Copyright © The Author(s) 2026
Journal Social Society Vol 6 No 2, April - June 2026

The Influence of Leadership, Work–Life Balance, and Work Environment on Employee Performance at Puskesmas Mandai, Indonesia

Sela Mita Permatasari [1*], Baso Amang [2], Ilham Labbase [3]

[1, 2, 3] Universitas Muslim Indonesia, Makassar, Indonesia

* selamita990@gmail.com

Abstract

In the context of increasing demands for healthcare service quality, improving employee performance has become a critical priority for public health institutions, particularly at the primary care level. However, limited attention has been given to how leadership, work–life balance, and work environment jointly relate to employee performance in public health centers. This study aims to examine the association between leadership, work–life balance, work environment, and employee performance at Mandai Public Health Center (Puskesmas Mandai), Maros Regency. A quantitative cross-sectional survey was conducted from December 2025 to January 2026 involving all 93 employees. Data were collected through structured questionnaires and analyzed using descriptive statistics and multiple linear regression. The results show that leadership was positively and significantly associated with employee performance ($B = 0.317$; $t = 4.948$; $p < 0.05$). Work–life balance was also positively and significantly associated with employee performance ($B = 0.440$; $t = 11.025$; $p < 0.05$), while work environment showed a positive and significant association with employee performance ($B = 0.181$; $t = 2.579$; $p < 0.05$). The simultaneous test confirmed that the three variables jointly predicted employee performance, $F(3, 89) = 158.325$; $p < 0.05$, with strong explanatory power ($R^2 = 0.842$). Theoretically, this study contributes by showing that employee performance in a primary healthcare context is related to the alignment of organizational leadership, workplace support, and employees' ability to manage work and personal demands. Practically, Mandai Public Health Center may benefit from more predictable scheduling, fair workload distribution, clearer leadership communication, and improvements in service-supporting workplace facilities.

Keywords: *Employee Performance, Leadership, Work–Life Balance, Work Environment*

Introduction

In the era of increasing healthcare demands and service complexity, improving employee performance has become a critical priority for public sector organizations, particularly in primary healthcare institutions (Jumaini et al., 2024). Community Health Centers, or Puskesmas, serve as the frontline of healthcare delivery and play a strategic role in ensuring equitable access to essential health services (Hafid et al., 2024). The effectiveness of these institutions depends greatly on the quality of their human resources because employees directly determine service delivery, patient satisfaction, and public health outcomes (Ama et al., 2024). Therefore, employee performance is not only an internal organizational issue but also an important determinant of healthcare service quality (Abdullah et al., 2025).

This study is grounded in Balance Theory, which explains that individual attitudes and behaviors are shaped by the perceived balance or imbalance among related elements in their

https://doi.org/10.30605/jss.6.2.2026.1286

social and work environment (Heider, 1958). In the context of employee performance, leadership, work environment, and work–life balance can be understood as interconnected factors that influence how employees perceive their roles, responsibilities, and organizational support. When leadership practices are supportive, the work environment is conducive, and employees are able to balance work and personal responsibilities, a more balanced psychological and organizational condition is likely to emerge. This balance can encourage motivation, commitment, and better job performance. Conversely, imbalance among these factors may create stress, uncertainty, dissatisfaction, and reduced performance.

Human resources represent a dynamic and valuable organizational asset because employees possess the ability to think, innovate, adapt, and respond to changing organizational demands. Unlike physical resources, human resources require effective management to maximize their potential. Employee performance, therefore, becomes a key indicator of how well an organization manages its workforce. In healthcare settings, employee performance is even more crucial because it directly affects the quality, continuity, and effectiveness of patient care.

Previous studies have shown that leadership is one of the important determinants of employee performance. Effective leadership can shape employee behavior, motivation, discipline, and productivity by providing direction, support, and a shared organizational vision (Robbins & Judge, 2019). Leadership also influences employee performance through its role in strengthening motivation and work discipline (Mangkunegara, 2017). However, leadership cannot be understood as an isolated factor because its effectiveness is often influenced by the organizational context in which employees work. A strong leadership style may not produce optimal performance if employees face an unsupportive work environment or excessive work–life conflict.

The work environment is also an important factor in determining employee performance. A supportive work environment, both physical and non-physical, can improve employee productivity, comfort, and job satisfaction (Sedarmayanti, 2018). Adequate facilities, clear communication, positive interpersonal relationships, and a healthy organizational climate can help employees perform their duties more effectively (Wardana et al., 2025). However, previous studies on the work environment often emphasize environmental conditions as a separate predictor, without sufficiently explaining how these conditions interact with leadership practices and employees' personal well-being (Surianto & Nurfahira, 2025; Rabuana & Yanuar, 2023).

Work–life balance has also received increasing attention in human resource management literature, particularly in service-oriented sectors. Work–life balance is essential for maintaining employees' psychological well-being and overall performance (Greenhaus & Allen, 2011). Employees who are able to balance professional and personal responsibilities tend to experience lower stress, higher job satisfaction, stronger commitment, and better productivity (Badaruddin et al., 2024; Monata & Yulihasri, 2024). Nevertheless, many studies on work–life balance have been conducted in corporate or private sector contexts, while public healthcare institutions have different characteristics, such as high service demands, administrative responsibilities, emotional labor, and direct interaction with the community.

