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THE INFLUENCE OF DEMOCRATIC LEADERSHIP STYLE, WORK MOTIVATION AND PHYSICAL WORK ENVIRONMENT ON TEACHER PERFORMANCE AT SMK TRITECH INFORMATIKA MEDAN

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Abstract

Teacher performance stands as a primary indicator for assessing the success of an educational institution. Optimal teacher performance directly impacts the quality of the learning process and the learning outcomes of studentsThis study aims to analyze the influence of leadership style, work motivation, and work environment on teacher performance at SMK Tritech Informatika Medan, both partially and simultaneously. A quantitative approach with an associative method was employed. The study population consisted of all teachers at SMK Tritech Informatika Medan (58 respondents), utilizing a saturated sampling technique (census). Data were collected via a Likert-scale questionnaire that had undergone validity and reliability testing. Data analysis techniques included classical assumption tests, multiple linear regression analysis, t-tests (partial), F-tests (simultaneous), and the coefficient of determination, using SPSS software. Test results is Democratic leadership style has a positive and significant effect on teacher performance at SMK Tritech Informatika Medan. Work motivation has a positive and significant effect on teacher performance. The physical work environment has a positive and significant effect on teacher performance. Simultaneously, democratic leadership style, work motivation, and the physical work environment have a positive and significant effect on teacher performance.

Keywords: Democratic Leadership Style, Work Motivation, Work Environment, Teacher Performance

INTRODUCTION

Education is a fundamental process in developing the quality of human resources. Teachers, as educators, play a strategic role and serve as the spearhead in achieving national educational goals. Consequently, teacher performance stands as a primary indicator for assessing the success of an educational institution. Optimal teacher performance directly impacts the quality of the learning process and the learning outcomes of students. Rizki & Indrawati (2023) explain that educational management functions to integrate various educational instruments—including teaching staff and school facilities—to reach the targets established by an educational institution. Meeting competency standards for educators and education personnel serves as a cornerstone in the implementation of education. Law Number 14 of 2005 concerning Teachers and Lecturers, Article 1, Paragraph 1, defines a teacher as a professional educator with the primary responsibility of educating, teaching, guiding, directing, training, assessing, and evaluating students within formal, primary, and secondary education levels.

According Nengsih et al. (2023) define performance as an individual's total capacity to achieve goals maximally and meet work targets, characterized by a high ratio of output relative to the resources (efficiency) employed. Meanwhile, Pebryanti et al. (2023) suggest that performance reflects the degree of success of an organizational program or policy in realizing the goals, objectives, vision, and mission outlined in its strategic planning. The outcomes of individual and group efforts reflect the overall performance of employees. Such performance serves as a key determinant of organizational success, necessitating consistent efforts by management to enhance it. Optimal teacher performance reflects a harmonious integration of pedagogical, professional, social, and personal competencies, rather than merely the fulfillment of administrative obligations. The capacity of educational institutions to facilitate the continuous maintenance of high-level performance among teachers is a primary factor in improving the quality of national education.

Based on the pre-survey data, the performance of teachers at SMK Tritech Informatika Medan is generally positive. This is evidenced by the majority of respondents indicating that teachers have met the competency standards required to carry out their primary duties. An analysis by competency dimension reveals that the primary strengths of the teachers lie in their personal and professional attributes. Regarding personal competency, teachers demonstrate a high level of awareness in setting an example; most respondents noted that teachers consistently exhibit discipline, honesty, and authority, serving as positive role models for students. Furthermore, the teachers demonstrate good emotional maturity, remaining composed even when managing challenging student behavior in the classroom. This positive trend is reinforced by the teachers' professional competency, which yielded highly satisfactory results. Most teachers possess a deep mastery of their subject matter and consistently stay updated on the latest developments in their respective fields.

