.6: KMO AND BARTLETT'S TEST

KMO test for PE		.730
BTS	Approx. Chi-Square	282.097
	df	3
	Sig.	.000

The KMO and BTS test results of mediating variable psychological empowerment are displayed in table 4.6 above. The results show that the KMO and BTS analysis values fall within the range that the researchers had suggested. There must be more than 0.6 in the KMO value. As a result, the current study's KMO value of .730 indicates a strong case. Furthermore, the BTS value needs to be significant; in our study, the BTS value is less than 0.05, indicating that the sample size selected is sufficient and the null hypothesis is rejected.

TABLE 4.7: COMMUNALITIES

	Initial	Extraction
PE ₁	1.000	.853
PE ₂	1.000	.907
PE ₃	1.000	.816
PE ₄	1.000	.901
PE ₅	1.000	.862
PE ₆	1.000	.819



PE ₇	1.000	.872
PE ₈	1.000	.871
PE ₉	1.000	.792
PE ₁₀	1.000	.690
PE ₁₁	1.000	.865
PE ₁₂	1.000	.835

Extraction Method: Principal Component Analysis.

In the above table 4.7, shows the loading values of the intervening variable (PE). To assess IL, the study ten items was used. According to past recommendations, loading values should be higher than .5 for retaining element in the questionnaires. Hence, in the above test, all the items' values are greater than the suggested value and confirm that all the questions in the questionnaire retained.

DEMOGRAPHIC VARIABLES

The above tables illustrate the study participants' frequency distribution. The respondents' demographic information is provided below.

TABLE 4.8: GENDERWISE DISTRIBUTION

		Frequency	Percent
Valid	Male	228	87.7
	Female	32	12.3
	Total	260	100.0

The table above reports the distribution of research participants by gender. As can be shown, 87.7 percent of the 228 male respondents took part in the study. Only thirty-two responders, 12.3 % of the total, are female. The following Pie Chart shows the same data in a graphical format.

TABLE 4.9: QUALIFICATION WISE DISTRIBUTION

		Frequency	Percent
Valid	BS	141	54.2
	MA/MSc	32	12.3
	Diplomas	63	24.2
	Other	24	9.2
	Total	260	100.0

The table 4.3 that follows shows the frequency distribution of research participants by qualification. As can be seen, there are 141 responders with BS degree, 54.2 percent of the total. There are 32 MA/MSc participants, representing a valid percentage of 12.3, 63 participants are diploma holders, and 24 are other qualifications. This data is represented graphically in the Pie Chart.

TABLE 4.10: EXPERIENCE WISE DISTRIBUTION

		Frequency	Percent
Valid	5-10 years	98	37.7
	11-15 years	83	31.9
	16-20 years	63	24.2
	Above 20 years	16	6.2
	Total	260	100.0



The accompanying table shows respondents' experience-based on the frequency distribution. There are 98 respondents having 37.7 percent of the total, who have five to ten years of experience. The number of teachers with eleven to fifteen years of experience is 83, and their valid percentage score is 31.9. Similarly, 63 respondents having 24.2% of the sample, had experience ranging from sixteen to twenty years. Lastly, there are just 16 individuals with above twenty years of teaching experience, making up only 6.2 percent of the total. The pie chart below provides a graphical representation of the same information.

TABLE 4.11: AGE WISE DISTRIBUTIONS

	Frequency	Percent
Valid 20-30	115	44.2
31-40	66	25.4
41-50	48	18.5
above 50	31	11.9
Total	260	100.0

The study sample's age-wise frequency distribution is shown in the table above. As shown, 115 respondents having 44.2% of the total were between the ages of 20 and 30. There are 66 individuals in the 31-40 age range having 25.4% of the total. Similarly, 48 participants having 18.5% of the age range from 41-50. Lastly, there are 31 sample respondents who are above 50 years of age representing a valid percentage of 11.9%. The Pie chart reported below shows these statistics in graphical way.

REGRESSION ANALYSIS

Table 4.12 Model Summary

R	R ²	Adj R ²	S.E
.704 ^a	.496	.493	.651

Predictors: IL

The current section involves the regression analysis of the independent variable IL and the research dependent variable, CSP. As shown, the model summary and regression coefficient results between IL and CSP. The model summary results for the association between IL and CSP are displayed in Table 4.12. As can be seen from the table, the independent variable IL accounts for 49% of the variation in creative service performance, with an R² value of 0.496.