The existing literature indicates that leadership, work environment, and work–life balance are all relevant to employee performance. However, prior studies tend to examine these variables separately, resulting in a fragmented understanding of employee performance determinants. This creates a theoretical gap because employee performance in healthcare

institutions is likely shaped not by a single factor, but by the balance among organizational leadership, environmental support, and employees' ability to manage work and personal demands. From the perspective of Balance Theory, employee performance may improve when these three factors are aligned, because employees perceive consistency between organizational expectations, workplace support, and personal capacity. In contrast, imbalance among these factors can weaken motivation, increase stress, and reduce performance.

This gap is particularly relevant in primary healthcare institutions. Unlike corporate or industrial organizations, Puskesmas employees are required to manage both administrative duties and direct public service responsibilities. They must respond to community health needs, maintain service quality, complete reporting tasks, and adapt to changing public health programs. These conditions make employee performance in Puskesmas highly dependent on the interaction between leadership direction, workplace conditions, and work–life balance. Therefore, examining these variables in an integrated model is important to provide a more comprehensive explanation of employee performance in public healthcare settings.

Preliminary observations at Puskesmas Mandai, Maros Regency, indicate that employee performance is influenced by several organizational and individual challenges. Employees experience changing work schedules, high service demands, limited participation in decision-making, workplace limitations, and additional administrative responsibilities beyond standard working hours. These conditions suggest that employee performance cannot be explained only by one factor, but needs to be analyzed through a multidimensional framework involving leadership, work environment, and work–life balance.

Based on the theoretical framework and research gap, this study offers several contributions. First, it integrates leadership, work environment, and work–life balance into a single analytical model to examine their partial and simultaneous effects on employee performance. Second, it applies Balance Theory to explain how the alignment or imbalance among organizational, environmental, and individual factors may shape employee performance. Third, it focuses on a primary healthcare institution in Indonesia, a context that remains underrepresented in previous studies on employee performance. Thus, the novelty of this study lies not only in combining three variables, but also in explaining employee performance as the result of balance among leadership support, workplace conditions, and employees' personal well-being.

This study aims to analyze the influence of leadership, work environment, and work–life balance on employee performance at Puskesmas Mandai, Maros Regency. The hypotheses of this study are formulated as follows:

H1: Leadership has a positive and significant effect on employee performance at Puskesmas Mandai.

H2: Work environment has a positive and significant effect on employee performance at Puskesmas Mandai.

H3: Work–life balance has a positive and significant effect on employee performance at Puskesmas Mandai.

H4: Leadership, work environment, and work–life balance simultaneously have a positive and significant effect on employee performance at Puskesmas Mandai.

The findings of this study are expected to contribute both theoretically and practically. Theoretically, this research enriches human resource management literature by offering an

integrated framework based on Balance Theory to explain employee performance in public healthcare institutions. Practically, the results may provide useful insights for healthcare managers and policymakers in designing strategies to improve employee performance through better leadership practices, more supportive work environments, and policies that promote work–life balance. Therefore, improving employee performance in healthcare institutions requires a multidimensional approach that considers the interaction among organizational, environmental, and individual factors.

Method

This study employed a quantitative explanatory research design with a cross-sectional survey approach to examine the influence of leadership, work–life balance, and work environment on employee performance. This design was selected because the study aimed to test predetermined hypotheses using numerical data and statistical analysis. Although observations and limited interviews were conducted, they were used only to understand the organizational context and support the interpretation of the findings, while the statistical analysis was based solely on questionnaire data. Therefore, this study did not apply a mixed-methods design.

The research was conducted at Puskesmas Mandai, Maros Regency, South Sulawesi, Indonesia, from December 2025 to January 2026. The population consisted of all 93 employees of Puskesmas Mandai, including both medical and non-medical staff involved in service and administrative activities. Because the population was relatively small and accessible, this study used a census sampling technique, in which all members of the population were included as respondents. A total of 93 questionnaires were distributed and returned, resulting in a 100% response rate. The sample size was considered adequate for multiple regression because the study involved three independent variables, producing a ratio of 31 observations per predictor.

Primary data were collected using a structured questionnaire measured with a five-point Likert scale, ranging from 1 = strongly disagree to 5 = strongly agree. Leadership was measured using indicators of communication, decision-making, motivation, support, and fairness. Work–life balance was measured through indicators related to workload management, work flexibility, stress management, and balance between work and personal life. Work environment was measured through physical and non-physical aspects, including workplace conditions, safety, facilities, interpersonal relationships, and organizational atmosphere. Employee performance was measured using indicators of work quality, work quantity, timeliness, responsibility, and effectiveness. To improve transparency and replicability, the complete questionnaire items are provided in the appendix.

Data quality testing was conducted using validity and reliability tests. Item validity was assessed using Pearson product-moment correlation, where an item was considered valid if the calculated correlation coefficient exceeded the r-table value of 0.2039 at the 5% significance level. Reliability was tested using Cronbach's Alpha, with values above 0.60 considered acceptable for social science research. Since this study did not conduct factor analysis, composite reliability, or average variance extracted, the validity interpretation is limited to item validity rather than full construct validity.