There is also a strong drive for self-improvement, as many teachers actively seek to enhance their teaching competencies by participating in training programs and engaging with educational literature. In terms of pedagogical competency, most teachers report being effective at classroom management and employing teaching methods that encourage students to ask questions. However, regarding the preparation of creative lesson plans (RPP) tailored to students' initial proficiency levels, some teachers have yet to implement this consistently. Meanwhile, in the dimension of social competency, most teachers maintain harmonious working relationships with their colleagues. Nevertheless, the level of attention given to students who appear to be struggling academically requires improvement, as only a portion of the teachers provide such support on a regular basis. Thus, although the personality and professional aspects are already in a good category, the school still needs to enhance teachers' pedagogical competence in developing creative instructional materials, as well as strengthen their social sensitivity toward students, so that the overall quality of teaching can be further optimized.

According to Tamimi and Sopiah (2022), leadership within an organization entails developing staff and fostering a moral climate that yields high levels of performance; therefore, leaders must carefully consider the most appropriate leadership style. A democratic leadership style is one in which the leader treats the human aspect as a fundamental element of organizational dynamics. Such a leader consistently positions themselves as an active, dynamic, and purposeful participant, making decisions through a process of deliberation (Suradji, as cited in Kurniati, 2023). The implementation of a democratic leadership style has, overall, been successful and is tangibly felt by the teachers and staff. Respondents provided positive feedback across all the indicators presented. A key strength of the leadership style at this school lies in the areas of fostering collaboration and valuing individual potential. This is evidenced by the vast majority of teachers, who noted that the leadership is actively involved on the ground whenever school activities take place.

Regarding collective policy-making, most teachers indicated that significant decisions are reached through consultation and voting. The working relationship between the leadership and staff is described as harmonious, mutually supportive, and free from rigid hierarchical barriers. In terms of active participation and receptiveness to input, the leadership provides ample space for teachers to engage in the planning and execution of school programs. The leadership is also open to receiving criticism, suggestions, and creative ideas from teachers—a particularly important trait given that SMK Tritech Informatika Medan is an information technology-focused school that requires constant innovation. Nevertheless, a small number of teachers feel that the frequency of listening to daily feedback could be further increased to ensure even more optimal communication. The next factor is work motivation. Gustiawati et al. (2022) define work motivation as a stimulus that sparks enthusiasm and drives an individual to engage in activities, regardless of whether the level of effort exerted is high or low. Similarly, Lubis (2024) views motivation as a form of organizational activity aimed at enhancing the skills of employees. Meanwhile, Soerjarminto and Hidayat (2023) emphasize that motivation encompasses the driving factors that direct an individual's behavior toward committing to their tasks.

The primary strength of this motivation lies in the aspect of self-actualization. This is evident from the fact that most teachers take pride in being part of the teaching staff at SMK Tritech Informatika Medan, and they see their current roles as valuable opportunities to develop their careers and personal potential. A positive trend is also observed in the areas of recognition and security. Most teachers report feeling valued by their colleagues and leadership for their dedication to teaching; the school provides recognition—such as through praise or certificates—when teachers achieve specific targets. Regarding security, the majority of teachers feel at ease in their work environment, noting that the school ensures a safe setting. Furthermore, the foundation is perceived as being attentive to the safety and future well-being of the teaching staff. This motivation is further reinforced by social factors; there is excellent collaboration among teachers, and the warm social interactions contribute to a comfortable working environment. Meanwhile, there are some nuances concerning physical needs.

While most teachers confirm that their salaries and incentives are paid on time and in accordance with their agreements, only a portion of the staff feels motivated to work harder based on their current compensation levels—suggesting that compensation remains an area requiring attention. Overall, the data indicates that teacher motivation at this institution is strong, supported by professional pride, a harmonious work environment, and a high level of mutual respect. Consequently, while the aspects of self-actualization, recognition, and social dynamics are already well-established, the school should focus on better addressing physical needs—specifically regarding salary and incentive levels—while continuing to maintain a conducive work climate to further optimize teacher motivation. The third factor influencing performance is the work environment. According to Latif et al. (2022), the work environment is the setting in which employees carry out their daily tasks.