Table 4.13: ANOVA

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	80.692	1	80.692	190.646	.000 ^b
Residual	82.112	194	.423		
Total	162.805	195			

DV: CSP

IV: IL

TABLE 4.14: COEFFICIENTS

Model	Unstd Coeff	Stand. Coeffi	t	Sig.
	B	Std. Error	Beta	
1 (Constant)	1.406	.168		8.378 .000
IL	.635	.046	.704	13.807 .000

DV: CSP



Table 4.14 shows the regression coefficients for the study variables. It is demonstrated that inclusive leadership is positively but significantly correlated with dependent variable creative service performance ($t = 13.807$, $p = .000$). This suggests that inclusive leadership will poster creative service performance throughout the company.

MEDIATION ANALYSIS

1ST STEP: RELATIONSHIP OF IL AND PE

TABLE 4.15

R	R ²	SE	P
.7564	.5721	.2997	.000

The study's independent variable (IL) and mediating variable (PE) were noted in table 4.15 above. The table also shows the s.e and R-square value. The data indicates that the IV, or IL, explains 57% of the variance in the PE, with an R² value of .572%.

TABLE 4.16: SUMMARY

Coeff	s.e	T	P	LLCI	ULCI	
Constant	1.409	.1412	9.986	.000	1.1313	1.6882
IL	.6235	.0387	16.105	.000	.5471	.6999

The regression model's coefficient was stated in table 4.16 above. The table indicates that the Unstb value is .62, indicating that a unit change in IV results in a 62% positive unit change in the PE. Additionally, the value of p is less than 0.05 and the value of t is 16.105, both of which are above the usual value of +-2 and indicate a substantial and positive link between predictor IL and PE.

2ND STEP: RELATIONSHIP OF IL AND CSP

TABLE 4.17

R	R ²	SE	P
.7040	.4956	.4233	.000

The study's independent variable (IL) and outcome variable (PE) were noted in table 4.17 above. The table also shows the s.e and R-square value. The data indicates that the IV, or IL, explains 49% of the variance in the CSP, with an R² value of .49%.

TABLE 4.18 SUMMARY

Coeffi	s.e	T	P	LLCI	ULCI	
Constant	1.4056	.1678	8.3784	.000	1.0747	1.7365
IL	.6353	.0460	13.8074	.000	.5445	.7260

The regression model's coefficient was stated in table 4.18 above. The table indicates that the Unstb value is .63, indicating that a unit change in IV results in a 63% positive unit change in the CSP. Additionally, the value of p is less than 0.05 and the value of t is 1, both of which is above the usual value of +-2 and indicates a substantial and positive link between predictor IL and PE.



3RD AND 4TH STEPS: ASSOCIATION BETWEEN IL AND PE WITH CSP
TABLE 4.19

R	R ²	SE	P
.7733	.5979	.3392	.000

The study's independent variable (IL) and mediating variable (PE) with outcome variable (CSP) were noted in table 4.19 above. The table also shows the s.e and R-square value. The data indicates that the IV and MV explain 59% of the variance in the CSP, with an R² value of .59%.

TABLE 4.20: SUMMARY

Coeffi	s.e	T	P	LLCI	ULCI	
Constant	.6511	.1848	3.5234	.0005	.2866	1.0155
PE	.3015	.0630	4.7893	.0000	.1774	.4257
IL	.5352	.0764	7.0077	.0000	.3846	.6859

The summary of the predictor IL and the mediating variable PE with the dependent variable CSP is shown in the above table 4.20. A substantial association between MV and DV has been observed, as indicated by the intervening variable's t value of .53, which is more than the advised value of +-2 and the p value being less than 0.05. As a result, it suggests that the relationship between the independent variable (IL) and the dependent variable (CSP) be partially mediated. This is because the relationship between the independent variable and the dependent variable was significant prior to the mediator's introduction, and it remains significant following the presentation of the mediator's hypothesis (MV) to the model.