Data analysis was performed using SPSS version 26.0. Descriptive statistics were used to describe respondent characteristics and variable tendencies. Prior to regression analysis, classical assumption tests were conducted, including normality, multicollinearity, and

heteroscedasticity tests. Normality was assessed using the Kolmogorov–Smirnov test and supported by Normal Probability Plot inspection. Multicollinearity was assessed using tolerance and Variance Inflation Factor values, while heteroscedasticity was examined using scatterplot analysis.

Multiple linear regression analysis was employed to examine the effects of leadership, work–life balance, and the work environment on employee performance. This statistical method enabled the simultaneous assessment of each independent variable while controlling for the others, thereby providing a comprehensive understanding of their individual and combined contributions to employee performance. The regression model was formulated as follows:

$$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \varepsilon$$

where Y represents employee performance, X_1 represents leadership, X_2 represents work–life balance, X_3 represents work environment, β_0 represents the constant, β_1–β_3 represent regression coefficients, and ε represents the error term. The t-test was used to examine the partial effect of each independent variable, while the F-test was used to examine the simultaneous effect of all independent variables. The coefficient of determination, including R^2 and adjusted R^2, was used to measure the explanatory power of the regression model. The overall effect size was interpreted using Cohen's f^2 based on the obtained R^2 value.

Because all variables were measured using self-reported questionnaires, the potential risk of common method bias is acknowledged as a methodological limitation. In addition, this study did not conduct EFA, CFA, composite reliability, AVE, Durbin-Watson test, formal heteroscedasticity testing, or outlier diagnostics. Therefore, the findings should be interpreted within these methodological boundaries, and future studies are encouraged to apply more advanced validity testing and robustness procedures.

Results

Overview of Respondents

This study was conducted at Puskesmas Mandai, Maros Regency, Indonesia, from December 2025 to January 2026. The respondents consisted of 93 employees. Data were collected using a structured questionnaire distributed to all employees through a census approach. As shown in Table 1, all 93 questionnaires were returned and considered usable for analysis, resulting in a 100% response rate.

Table 1. Questionnaire distribution and return rate

No	Description	Total
1	Questionnaires distributed	93
2	Questionnaires not returned	0
3	Questionnaires returned	93
4	Questionnaires usable for analysis	93

Table 1 indicates that all distributed questionnaires were returned and used in the analysis. Thus, the dataset used in this study consisted of 93 valid responses. The complete return of questionnaires shows that there were no missing responses at the data collection stage. This condition supports the completeness of the dataset used for the subsequent statistical analysis.

Respondent Characteristics

Table 2. Respondent characteristics

Respondent Characteristics	Category	Frequency	Percentage
Gender	Male	51	54.84%
	Female	42	45.16%
	Total	93	100%
Education	High School	4	4.30%
	Diploma (D3)	19	20.43%
	Bachelor (S1)	43	46.24%
	Master (S2)	27	29.03%
	Total	93	100%
Age	< 30 years	27	29.03%
	31–40 years	31	33.33%
	41–50 years	23	24.73%
	> 50 years	12	12.90%
	Total	93	100%

Table 2 presents the demographic characteristics of the respondents. Based on gender, 51 respondents were male (54.84%) and 42 respondents were female (45.16%). In terms of education, most respondents held a bachelor's degree (46.24%), followed by master's degree holders (29.03%), diploma graduates (20.43%), and high school graduates (4.30%). Based on age, the largest group of respondents was aged 31–40 years (33.33%), followed by respondents under 30 years (29.03%), respondents aged 41–50 years (24.73%), and respondents above 50 years (12.90%). These data provide a descriptive overview of the respondents involved in the study, including their demographic characteristics and relevant background information, thereby offering a clearer understanding of the sample used for the analysis.

Descriptive Statistics

Table 3. Descriptive statistics

Variable	N	Min	Max	Mean	Std. Dev.
Leadership (X1)	93	1.60	5.00	4.3484	0.64465
Work–Life Balance (X2)	93	3.50	5.00	4.3634	0.37958
Work Environment (X3)	93	2.80	5.00	4.3226	0.56954
Employee Performance (Y)	93	3.43	5.00	4.3456	0.42926

Table 3 presents the descriptive statistics for leadership, work–life balance, work environment, and employee performance. The mean scores of all variables were above 4.30 on a five-point Likert scale. Work–life balance had the highest mean score (M = 4.3634), followed by leadership (M = 4.3484), employee performance (M = 4.3456), and work environment (M = 4.3226). These results indicate that respondents generally gave high ratings to all research variables.

The high mean scores and relatively low standard deviations indicate a possible ceiling effect and response homogeneity. This pattern suggests that many respondents tended to select "agree" or "strongly agree," which may reduce data variability and affect the sensitivity of variance-based analysis. Therefore, the descriptive results should be interpreted with caution because they may reflect social desirability bias, acquiescence bias, or limited scale sensitivity.