A conducive work environment fosters a sense of security and encourages employees to perform at their best. Furthermore, the work environment is closely tied to an employee's emotional state; for instance, if an employee enjoys their work environment, they are more likely to feel comfortable and engaged in their activities, ensuring that work time is utilized effectively and resulting in high levels of employee productivity. The physical work environment is the setting in which employees carry out their professional activities or tasks related to their work. According to Sedarmayanti (as cited in Elza Oktariani, 2023), the physical work environment encompasses all physical conditions present around the workplace that influence work effectiveness, either directly or indirectly. The physical work environment encompasses the primary facilities used in daily operations, such as classrooms—the hubs for teaching and learning activities—and staff rooms, which serve as support spaces for educators at each educational level.

The physical work environment at SMK Tritech Informatika Medan is quite adequate. The staff room appears tidy; however, the arrangement of desks and chairs is suboptimal, resulting in limited space for movement and less-than-ideal air circulation. Classrooms are equipped with learning facilities—including desks, chairs, whiteboards, and projectors—all of which are clean and well-organized. The laboratory is furnished with computers, internet access, and projectors; while all equipment remains fully functional, the number of computers is insufficient for the total number of students, necessitating a rotation system during practical sessions. Meanwhile, the school environment is generally clean and benefits from ample natural light through ventilation and large windows, although certain areas can become quite hot during periods of intense, sunny weather. This is evidenced by the fact that most respondents feel secure storing their teaching materials and personal vehicles, thanks to an effective security system at the school. Furthermore, common facilities—such as restrooms, the canteen, and the school grounds—are consistently maintained in a clean and sanitary condition.

The environment also benefits from low noise levels; most respondents noted that classrooms are quiet and free from external disturbances, which directly helps them maintain focus while teaching. This level of quiet also facilitates smooth communication between teachers and students during lessons. The positive work environment is further enhanced by the quality of lighting, air circulation, and the school's overall aesthetics. Most respondents responded favorably to the placement of windows and lighting in the staff room, ensuring that no corners remain dark while they work. The freshness of the air circulation within the classrooms also received positive feedback from the majority of teachers. Additionally, the school's decor and wall colors create an impression of tidiness and beauty, which helps boost morale.

Based on the background provided above, the identified issues at SMK Tritech Informatika Medan can be summarized as follows:

1. Teacher performance at SMK Tritech Informatika Medan is not yet optimal across several indicators. While personality and professional aspects are excellent, there are challenges regarding pedagogical and social indicators—specifically in the development of creative lesson plans (RPP), time management (hindered by administrative burdens), and the provision of personalized guidance for students who are slow learners.
2. The democratic leadership style at SMK Tritech Informatika Medan is not yet fully maximized in terms of personal communication between leadership and teaching staff. Although the principles of consultation and openness are well-implemented, there is a need to increase the frequency of daily personal interactions and the incorporation of ongoing feedback from teachers.
3. Work motivation at SMK Tritech Informatika Medan is constrained by the level of compensation. While intrinsic motivation and a sense of being valued within the school environment are high, the current compensation (salary/incentives) is not yet fully optimal for maximizing the teachers' work enthusiasm.
4. The physical work environment at SMK Tritech Informatika Medan is, in certain respects, not sufficiently conducive. Despite good standards of cleanliness, security, and tranquility, there are weaknesses regarding

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climate control (the environment becomes hot or stuffy during peak heat), uneven classroom lighting, and the layout of desks and chairs in the teachers' lounge.

LITERATURE REVIEW

Teacher Performance

The quality of teacher performance is closely linked to a teacher's level of competence, as superior competence serves as the foundation for achieving optimal performance. Madjid, as cited in Siemze Joen (2022), asserts that it is impossible for a teacher to deliver high-quality work performance without possessing adequate competence. Article 39, Paragraph (2) of Law of the Republic of Indonesia Number 20 of 2003 concerning the National Education System states that educators are professionals whose core responsibilities include planning and implementing instructional processes, evaluating learning outcomes, providing guidance and training, as well as conducting research and community service—the latter being particularly applicable to lecturers in higher education.

Democratic Leadership Style

A democratic leadership style is an approach to leadership that places people as the primary element within an organization. Leaders who adopt this style hold deep respect for the value and dignity of every individual they lead. Furthermore, according to Pane (2024), democratic leaders involve their subordinates, encouraging them to play an active and creative role in achieving organizational goals, while simultaneously maintaining positive and harmonious relationships with them.