DISCUSSION

The findings of this research contribute to our knowledge of self-determination theory via investigating the effect of inclusive leadership on creative service performance in pharmaceutical industries' practices in Khyber Pakhtunkhwa, Pakistan. Particularly focusing on private organizations, this study first developed a conceptual framework based on prior research on IL, CSP, and PE. Present study finding is consisting with prior research. The findings of the present study are supported by several prior studies that emphasize the positive impact of inclusive leadership on creativity and innovation through psychological empowerment. For instance, Javed et al. (2018) found that inclusive leadership significantly enhances innovative work behavior among employees, with psychological empowerment acting as a key mediating mechanism. Their research, conducted across organizational settings in the UK and Canada, highlights how inclusive leadership fosters a sense of ownership and autonomy, leading to greater creativity—findings that align closely with the present study's conclusions. Similarly, Li and Tang (2022) demonstrated that inclusive leadership improves innovative performance at both individual and team levels, with psychological safety and empowerment playing mediating roles. This study reinforces the notion that inclusive leadership cultivates a psychologically secure and motivating environment, essential for creative service performance. Additionally, Gupta et al. (2022) investigated inclusive leadership during the COVID-19 crisis and found it positively influences innovation performance, with employee innovation behavior mediating the relationship and psychological empowerment moderating it. These



studies collectively validate the central proposition of the current research that inclusive leadership significantly boosts creative service performance, primarily through enhancing psychological empowerment among employees.

PRACTICAL IMPLICATIONS

This study offers several important practical implications for management within the pharmaceutical industry. First, organizations should embed inclusive leadership practices into their core culture. Leaders must be trained and encouraged to demonstrate openness, fairness, and participative decision-making, creating a psychologically safe environment where diverse voices can contribute to innovation especially in service-related functions. Second, pharmaceutical managers can actively leverage inclusive leadership to drive service innovation. By fostering a culture where employees feel valued and involved, leaders can unlock creative insights from those working directly with patients, clients, and healthcare professionals, thereby improving service delivery and patient satisfaction. Third, creating empowering work environments is essential. Management should focus on job designs that offer autonomy, encourage initiative, and provide meaningful tasks. Empowering employees in departments such as customer service, pharmacy operations, and support functions enhances their motivation and creative potential.

Fourth, leadership development efforts should be strategically aligned with psychological empowerment goals. It is not enough for managers to be inclusive; they must also be equipped to recognize and nurture the unique capabilities of each team member, thus reinforcing self-efficacy and engagement across the workforce. Fifth, pharmaceutical companies should adopt empowerment-related indicators as part of their performance management systems. Measuring psychological empowerment through engagement surveys or pulse checks can help track whether inclusive leadership is effectively promoting innovation at the service level. Finally, innovation should be encouraged beyond research and development. Often overlooked departments—such as regulatory affairs, logistics, compliance, and sales—can become hubs of creative service solutions when guided by inclusive and empowering leaders. By broadening the scope of innovation and focusing on human-centered management, pharmaceutical companies can create more adaptive, responsive, and sustainable service environments.

THEORETICAL IMPLICATIONS

This study provides valuable contributions to the theoretical discourse in organizational behavior, leadership, and innovation management by positioning inclusive leadership as a critical antecedent of creative service performance. While prior research has extensively linked inclusive leadership to general employee outcomes such as engagement and satisfaction, this study extends the theoretical scope by empirically demonstrating its relevance in stimulating creative outputs specifically within service-oriented roles in the pharmaceutical sector a context where innovation is often narrowly associated with R&D. By doing so, it broadens the applicability of inclusive leadership theory and suggests its value in enhancing service-level innovation. Furthermore, the study offers meaningful advancement to the theoretical framework surrounding psychological empowerment. Positioned as a mediating variable, psychological empowerment is shown to be the mechanism through which inclusive leadership translates into enhanced creative performance. This supports and extends empowerment theory by illustrating how leadership behaviors can influence cognitive and motivational states that, in turn, foster creativity. It also complements social exchange theory, suggesting that when employees



perceive leaders as inclusive and supportive, they are more likely to feel empowered and reciprocate with innovative contributions. In addition, the integration of inclusive leadership, psychological empowerment, and creative service performance contributes to a more unified theoretical model, linking leadership style to innovation through psychological mechanisms. This model encourages scholars to view creativity not as a standalone trait or outcome, but as part of a relational and psychological process shaped by leadership dynamics. Finally, this study invites further theoretical exploration of contextual moderators and boundary conditions, such as organizational culture, industry type, or team dynamics that may influence the strength or direction of these relationships. As such, it lays the groundwork for future theoretical investigations that seek to refine and extend models of leadership and innovation within complex, knowledge-driven environments.