Validity Test

Table 4. Validity test results

Variable	Item	Pearson Correlation	r-table	Description
Leadership (X1)	X1.1	0.913**	0.2039	Valid
	X1.2	0.786**	0.2039	Valid
	X1.3	0.800**	0.2039	Valid
	X1.4	0.871**	0.2039	Valid
	X1.5	0.843**	0.2039	Valid
Work–Life Balance (X2)	X2.1	0.544**	0.2039	Valid
	X2.2	0.582**	0.2039	Valid
	X2.3	0.640**	0.2039	Valid
	X2.4	0.527**	0.2039	Valid
	X2.5	0.530**	0.2039	Valid
	X2.6	0.518**	0.2039	Valid
	X2.7	0.524**	0.2039	Valid
	X2.8	0.506**	0.2039	Valid
	X2.9	0.605**	0.2039	Valid
	X2.10	0.532**	0.2039	Valid
Work Environment (X3)	X3.1	0.745**	0.2039	Valid
	X3.2	0.809**	0.2039	Valid
	X3.3	0.735**	0.2039	Valid
	X3.4	0.667**	0.2039	Valid
	X3.5	0.779**	0.2039	Valid
Employee Performance (Y)	Y1	0.686**	0.2039	Valid
	Y2	0.684**	0.2039	Valid
	Y3	0.741**	0.2039	Valid
	Y4	0.637**	0.2039	Valid
	Y5	0.383**	0.2039	Valid
	Y6	0.358**	0.2039	Valid
	Y7	0.721**	0.2039	Valid

Table 4 shows that all questionnaire items had Pearson correlation values above the r-table value of 0.2039. Therefore, all items met the item validity criterion and were retained for further analysis. However, several items, particularly Y5 (r = 0.383) and Y6 (r = 0.358), showed relatively weak correlation values compared with the other items. Thus, the interpretation of these items should be made cautiously.

Reliability Test

Table 5. Reliability test results

Variable	Cronbach's Alpha	Interpretation
Leadership (X1)	0.896	Reliable
Work–Life Balance (X2)	0.744	Reliable
Work Environment (X3)	0.795	Reliable
Employee Performance (Y)	0.706	Reliable

Table 5 presents the reliability test results using Cronbach's Alpha. All variables had Cronbach's Alpha values above 0.60. These data provide a descriptive overview of the respondents involved in the study, including their demographic characteristics and relevant background information, thereby offering a clearer understanding of the sample used for the analysis. These data provide a descriptive overview of the respondents involved in the study, including their demographic characteristics and relevant background information, thereby offering a clearer understanding of the sample used for the analysis.

Classical Assumption Tests

Table 6. Kolmogorov–smirnov normality test

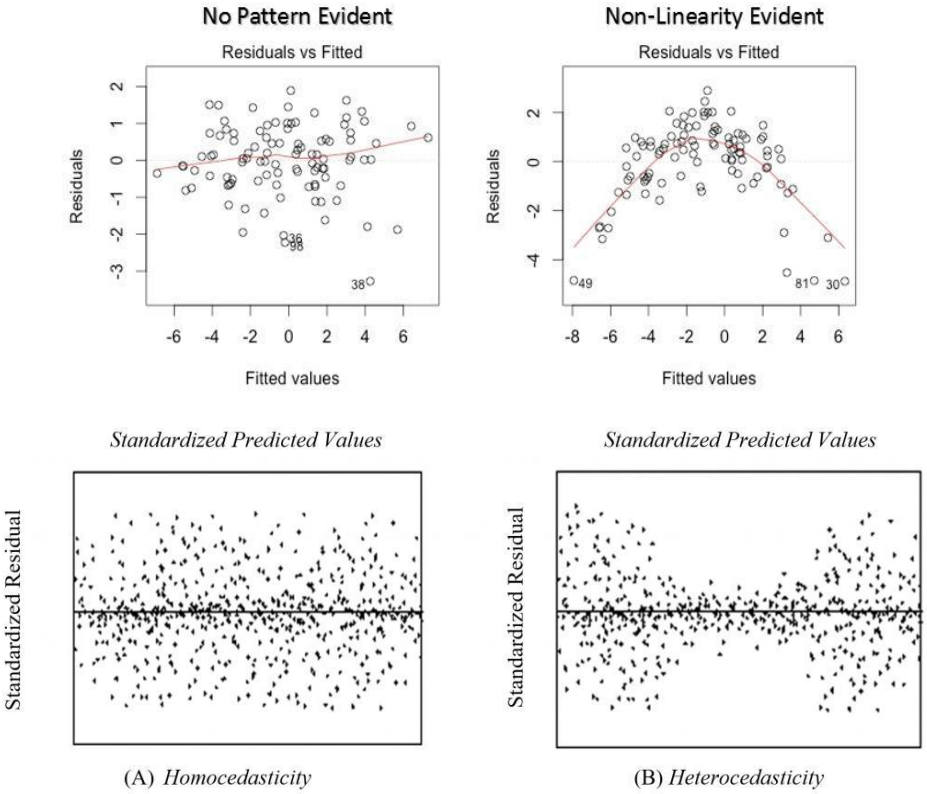
Statistic	Value
N	93
Sig.	0.002

As shown in Table 6, the Kolmogorov–Smirnov test produced a significance value of 0.002, which is below 0.05. This indicates that the residuals were not normally distributed based on the statistical test. Therefore, the normality assumption should be interpreted with caution, and this condition should be acknowledged as a limitation of the regression analysis.

Table 7. Multicollinearity test

Variable	Tolerance	VIF
Leadership (X1)	0.375	2.666
Work–Life Balance (X2)	0.696	1.436
Work Environment (X3)	0.399	2.505

Table 7 shows that all tolerance values were above 0.10 and all VIF values were below 10. These results indicate that multicollinearity was not detected among the independent variables.