Work Motivation

According to Hidayat et al. (2023), motivation is defined as the factors that direct and drive an individual's behavior or desire to engage in an activity, manifested in the form of varying degrees of effort—ranging from intense to weak. Work motivation is something that sparks a drive for work enthusiasm. As such, motivation acts as a catalyst that directs efforts toward a goal—and it rarely arises in vain. Every organization naturally aspires to achieve its objectives (Hasibuan, 2022).

Work Environment

The work environment encompasses everything surrounding employees that can influence how they carry out their work (Nabawi, 2023). Meanwhile, according to Darhan and Rahayu (2022), a good work environment can enhance employee productivity, health, and well-being, whereas a poor work environment can diminish performance and lead to various health issues.

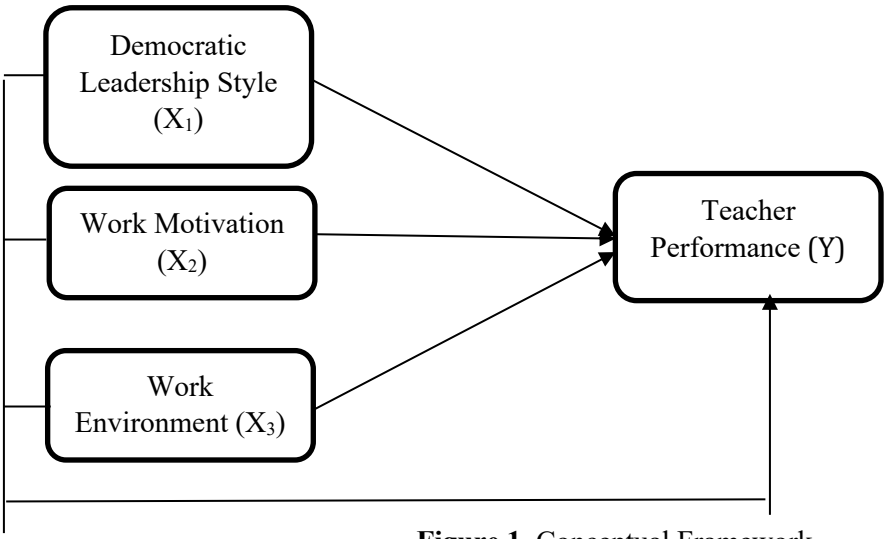


Figure 1. Conceptual Framework
Source: Researcher (2026)

The research hypotheses are:

1. H1: There is a positive and significant influence of democratic leadership style on teacher performance at SMK Tritech Informatika Medan.

2. H2: There is a positive and significant influence of work motivation on teacher performance at SMK Tritech Informatika Medan.
3. H3: There is a positive and significant influence of the physical work environment on teacher performance at SMK Tritech Informatika Medan.
4. H4: There is a positive and significant simultaneous influence of democratic leadership style, work motivation, and the physical work environment on teacher performance at SMK Tritech Informatika Medan.

METHOD

The research approach used an associative approach, with a quantitative method. The research was conducted at SMK Tritech Informatika Medan, located at Jl. Bhayangkara No. 484, Indra Kasih, Medan Tembung District. The study took place from March 2026 to August 2026. The population for this research consists of 58 teachers at SMK Tritech Informatika Medan. A non-probability sampling technique—specifically, saturated sampling—was employed. According to Sugiyono (2022:85), saturated sampling is a sampling method in which all members of the population are included as the sample; this approach is often used when the population size is relatively small. Therefore, the sample for this study comprises the entire population—all 58 teachers at SMK Tritech Informatika Medan. Data analysis was performed using SPSS version 25.