LIMITATIONS AND FUTURE RESEARCH

This research was made possible through the support of a Pakistani organization based in the province of Khyber Pakhtunkhwa. While this context provided valuable insights, organizations differ significantly across industries and regions. To enhance the generalizability of these findings, future studies are encouraged to collect data from a broader range of sectors such as healthcare institutions, insurance companies, and service-based enterprises. Expanding the research across diverse organizational types would help validate and strengthen the current conclusions.

Moreover, future research could explore cross-cultural dimensions to better understand how inclusive leadership and psychological empowerment function across different cultural and organizational contexts. This study identified psychological empowerment as a mediating variable, but it opens up new avenues to examine how inclusive leadership might influence other dimensions of employee creative service performance such as innovation, quality, efficiency, and overall performance. Investigating these factors individually could offer more nuanced insights into how inclusive leadership shapes various aspects of employee creativity and service effectiveness.

REFERENCES

- Adhyke, Y. P., Eliyana, A., Sridadi, A. R., Septiarini, D. F., & Anwar, A. (2023). Hear me out! This is my idea: Inclusive leadership leadership, proactive personality and relational identification. *Sage Open*, 13(1),
- Afsar, B., &Umrani, W. A. (2020). Corporate social responsibility and pro-environmental behavior at workplace: The role of moral reflectiveness, coworker advocacy, and environmental commitment. *Corporate Social Responsibility and Environmental Management*, 27(1), 109-125.
- Afsar, B., Masood, M., &Umrani, W. A. (2019).The role of job crafting and knowledge sharing on the effect of inclusive leadership leadership on innovative work behavior. *Personnel Review*, 48(5), 1186-1208.
- Almaskari, T. H., Mohamad, E., Yahaya, S. N., &Jalil, M. F. (2021). Leadership as a Driver of Employees' Innovation Performance: The Mediating Effect of Cultural Diversity in UAE Universities. *The Journal of Asian Finance, Economics and Business*, 8(8), 271-285.
- Al-Shammari, M. M., &Khalifa, N. Y. (2019). Inclusive leadership and innovative work behavior in an IT department of a public organization in the Kingdom of Bahrain. *International Journal of Human Capital and Information Technology Professionals (IJHCITP)*, 10(3), 20-32.



- Atik, A., Indrayani, I., Khaddafi, M., & Windayati, D. T. (2023). The influence of inclusive leadership, employee engagement, and work environment, on the performance of employees with work discipline as intervening at the general bureau of the regional secretariat of riau islands province. *International Journal of Educational Review, Law and Social Sciences (IJERLAS)*, 3(1), 59-82.
- Audretsch, B. D., & Belinsky, M. (2023). The limits to open innovation and its impact on innovation performance. *Technovation*, 119, 102519.
- Bass, B. M., & Riggio, R. E. (2006). Inclusive leadership.
- Bednall, T. C., E. Rafferty, A., Shipton, H., Sanders, K., & J. Jackson, C. (2018). Innovative behaviour: how much inclusive leadership do you need? *British Journal of Management*, 29(4), 796-816.
- Blau, J. R., & McKinley, W. (1979). Ideas, complexity, and innovation. *Administrative Science Quarterly*, 200-219.
- Brav, A., Jiang, W., Ma, S., & Tian, X. (2018). How does hedge fund activism reshape corporate innovation? *Journal of Financial Economics*, 130(2), 237-264.
- Bryman, A., & Cramer, D. (1992). Quantitative data analysis for social scientists. *Estudios Geográficos*, 53(207), 347.
- Cheng, P., Liu, Z., & Zhou, L. (2023). Inclusive leadership and emotional labor: The mediation effects of psychological empowerment. *International Journal of Environmental Research and Public Health*, 20(2), 1030.
- Choi, S. B., Kim, K., Ullah, S. E., & Kang, S. W. (2016). How inclusive leadership facilitates innovative behavior of Korean workers: Examining mediating and moderating processes. *Personnel Review*, 45(3), 459-479.
- Cieřlik, A., Qu, Y., & Qu, T. (2018). Innovations and export performance: Firm level evidence from China. *Entrepreneurial Business and Economics Review*, 6(4), 27.
- Cutherell, M., Phillips, M., Ellett, C., Woubishet, E., Ede, J. O., Adesina, A., ...& Nichol, K. (2023). Balancing evidence-informed and user-responsive design: Experience with human-centered design to generate layered economic empowerment and SRH programming in Tanzania, Ethiopia, and Nigeria. *Gates Open Research*, 7.
- Dang, T. T., & Pham, A. D. (2020). What make banks' front-line staff more customer oriented? The role of interactional justice. *International journal of bank marketing*, 38(4), 777-798.
- De Jong, J. P., & Den Hartog, D. N. (2008). Innovative work behavior: Measurement and validation. *EIM Business and Policy Research*, 8(1), 1-27.
- Den Hartog, D. N., & Belschak, F. D. (2012). When does inclusive leadership enhance employee proactive behavior? The role of autonomy and role breadth self-efficacy. *Journal of applied psychology*, 97(1), 194.
- Fairoos, M. F. M., Niranga, W. A. M., & Wickramarachchi, R. (2020). A Review on Improving Performance Through Digital Transformation: A study of Best Technologies and Key Success Factors. In *2nd African International Conference on Industrial Engineering and Operations Management (IEOM)* (pp. 1-10).
- Farza, K., Ftiti, Z., Hlioui, Z., Louhichi, W., & Omri, A. (2021). Does it pay to go green? The environmental innovation effect on corporate financial performance. *Journal of Environmental Management*, 300, 113695.
- Fibriandhini, A., Surati, S., Hermanto, H., & Faerrosa, L. (2022). The Effect of Inclusive leadership on Innovative Work Behavior Mediated by the Organizational