Gambar 1. *Scatterplot* Antara *Standardized Predicted Y* dan *Standardized Residual*.

Figure 1. Scatterplot of regression residuals

Figure 1 presents the scatterplot of regression residuals used to examine heteroscedasticity. The residual points appear to be randomly distributed and do not form a clear pattern, such as a funnel, wave, or systematic clustering. This pattern suggests that heteroscedasticity was not visually detected in the regression model. However, because this study only used scatterplot inspection and did not conduct formal statistical tests such as the

Glejser test, Breusch-Pagan test, or White test, the heteroscedasticity result should be interpreted cautiously.

Multiple Linear Regression Analysis

Table 8. Regression results

Variable	B	t	Sig.
Constant	0.387	0.259	0.796
Leadership (X1)	0.317	4.948	<0.001
Work–Life Balance (X2)	0.440	11.025	<0.001
Work Environment (X3)	0.181	2.579	0.012

Table 8 presents the results of the multiple linear regression analysis. The regression equation is expressed as follows:

$$Y = 0.387 + 0.317X_1 + 0.440X_2 + 0.181X_3 + \varepsilon$$

The results show that leadership was positively and significantly associated with employee performance (B = 0.317, t = 4.948, p < 0.001). Work–life balance was also positively and significantly associated with employee performance (B = 0.440, t = 11.025, p < 0.001). In addition, work environment was positively and significantly associated with employee performance (B = 0.181, t = 2.579, p = 0.012). These findings indicate that leadership, work–life balance, and work environment were significant predictors of employee performance in the regression model.

It should be noted that the coefficients reported in Table 8 are unstandardized coefficients (B), not standardized beta coefficients (β). Therefore, these values cannot be used to determine the relative dominance of each independent variable. Although work–life balance had the largest unstandardized coefficient, relative dominance cannot be concluded without standardized beta coefficients.

Hypothesis Testing

The t-test results indicate that leadership, work–life balance, and work environment were each positively and significantly associated with employee performance. Leadership was significantly associated with employee performance at p < 0.001; therefore, H1 was supported. Work–life balance was significantly associated with employee performance at p < 0.001; therefore, H2 was supported. Work environment was also significantly associated with employee performance at p = 0.012; therefore, H3 was supported.

Table 9. Model summary

R	R^2	Adjusted R^2
0.918	0.842	0.837

Table 9 shows that the R^2 value was 0.842, indicating that 84.2% of the variance in employee performance was explained by leadership, work–life balance, and work environment. The adjusted R^2 value of 0.837 indicates that the model remained stable after adjusting for the number of predictors.

However, the R^2 value is very high for a social science study using self-reported perceptual data collected at a single point in time. Therefore, this finding should be interpreted carefully. The high explanatory value may indicate strong relationships among the variables, but it may also reflect possible common method bias, response homogeneity, or inflated associations due to the use of a single data source.

Table 10. ANOVA test

Model	df	F	Sig.
Regression	3	158.325	<0.001
Residual	89		
Total	92		

As shown in Table 10, the F-test result indicated that the regression model was statistically significant, $F(3, 89) = 158.325$, $p < 0.001$. This means that leadership, work–life balance, and work environment jointly predicted employee performance. Thus, the simultaneous hypothesis was supported. However, the ANOVA table should be completed with sum of squares and mean square values from the SPSS output to provide a more complete report of the model fit.

Summary of Findings

The results show that leadership, work–life balance, and work environment were positively and significantly associated with employee performance, both partially and simultaneously. The regression model had a high explanatory value, as indicated by $R^2 = 0.842$. Nevertheless, the findings should be interpreted within several methodological limitations, including the use of cross-sectional self-reported data, possible ceiling effect, response homogeneity, absence of standardized beta coefficients, and the lack of formal tests for common method bias and heteroscedasticity. Therefore, the results indicate significant statistical associations rather than causal effects.

Discussion

The Association Between Leadership and Employee Performance

The results of hypothesis testing indicate that leadership was positively and significantly associated with employee performance ($t = 4.948$; $p < 0.05$). This finding suggests that leadership practices, as reflected in communication clarity, decision-making, motivation, support, and fairness, are relevant predictors of employee performance at Puskesmas Mandai. Employees who perceive their leaders as communicative, supportive, and fair may be more likely to understand work expectations, follow service procedures, and maintain responsibility in completing their duties.

This finding is consistent with previous studies showing that leadership is related to employee performance through direction, motivation, and work discipline mechanisms (Umar et al., 2022; Wati et al., 2022). It is also in line with recent healthcare management research showing that transformational leadership can support health workers' well-being through organizational justice and quality of work life (Alruwaili, 2025). From the perspective of Balance Theory, leadership can be understood as a relational factor that helps create alignment between organizational expectations and employee attitudes. When employees perceive that leadership practices are fair and supportive, psychological balance in the work relationship may be strengthened, which is then reflected in better performance-related behavior.

The leadership coefficient should not be interpreted as a causal effect because this study used a cross-sectional survey design. In addition, the role of leadership should be interpreted alongside other organizational factors. Although preliminary observations indicated leadership-related issues such as top-down communication and changing task schedules, the regression results showed that leadership was not the only predictor associated with employee

performance. This suggests that leadership may operate together with other mechanisms, such as workload management, work–life balance, and workplace support.