RESULTS AND DISCUSSION

Results

Validity and Reliability Test

Table 1. Validity Test Results Democratic Leadership Style, Work Motivation, Work Environment, Teacher Performance

Statement Items	r-count	r-table	Description
DLS1	0.745	0.361	Valid
DLS2	0.668	0.361	Valid
DLS3	0.767	0.361	Valid
DLS4	0.446	0.361	Valid
DLS5	0.763	0.361	Valid
DLS6	0.509	0.361	Valid
DLS7	0.669	0.361	Valid
DLS8	0.425	0.361	Valid
DLS9	0.409	0.361	Valid
DLS10	0.589	0.361	Valid
WM1	0.729	0.361	Valid
WM2	0.715	0.361	Valid
WM3	0.701	0.361	Valid
WM4	0.608	0.361	Valid
WM5	0.800	0.361	Valid
WM6	0.680	0.361	Valid
WM7	0.594	0.361	Valid
WM8	0.699	0.361	Valid
WM9	0.704	0.361	Valid
WM10	0.844	0.361	Valid
WE1	0.635	0.361	Valid
WE2	0.620	0.361	Valid
WE3	0.750	0.361	Valid
WE4	0.705	0.361	Valid
WE5	0.657	0.361	Valid
WE6	0.624	0.361	Valid
WE7	0.679	0.361	Valid
WE8	0.794	0.361	Valid
WE9	0.736	0.361	Valid

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Statement Items	r-count	r-table	Description
WE10	0.675	0.361	Valid
TP1	0.788	0.361	Valid
TP2	0.704	0.361	Valid
TP3	0.699	0.361	Valid
TP4	0.743	0.361	Valid
TP5	0.708	0.361	Valid
TP6	0.778	0.361	Valid
TP7	0.748	0.361	Valid
TP8	0.727	0.361	Valid

Sources: SPSS versi 25 (2026)

Based on Table 1, the results of the validity test above show that all statement items are > r table 0.361, so they are hereby declared valid/legitimate.

Table 2. Reliability Test Results Democratic Leadership Style, Work Motivation, Work Environment, Teacher Performance

Variabel	Cronbach Alpha	Provision	Description
Democratic Leadership Style	0,788	0,60	Reliable
Work Motivation	0,890	0,60	Reliable
Work Environment	0,876	0,60	Reliable
Teacher Performance	0,879	0,60	Reliable

Sources: SPSS versi 25 (2026)

It is known that the Cronbach's alpha value for all research variables of democratic leadership style, work motivation, work environment and teacher performance is > 0.60, so it can be said that the results of the reliability test for all variables are reliable.

Table 3. Results of the One Sample Kolmogorov Normality Test

Description	Value
N	58
Mean	0.0000000
Std. Deviation	3.32669883
Absolute	0.064
Positive	0.051
Negative	-0.064
Test Statistic	0.064
Asymp. Sig. (2-tailed)	0.200

Sources: SPSS versi 25 (2026)

It is known that the asymp. sig. (2-tailed) value is 0.200 > 0.05 significance value so it can be concluded that the data tested is normally distributed.

Table 4. Gletsjer Test Results

Variable	B	Std. Error	Beta	t	Sig.
(Constant)	8.502	2.864		2.969	.004
Democratic Leadership Style	-.006	.070	-.015	-.087	.931
Work Motivation	-.071	.071	-.171	-.992	.325
Work Environment	-.069	.053	-.176	-1.314	.194

Sources: SPSS versi 25 (2026)

Based on the Glejser test output table above, it can be seen that the significance value for the Democratic Leadership Style variable (X1) is 0.931 > 0.05, which indicates the absence of heteroscedasticity. For the Work Motivation variable (X2), the significance value is 0.325 > 0.05, which also indicates the absence of

heteroscedasticity. Meanwhile, for the Physical Work Environment variable (X3), the significance value is 0.194 > 0.05, which likewise indicates the absence of heteroscedasticity. Therefore, since all variables have significance values greater than 0.05, it can be concluded that there is no heteroscedasticity present in the regression model of this study.

Table 5. Multicollinearity Test Results

Variable	B	Std. Error	Beta	t	Sig.	**Tolerance**	**VIF**
(Constant)	2.248	5.232		.430	.669		
Democratic Leadership Style	.281	.128	.305	2.189	.033	.572	1.748
Work Motivation	.265	.131	.283	2.028	.047	.574	1.743
Work Environment	.220	.097	.245	2.275	.027	.960	1.042

Sources: SPSS versi 25 (2026)

It is known that the results of the multicollinearity test for the democratic leadership style, work motivation, work environment variables have a tolerance value of > 0.10 and VIF < 10, so this study is declared free from multicollinearity problems.