- Culture. *ALEXANDRIA (Journal of Economics, Business, & Entrepreneurship)*, 3(2), 42-48.
- Fu, L., & Jiang, X. (2019). Does the multiple-participant innovation improve regional innovation efficiency? A study of China's regional innovation systems. *Sustainability*, 11(17), 4658.
- Gelaidan, H. M., Al-Swidi, A. K., & Al-Hakimi, M. A. (2023). Servant and authentic leadership as drivers of innovative work behaviour: the moderating role of creative self-efficacy. *European Journal of Innovation Management*.
- Gelaidan, H. M., Houtgraaf, G., & Al-kwafi, O. S. (2022). Creativity and innovation in rapidly developing Qatar: the impact of leadership and the mediation of psychological empowerment amidst rapid growth. *International Journal of Public Sector Management*, 35(3), 257-275.
- Gui, L., Lei, H., & Le, P. B. (2024). Fostering product and process innovation through inclusive leadership and knowledge management capability: the moderating role of innovation culture. *European Journal of Innovation Management*, 27(1), 214-232.
- HåkonsenColdevin, G., Carlsen, A., Clegg, S., Pitsis, T. S., & Antonacopoulou, E. P. (2019). Organizational creativity as idea work: Intertextual placing and legitimating imaginings in media development and oil exploration. *Human Relations*, 72(8), 1369-1397.
- Ibrahim, N., Ismail, A., Mat, N., & Erhan, T. (2023). Relationship Between Inclusive leadership and Employees' Creativity with Psychological Empowerment as Mediator. *The South East Asian Journal of Management*, 17(2), 1.
- Iqbal, J., Ashraf, H. A., Islam, A., & Ahmad, M. The Empowerment Bridge: Assessing the Role of Employee Empowerment in Transmitting the Impact of Servant and Inclusive leadership on Creativity and Team Innovation. *Journal of Business and Management Research*, 2(2), 1-18.
- Ishaq, H. M., Ullah, I., & Abbas, F. (2023). Leader's Moral Competence and Employees' Outcomes: Examining the Role of Person-Job Fit, Person-Organization Fit and Psychological Empowerment. *Journal of Business & Economics*, 15(1), 14-35.
- Javed, H. A., Khan, N. A., Michalk, S., Khan, N. U., & Kamran, M. (2023). High-performance work system and innovation capabilities: The mediating role of intellectual capital. *Administrative Sciences*, 13(1), 23.
- Karimi, S., Ahmadi Malek, F., YaghoubiFarani, A., & Liobikienė, G. (2023). The role of inclusive leadership in developing innovative work behaviors: The mediating role of employees' psychological capital. *Sustainability*, 15(2), 1267.
- Khalili, A. (2016). Linking inclusive leadership, creativity, innovation, and innovation-supportive climate. *Management Decision*, 54(9), 2277-2293.
- Khan, M. J., Aslam, N., & Riaz, M. N. (2012). Leadership styles as predictors of innovative work behavior. *Pakistan Journal of Social and Clinical Psychology*, 9(2), 17-22.
- Koch, J., Drazic, I., & Schermuly, C. C. (2023). The affective, behavioral and cognitive outcomes of agile project management: A preliminary meta-analysis. *Journal of Occupational and Organizational Psychology*.
- Wang G, Netemeyer RG. Salesperson creative performance: conceptualization, measurement, and nomological validity. *J Bus Res*. 2004;57(8):805-12.
- Krell, K. (2019). Innovation Adoption: Lessons Learned From a "Best Place to Work" Organization.