The Association Between Work–Life Balance and Employee Performance

The results show that work–life balance was positively and significantly associated with employee performance ($t = 11.025$; $p < 0.05$). Work–life balance had the largest unstandardized coefficient in the regression model. However, because standardized beta coefficients were not reported, it cannot be concluded that work–life balance was the most dominant predictor. Therefore, the finding should be interpreted as evidence that work–life balance is a significant predictor, not as definitive proof of relative dominance over leadership or work environment.

This result indicates that employees who perceive better balance between work and personal responsibilities tend to report higher performance. In the context of Puskesmas Mandai, this association may be explained by the nature of primary healthcare work, which often involves service demands, administrative reporting, community outreach activities, and occasional schedule changes. Under these conditions, the ability to manage time, workload, and stress may become especially important for maintaining focus, energy, and consistency in completing work tasks.

This finding is supported by previous studies showing that work–life balance is related to job satisfaction, reduced stress, and better work outcomes (Husen & Firman, 2024; Putro & Wajdi, 2024; Wildiawanti, 2024). International healthcare literature also emphasizes that work–life balance and workload management are important for reducing burnout and improving healthcare professionals' well-being and service quality (Mitra et al., 2024; Razai et al., 2023; Abuhammad et al., 2025). In high-demand healthcare settings, work–life balance may become more salient because employees are required to manage both patient service responsibilities and administrative obligations.

Nevertheless, alternative explanations should be considered. The strong association between work–life balance and employee performance may reflect reverse causality, where employees with better performance receive more manageable schedules or greater flexibility. It may also reflect the influence of a third variable, such as organizational culture, staffing adequacy, or supervisory support, which may simultaneously improve work–life balance and employee performance. Therefore, future studies should consider longitudinal designs or mediation models to clarify the mechanism linking work–life balance and performance.

The Association Between Work Environment and Employee Performance

The findings indicate that work environment was positively and significantly associated with employee performance ($t = 2.579$; $p < 0.05$). This suggests that physical and non-physical workplace conditions, including facilities, safety, interpersonal relationships, and organizational atmosphere, are relevant to employee performance at Puskesmas Mandai. A supportive work environment may help employees complete their tasks more comfortably and maintain work concentration.

This finding is consistent with previous studies showing that work environment is associated with employee performance and productivity (Sakarina & Noviantoro, 2024; Suprianti et al., 2025). From the perspective of Balance Theory, workplace conditions may influence employee perceptions of alignment between work demands and organizational

support. When employees perceive that their work environment supports their duties, they may experience a more balanced work situation that supports performance-related behavior.

The work environment showed a smaller unstandardized coefficient than leadership and work–life balance in this study. This finding needs critical reflection because the introduction identified practical issues related to workspace adequacy, ventilation, facilities, and service pressure. One possible explanation is the limited variance in respondents' answers, as indicated by the high mean scores and relatively low standard deviations. When most respondents give similarly high ratings, the statistical ability to detect stronger relationships may be reduced. Another possibility is that employees may have adapted to existing workplace conditions, making the work environment appear less variable in the regression model.

Therefore, the work environment result should not be interpreted as unimportant. Instead, it suggests that improvements in workplace conditions should still be considered, especially in areas directly related to service delivery, patient flow, workspace comfort, and emotional pressure from interactions with patients. In the Puskesmas context, practical improvements may include better room arrangement, clearer patient service flow, adequate supporting facilities, and mechanisms to reduce stress during peak service hours.

The Joint Association of Leadership, Work–Life Balance, and Work Environment with Employee Performance

The F-test results indicate that leadership, work–life balance, and work environment jointly predicted employee performance ($F = 158.325$; $p < 0.05$). This finding supports the view that employee performance is associated with a combination of organizational, environmental, and individual factors. Leadership provides direction and support, work–life balance relates to employees' ability to manage work and personal demands, and the work environment provides physical and social conditions for task completion.

The integration of these three variables offers a clearer theoretical mechanism than examining each variable separately. In the context of Balance Theory, employee performance can be understood as the result of perceived alignment among leadership support, workplace conditions, and employees' personal capacity to manage work demands. When these factors are aligned, employees may experience a more stable and supportive work situation. When they are misaligned, employees may experience uncertainty, stress, or reduced motivation.

However, the coefficient of determination in this study was very high ($R^2 = 0.842$). Although this indicates strong explanatory power, it should be interpreted cautiously because the study used self-reported questionnaire data collected from the same respondents at one point in time. This condition creates the possibility of common method bias, where relationships among variables may be inflated because all variables were measured using the same method. The high mean scores and low response variability also suggest a possible ceiling effect, social desirability bias, or acquiescence bias. These conditions may affect the accuracy of variance-based interpretation.

Therefore, the simultaneous association among leadership, work–life balance, work environment, and employee performance should not be interpreted as causal evidence. The findings indicate statistical associations within the observed dataset. Future research should use longitudinal data, multiple data sources, supervisor-rated performance, or objective performance indicators to reduce common method bias and strengthen causal interpretation.

Practical Implications for Puskesmas Mandai

The findings provide several practical implications for Puskesmas Mandai. First, leadership improvement should focus on clearer communication, more consistent task allocation, and greater employee involvement in operational decision-making. This is particularly relevant during outreach programs, immunization campaigns, and community health monitoring activities, where sudden schedule changes may disrupt workflow.