Table 6. Multiple Linear Tegression Test Results

Variable	**B**	Std. Error	Beta	t	Sig.	Tolerance	VIF
(Constant)	2.248	5.232		.430	.669		
Democratic Leadership Style	.281	.128	.305	2.189	.033	.572	1.748
Work Motivation	.265	.131	.283	2.028	.047	.574	1.743
Work Environment	.220	.097	.245	2.275	.027	.960	1.042

Sources: SPSS versi 25 (2026)

Based on the data processing results, as shown in the "Unstandardized Coefficients" column (under section B), the multiple linear regression equation is obtained as follows:

$$\mathbf{Y = 2.248 + 0.281X1 + 0.265X2 + 0.220X3 + e}$$

This equation can be interpreted as follows:

1. The constant is 2.248, with a standard error of 5.232. This means that if the values for the variables—democratic leadership style, work motivation, and physical work environment—are assumed to be zero (or exert no influence), the teacher's performance is predicted to be 2.248. This value represents a baseline level of performance achievable in the absence of any influence from these three independent variables.
2. Democratic Leadership Style (X1) has a regression coefficient of 0.281, with a standard error of 0.128. This indicates that for every one-unit increase in the democratic leadership style variable, teacher performance is expected to increase by 0.281, assuming all other variables remain constant. The positive coefficient value suggests a direct (positive) relationship between democratic leadership style and teacher performance.
3. Work Motivation (X2) has a regression coefficient of 0.265, with a standard error of 0.131. This means that every one-unit increase in work motivation will lead to a 0.265 increase in teacher performance, assuming other variables remain constant. This positive and significant coefficient indicates that work motivation contributes to the improvement of teacher performance.
4. Physical Work Environment (X3) has a regression coefficient of 0.220, with a standard error of 0.097. This means that every one-unit improvement in the physical work environment will result in a 0.220 increase in teacher performance, assuming other variables remain constant. The standard error for this variable is relatively small compared to the other two variables, indicating that the estimate of the effect of the physical work environment on teacher performance is quite precise.

Table 7. Partial Test Results (t-Test)

Variable	B	Std. Error	Beta	**t**	**Sig.**	Tolerance	VIF
(Constant)	2.248	5.232		.430	.669		
Democratic Leadership Style	.281	.128	.305	2.189	.033	.572	1.748
Work Motivation	.265	.131	.283	2.028	.047	.574	1.743
Work Environment	.220	.097	.245	2.275	.027	.960	1.042

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Sources: SPSS versi 25 (2026)

Based on the table above, the results of the partial test (t-test) can be explained as follows:

1. The Influence of Democratic Leadership Style on Teacher Performance. The calculated t-value (t-count) is 2.189, which is greater than the t-table value of 2.005, and the significance value is 0.033, which is less than 0.05; therefore, H_0 is rejected and H_a is accepted. This indicates that a democratic leadership style has a positive and significant influence on teacher performance at SMK Tritech Informatika Medan. Thus, H1 in this study is accepted.
2. The Influence of Work Motivation on Teacher Performance. The calculated t-value (t-count) is 2.028, which is greater than the t-table value of 2.005, and the significance value is 0.047, which is less than 0.05; therefore, H_0 is rejected and H_a is accepted. This indicates that work motivation has a positive and significant influence on teacher performance. The higher the motivation a teacher possesses, the higher the performance demonstrated in carrying out daily teaching duties. Thus, H2 in this study is accepted.
3. The Influence of the Physical Work Environment on Teacher Performance. The calculated t-value (t-count) is 2.275, which is greater than the t-table value of 2.005, and the significance value is 0.027, which is less than 0.05; therefore, H_0 is rejected and H_a is accepted. This indicates that the physical work environment has a positive and significant influence on teacher performance. The better the conditions of the physical work environment at the school, the more optimal the performance produced by the teachers. Thus, H3 in this study is accepted.