- Le, P. B., & Le, H. M. (2023). Stimulating exploitative and exploratory innovation through inclusive leadership and knowledge management capability: the moderating role of competitive intensity. *Leadership & Organization Development Journal*, 44(8), 1037-1056.
- Mehta, M. P., Kumar, G., & Ramkumar, M. (2023). Customer expectations in the hotel industry during the COVID-19 pandemic: a global perspective using sentiment analysis. *Tourism Recreation Research*, 48(1), 110-127.
- Mohammadi, Y., Monavvarifard, F., Salehi, L., Movahedi, R., & Karimi, S. (2023). Liobikien e, G. *Explaining the sustainability of universities through the contribution of students' pro-environmental behavior and the management system. Sustainability*, 15, 1562.
- Mohammadi, Y., Monavvarifard, F., Salehi, L., Movahedi, R., & Karimi, S. (2023). Liobikien e, G. *Explaining the sustainability of universities through the contribution of students' pro-environmental behavior and the management system. Sustainability*, 15, 1562.
- Nguyen, D. T. N., d'Hauteserre, A. M., & Serrao-Neumann, S. (2022). Intrinsic barriers to and opportunities for community empowerment in community-based tourism development in Thai Nguyen province, Vietnam. *Journal of Sustainable Tourism*, 30(4), 723-741.
- Nguyen, V. Q., Turner, N., Barling, J., Axtell, C. M., & Davies, S. (2023). Reconciling general inclusive leadership and safety-specific inclusive leadership: A paradox perspective. *Journal of safety research*, 84, 435-447.
- Novitasari, D., Siswanto, E., Purwanto, A., & Fahmi, K. (2020). Authentic leadership and innovation: what is the role of psychological capital?. *International Journal of Social and Management Studies*, 1(1), 1-21.
- Pada, A. T., & Wahyudin, A. (2023). The mediating role of psychological empowerment and creative process engagement on the influence of leadership empowerment and creativity: case study of CPNS lecture's. *Jurnal Ekonomi*, 12(01), 799-805.
- Phan, A. C., Le, A. T. T., Nguyen, H. T., & Nguyen, H. (2023). Determinants of employee performance in tourism industry—mediating role of engagement and meaningfulness. *International Journal of Productivity and Quality Management*, 38(2), 243-269.
- Phong, L. B., & Thanh, L. T. (2023). Inclusive leadership and Innovation Capability: Roles of Knowledge-centered Culture and Knowledge Sharing. *The Journal of Asian Finance, Economics and Business*, 10(1), 111-121.
- Phong, L. B., & Thanh, L. T. (2023). Inclusive leadership and Innovation Capability: Roles of Knowledge-centered Culture and Knowledge Sharing. *The Journal of Asian Finance, Economics and Business*, 10(1), 111-121.
- Pieterse, A. N., Van Knippenberg, D., Schippers, M., & Stam, D. (2010). Transformational and transactional leadership and innovative behavior: The moderating role of psychological empowerment. *Journal of organizational behavior*, 31(4), 609-623.
- Pramanik, P. D., Leonandri, D. G., Maudiarti, S., Achmadi, M., & Adriani, H. (2022). The Moderating Role of Feedback on the Effect of Goal-Setting Participation on Innovative Work Behaviour. *APMBA (Asia Pacific Management and Business Application)*, 11(2), 221-232.
- Puni, A., Hilton, S. K., Mohammed, I., & Korankye, E. S. (2022). The mediating role of innovative climate on the relationship between inclusive leadership and firm