Second, work–life balance should be supported through more predictable work scheduling, fair distribution of additional duties, and clearer boundaries for administrative reporting tasks outside regular working hours. Managers may consider rotating additional assignments, setting reasonable deadlines for reports, and providing recovery time after high-intensity service activities.

Third, work environment improvement should focus on issues that directly affect service delivery and employee comfort. These may include improving room arrangement, ventilation, service flow, facility availability, and mechanisms for managing emotional pressure during peak patient service periods. Such improvements are more specific to the Puskesmas context than general recommendations to improve the work environment.

Summary of Discussion

Overall, this study found that leadership, work–life balance, and work environment were positively and significantly associated with employee performance, both partially and jointly. The findings suggest that employee performance in a primary healthcare institution is related not only to leadership practices or workplace conditions, but also to employees' ability to maintain balance between work and personal responsibilities. However, these results should be interpreted within the methodological limitations of the study, including cross-sectional design, self-reported data, possible ceiling effect, response homogeneity, absence of standardized beta coefficients, and the possibility of common method bias. Therefore, the study contributes to the literature by showing how organizational support, work conditions, and work–life balance may jointly relate to employee performance in a Puskesmas context, while also indicating the need for more rigorous future research designs.

Conclusion

This study examined the association between leadership, work–life balance, work environment, and employee performance at Puskesmas Mandai, Maros Regency. The findings show that all proposed hypotheses were supported. Leadership was positively and significantly associated with employee performance ($B = 0.317$; $t = 4.948$; $p < 0.05$). Work–life balance was also positively and significantly associated with employee performance ($B = 0.440$; $t = 11.025$; $p < 0.05$), while work environment was positively and significantly associated with employee performance ($B = 0.181$; $t = 2.579$; $p < 0.05$). The simultaneous test showed that the three variables jointly predicted employee performance, $F(3, 89) = 158.325$, $p < 0.05$, with an R^2 value of 0.842.

Although work–life balance had the largest unstandardized coefficient, relative dominance among the predictors cannot be concluded because standardized beta coefficients were not reported. Therefore, the findings should be interpreted as statistical associations rather than causal effects. Practically, Puskesmas Mandai may consider improving leadership communication, consistency in task allocation, workload management, scheduling practices, and workplace facilities to support employee performance.

This study has several limitations, including its single-institution setting, cross-sectional design, self-reported data, possible common method bias, high mean scores indicating a potential ceiling effect, non-normal residual distribution, and relatively weak item correlations for several performance indicators. Future studies should involve multiple healthcare institutions, use longitudinal or intervention-based designs, include supervisor-rated or objective performance data, and apply stronger instrument validation such as factor analysis, composite reliability, and average variance extracted.

Acknowledgment

-

References

Abdullah, I., Sulaiman, S., Mukrima, N. A., & Kahar. (2025). Influence quality service employee to loyalty customers at BRI Bank Tassililu Unit Subdistrict West Sinjai. *Income Journal of Economics Development, 5*(1), 16–26. https://doi.org/10.54065/ijed.5.1.2025.352

Abuhammad, S., Alzoubi, K. H., Al-Azzam, S., Karasneh, R., Masadeh, M. M., & Alameddine, M. (2025). Work-life balance, job satisfaction, and burnout among nurses in Jordan: A cross-sectional study. *PLOS ONE, 20*(10), Article e0334603. https://doi.org/10.1371/journal.pone.0334603

Ahmad, I., Younus, S., Khalid, M. A., Hayee, R., & Mayo, M. B. (2026). The impact of job demands on service delivery through the mediating role of emotional exhaustion among public healthcare workers in South Punjab. *Discover Public Health, 23*, Article 330. https://doi.org/10.1186/s12982-026-01728-1

Alruwaili, A. N. (2025). Transformational nurse leaders and nurse well-being: Examining mediating influences of organizational justice and quality of work life mixed methods study. *Journal of Nursing Management, 2025*(1), Article 4577350. https://doi.org/10.1155/jonm/4577350

Ama, Z. H., Soebagiyo, D., & Andriyani, N. (2024). The role of Human Resources Development (HRD) in increasing the competitive advantage of Brownies Cinta Employees (PT Berkah Ridho Cinta Indonesia). *Income Journal of Economics Development, 4*(1), 1–14. https://doi.org/10.54065/ijed.4.1.2024.204

Badaruddin, B., Surianto, S., & Fatmasari, F. (2024). Work-life balance and professional development: Their impact on employee performance. *Paradoks: Jurnal Ilmu Ekonomi, 7*(4), 409–424. https://doi.org/10.57178/paradoks.v7i4.986

Greenhaus, J. H., & Allen, T. D. (2011). Work-family balance: A review and extension of the literature. In J. C. Quick & L. E. Tetrick (Eds.), *Handbook of occupational health psychology* (2nd ed., pp. 165–184). American Psychological Association. https://doi.org/10.2307/j.ctv1chs29w.14

Hafid, M., Pasigai, M. H., & Soraya, Z. (2024). The influence of service quality on patient satisfaction at Community Health Centers Salomekko, Bone Regency. *Income Journal of Economics Development, 4*(2), 64–76. https://doi.org/10.54065/ijed.4.2.2024.278

Heider, F. (1958). *The psychology of interpersonal relations*. John Wiley & Sons.