Table 8. Simultaneous Test Results (F Test)

Model	Sum of Squares	df	Mean Square	**F**	**Sig.**
Regression	417.203	3	139.068	11.905	.000[b]
Residual	630.815	54	11.682		
Total	1048.017	57			

Sources: SPSS versi 25 (2026)

Based on the above, an F-statistic value of 11.905 was obtained, with a significance level of 0.000. This indicates that the F-statistic is greater than the F-table value (11.905 > 2.78) and the significance level is less than 0.05 (0.000 < 0.05). Consequently, it can be concluded that H_0 is rejected and H_a is accepted; thus, democratic leadership style (X1), work motivation (X2), and the physical work environment (X3) simultaneously have a positive and significant effect on teacher performance (Y) at SMK Tritech Informatika Medan. Therefore, H4 in this study is accepted.

Table 9. Results of the Coefficient of Determination test

Model	R	R Square	**Adjusted R Square**	Std. Error of the Estimate
1	.631[a]	.398	.365	3.418

Sources: SPSS versi 25 (2026)

Based on the results of the coefficient of determination test shown in Table 9, the Adjusted R-squared value is 0.365. This value can be referred to as the coefficient of determination, meaning that 0.365 (36.5%) of the variation in teacher performance can be explained collectively by the variables of democratic leadership style, work motivation, and physical work environment, while the remaining 63.5% is explained by other variables outside the model that were not examined in this study.

Discussion

The Influence of Democratic Leadership Style on Teacher Performance

Based on the partial test (t-test) results, the democratic leadership style yielded a t-statistic of 2.189 with a significance value of 0.033. Since the significance value is less than 0.05 (0.033 < 0.05), it can be concluded that a democratic leadership style has a positive and significant impact on teacher performance at SMK Tritech Informatika Medan. This implies that the more a principal applies principles of openness, consultation, and the professional delegation of responsibilities, the higher the performance demonstrated by teachers in carrying out their instructional duties. Teachers who are involved in decision-making processes tend to feel valued as strategic partners, fostering a sense of moral responsibility that encourages them to innovate in their teaching methods. These results align with research conducted by Sisilia Vivin Panggau and Ocky Sundari (2024), which found that a democratic leadership style and work motivation have a positive and significant effect on employee performance, both partially and

simultaneously. The findings are also consistent with those of Rafi Alif Aulya, Jhonni Sinaga, and Supriyanto (2025), who indicated that leadership style significantly influences teacher performance. However, these results differ from the study by Muhamad Saeful Hidayat and R.M. Juddy Prabowo (2024), which found that a principal's democratic leadership style did not have a significant effect on the performance of civil servant (ASN) teachers. This discrepancy is likely due to differences in the characteristics of the research subjects; in the present study, the participating teachers work in a private educational institution, which tends to be more responsive to a participatory leadership style from its administrators.

The Influence of Work Motivation on Teacher Performance

The t-test results indicate that the work motivation variable has a calculated t-value of 2.028, with a significance level of 0.047. Since the significance value is less than 0.05 (0.047 < 0.05), it can be concluded that work motivation has a positive and significant effect on teacher performance. These findings confirm that motivation is a driving factor in determining teacher performance. The stronger the internal and external drives—such as a commitment to achieving educational goals, a desire for achievement, and support from leadership—the greater the likelihood that a teacher will demonstrate optimal performance in the teaching and learning process. These results are consistent with research conducted by Muhamad Saeful Hidayat and R.M. Juddy Prabowo (2024), which states that work motivation has a positive and significant impact on teacher performance. They also align with the study by Sari and Martha (2022), which found that work motivation, in conjunction with leadership style, significantly influences teacher performance in schools. Furthermore, these findings are supported by research from Febriani et al. (2024), which demonstrates that work motivation, when considered alongside work discipline, has a significant simultaneous effect on employee performance; higher levels of motivation lead to improved performance.