- performance in developing countries: the case of Ghana. *Leadership & Organization Development Journal*, 43(3), 404-421.
- Saleem, S., Tourigny, L., Raziq, M. M., Shaheen, S., & Goher, A. (2022). Servant leadership and performance of public hospitals: Trust in the leader and psychological empowerment of nurses. *Journal of Nursing Management*, 30(5), 1206-1214.
- Salem, N. H., Ishaq, M. I., Yaqoob, S., Raza, A., & Zia, H. (2023). Employee engagement, innovative work behaviour, and employee wellbeing: Do workplace spirituality and individual spirituality matter? *Business Ethics, the Environment & Responsibility*, 32(2), 657-669.
- Schermuly, C. C., Koch, J., Creon, L. E., Drazic, I., & Graßmann, C. (2022). Developing and testing an instrument to measure the culture for psychological empowerment in organizations (IMPEC). *European Journal of Psychological Assessment*.
- Schermuly, C. C., Meyer, B., & Dämmer, L. (2013). Leader-member exchange and innovative behavior. *Journal of Personnel Psychology*.
- Schuckert, M., Kim, T. T., Paek, S., & Lee, G. (2018). Motivate to innovate: How authentic and transformational leaders influence employees' psychological capital and service innovation behavior. *International Journal of Contemporary Hospitality Management*, 30(2), 776-796.
- Singh, A., El-Bassel, N., Kaushal, N., Meinhart, M., Hartmann, J. K., Mukherjee, T., ... & Dasgupta, A. (2022). Financial dependence and intimate partner violence (IPV) among married Syrian refugee women living in non-camp settings in Jordan. *Journal of Global Health Reports*, 6, e2022011.
- Spreitzer, G. M. (1996). Social structural characteristics of psychological empowerment. *Academy of management journal*, 39(2), 483-504.
- Statsenko, L., & de Zubielqui, G. C. (2020). Customer collaboration, service firms' diversification and innovation performance. *Industrial Marketing Management*, 85, 180-196.
- Sudha, A., Azam, S. F., & Tham, J. (2023). Inclusive leadership and job performance of Maldives Civil Service employees, mediated by organizational commitment. *International Journal of Public Sector Management*.
- Sudibjo, N., & Prameswari, R. K. (2021). The effects of knowledge sharing and person-organization fit on the relationship between inclusive leadership on innovative work behavior. *Heliyon*, 7(6).
- Sueb, S., & Sopiah, S. (2023). Exploring the Relationship between Inclusive leadership and Innovative Work Behavior: A Systematic Literature Review. *Jurnal Visi Manajemen*, 9(2), 62-83.
- Sutardi, D., Nuryanti, Y., Kumoro, D. F. C., Mariyanah, S., & Agistiawati, E. (2022). Innovative work behavior: A strong combination of leadership, learning, and climate. *International Journal of Social and Management Studies*, 3(1), 290-301.
- Tajeddini, K., Budur, T., Gamage, T. C., Demir, A., Zaim, H., & Topal, R. (2023). Impact of diversity management on innovative work behavior: mediating role of human resource management and affective commitment. *Journal of Management Development*, 42(1), 29-53.
- Tan, A. B., van Dun, D. H., & Wilderom, C. P. (2023). Lean innovation training and inclusive leadership for employee creative role identity and innovative work behavior in a public service organization. *International Journal of Lean Six Sigma*.



- Vo, A. H., Nguyen, T. D., Le, Y. N., Cao, H. N. Q., Le, V. N. T., & Huynh, K. L. (2023). Is inclusive leadership always good for innovation? The moderating effect of inclusive leadership on the personality–innovativeness link through knowledge sharing. *International Journal of Organizational Analysis*.
- Wu, L. F., Huang, I. C., Huang, W. C., & Du, P. L. (2019). Aligning organizational culture and operations strategy to improve innovation outcomes: An integrated perspective in organizational management. *Journal of Organizational Change Management*, 32(2), 224-250.
- Younas, A., Wang, D., Javed, B., & Haque, A. U. (2023). Inclusive leadership and voice behavior: The role of psychological empowerment. *The Journal of Social Psychology*, 163(2), 174-190.
- Zhang, M., Zeng, W., Tse, Y. K., Wang, Y., & Smart, P. (2021). Examining the antecedents and consequences of green product innovation. *Industrial Marketing Management*, 93, 413-427.
- Zhang, Z., Xu, Z., & Ding, Y. (2023). Do economic growth target constraints affect firm innovation? *Economic Analysis and Policy*, 78, 373-388.
- Zuraik, A., & Kelly, L. (2018). The role of CEO inclusive leadership and innovation climate in exploration and exploitation. *European journal of innovation management*, 22(1), 84-104.