Husen, M. R., Daud, A., & Firman, A. (2024). Pengaruh employee engagement dan work-life balance terhadap kinerja karyawan dengan kepuasan kerja sebagai variabel intervening pada unit Building Management PT Telkom Property Regional VII Makassar. *Ezenza Journal, 3*(1), 109–122. https://www.researchgate.net/publication/385916610

Jumaini, Asriati, & Sulaiman, S. (2024). The influence of work discipline and professionalism on the quality of public services at the Makassar City Employment Service. *Income Journal of Economics Development, 4*(2), 90–97. https://doi.org/10.54065/ijed.4.2.2024.281

Mangkunegara, A. A. A. P. (2017). *Manajemen sumber daya manusia perusahaan* (Cet. 14). Remaja Rosdakarya.

Mitra, L. G., Sharma, J., & Walia, H. S. (2024). Improving work–life balance and satisfaction to improve patient care. *Indian Journal of Critical Care Medicine, 28*(4), 326–328. https://doi.org/10.5005/jp-journals-10071-24689

Monata, D., & Yulihasri, Y. (2024). The role of job satisfaction in mediating the impact of work-life balance and employee engagement on organizational commitment. *Dinasti International Journal of Management Science, 6*(1), 44–57. https://doi.org/10.38035/dijms.v6i1.3106

Putro, M. B. S., & Wajdi, F. (2024). Pengaruh work-life balance dan etos kerja terhadap kinerja karyawan dengan kepuasan kerja sebagai variabel intervening. *Management Studies and Entrepreneurship Journal, 5*(1), 2651–2659. http://journal.yrpipku.com/index.php/msej

Rabuana, N. K. D. N., & Yanuar, Y. (2023). The influence of work environment and work engagement on employee performance mediated by employee well-being. *Munaddhomah: Jurnal Manajemen Pendidikan Islam, 4*(3), 541–557. https://doi.org/10.31538/munaddhomah.v4i3.523

Razai, M. S., Kooner, P., & Majeed, A. (2023). Strategies and interventions to improve healthcare professionals' well-being and reduce burnout. *Journal of Primary Care & Community Health, 14*, 1–11. https://doi.org/10.1177/21501319231178641

Robbins, S. P., & Judge, T. A. (2019). *Organizational behavior* (18th ed.). Pearson Education.

Sakarina, S., Noviantoro, D., & Kesuma, M. J. (2024). Pengaruh kepemimpinan dan lingkungan kerja terhadap kinerja pegawai ASN BPKAD Provinsi Sumatera Selatan dengan motivasi kerja sebagai variabel mediasi. *Forbiswira: Forum Bisnis dan Kewirausahaan, 13*(2), 539–547. https://doi.org/10.35957/forbiswira.v13i2.7734

Sedarmayanti. (2018). *Tata kerja dan produktivitas kerja: Suatu tinjauan dari aspek ergonomi atau kaitan antara manusia dengan lingkungan kerjanya* (Cet. 4). CV Mandar Maju.

Setyoningtias, W., & Wardoyo, D. T. W. (2026). Pengaruh work-life balance terhadap job stress dan job performance melalui employee engagement pada karyawan RS XYZ. *Jurnal Ilmu Manajemen, 14*(2), 310–327. https://doi.org/10.26740/jim.v14n2.p310-327

Suprianti, E., Nurmaya, E., & Hidayat, A. C. (2025). Pengaruh kepemimpinan, motivasi kerja dan lingkungan kerja terhadap kinerja guru: Studi kasus di SMK Negeri 2 Depok Sleman Yogyakarta. *Innovative: Journal of Social Science Research, 5*(1), 5978–5990. https://doi.org/10.31004/innovative.v5i1.17661

Surianto, S., & Nurfahira, N. (2025). The role of work environment and leadership in enhancing employee performance. *Economics and Digital Business Review, 5*(2), 1054–1070. https://doi.org/10.37531/ecotal.v5i2.1606

Umar, A., Adawiah, A., Barkatullah, A. H., Ifrani, I., Mahyuni, M., Amrin, M. A., & Farisi, N. A. (2022). Government policies and regulations, leadership style and employee performance in increasing productivity of Indonesia's small and medium enterprises. *Society, 10*(1), 182–206. https://doi.org/10.33019/society.v10i1.471

Wardana, I. G. N. A. W., Sarmawa, I. W. G., & Amerta, I. M. S. (2025). The influence of work environment and organizational communication on employee performance through job satisfaction as a mediation in savings and loan cooperatives in Tanah Lot Tabanan Bali. *International Journal of Environmental, Sustainability, and Social Science, 6*(1). https://doi.org/10.38142/ijesss.v6i1.1323

Wati, D. P., Wahyuni, N., Fatayan, A., & Bachrudin, A. A. (2022). Analisis kepemimpinan kepala sekolah di sekolah dasar. *Jurnal Basicedu, 6*(5), 7970–7977. https://doi.org/10.31004/basicedu.v6i5.3684

Wildiawanti, Z. N. M. (2024). Analisis pengaruh work life balance terhadap kepuasan kerja pada karyawan Kopi Kenangan. *Jurilma: Jurnal Ilmu Manajemen Indonesia, 1*(1), 42–48. https://doi.org/10.69533/tgeggy93