The Influence of Physical Work Environment Style on Teacher Performance

Based on the partial test (t-test) results, the physical work environment yielded a t-statistic of 2.275 with a significance value of 0.027. Since the significance value is less than 0.05 (0.027 < 0.05), it can be concluded that the physical work environment has a positive and significant impact on teacher performance at SMK Tritech Informatika Medan. In other words, the more comfortable and adequate the physical facilities available at the school—such as classrooms, technological resources, lighting, and environmental cleanliness—the more optimal the teachers' performance in imparting knowledge to their students becomes. These findings align with research conducted by Fadilah Rahmat and Bambang Sutarto (2025), which found that the physical work environment significantly influences employee performance. They are also consistent with research by Jariah Erniatin (2023), which indicates that the work environment contributes even more to teacher performance than leadership style does. However, these results differ from the study by Rafi Alif Aulya, Jhonni Sinaga, and Supriyanto (2025), which found that the physical work environment does not have a significant partial effect on teacher performance. This discrepancy may stem from differences in the physical conditions of the schools studied; in the present case, the teachers perceive the available facilities and infrastructure as factors that significantly influence their comfort while teaching.

The Influence of Democratic Leadership Style, Work Motivation and Physical Work Environment on Teacher Performance

The simultaneous test (F-test) results indicate an F-calculated value of 11.905 with a significance level of 0.000. Since the significance value is less than 0.05, it can be concluded that democratic leadership style, work motivation, and the physical work environment—when considered together (simultaneously)—have a significant impact on teacher performance. These factors account for 36.5% of the variance (Adjusted R-square), with the remainder influenced by variables outside the scope of this study. This suggests that teacher performance is not determined by a single factor in isolation, but rather emerges from the interplay of various leadership, psychological, and environmental elements. In other words, a democratic leadership style exerts a more optimal influence on teacher performance when accompanied by high work motivation and supported by an adequate physical work environment. The combination of a participatory leadership approach, a drive for achievement, and comfortable school facilities fosters a teaching staff that is enthusiastic, responsible, and productive in carrying out their instructional duties. These results align with research conducted by Rafi Alif Aulya, Jhonni Sinaga, and Supriyanto (2025), which demonstrates that leadership style, work motivation, and the work environment have a significant simultaneous effect on teacher performance. This finding is further reinforced by a study from Eva Suprianti, Ema Nurmaya, and Abdul Choliq Hidayat (2025), which found that leadership, work motivation, and the work environment have a positive and significant simultaneous impact on teacher performance—contributing as much as 89.2%. The consistency across

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these findings underscores that these three aspects are critical factors that school management must address collectively to enhance the overall effectiveness and productivity of teacher performance.

CONCLUSION

Research on the influence of price perception, word of mouth, and customer experience on consumer satisfaction can yield the following conclusions:

1. Democratic leadership style has a positive and significant effect on teacher performance at SMK Tritech Informatika Medan.
2. Work motivation has a positive and significant effect on teacher performance.
3. The physical work environment has a positive and significant effect on teacher performance.
4. Simultaneously, democratic leadership style, work motivation, and the physical work environment have a positive and significant effect on teacher performance.

Based on the discussion and conclusions of this study, the following recommendations are provided:

1. Optimizing the Application of a Democratic Leadership Style: The school principal is advised to increase the frequency of personal communication and the gathering of informal feedback. This step is essential to ensure that all teachers' aspirations are well-accommodated within the school's daily routine, leaving no input overlooked.
2. Strengthening Teacher Work Motivation: Given that work motivation is a critical factor, the foundation and school management should review salary schemes, incentives, or performance-based bonuses. Meeting physical needs and providing fair recognition will foster greater work drive and professional commitment among the teachers.
3. Improving and Maintaining the Physical Work Environment: The school is advised to carry out facility improvements in stages. This includes installing air conditioning or fans in classrooms to address heat during hot weather, ensuring even lighting distribution—particularly in the center of classrooms—and reorganizing the layout of desks and chairs in the teachers' lounge to improve air circulation and provide more flexible, comfortable space for movement.
4. Restructuring Teachers' Administrative Workload: School management needs to restructure administrative reporting requirements so that teachers have sufficient time to develop creative lesson plans and provide targeted support to students who experience learning difficulties (slow learners).
5. Future researchers are encouraged to expand the scope of the study by incorporating other variables relevant to teacher performance, such as work discipline, overall workload, or technical competency training focused on information technology. Furthermore, researchers might consider employing Path Analysis or Structural Equation Modeling (SEM) to examine mediating relationships within a broader population.

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