

The Influence of Transformasional Leadership Style, Organizational Climate and Work Environment on Productivity through Work Motivation at PT. Sumatra Tobacco Trading Company

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ABSTRACT

This study aims to analyze the influence of transformational leadership, organizational climate, and work environment on work productivity, with work motivation as a mediating variable. Using a quantitative approach, data were collected through questionnaires and documentation from 100 production employees selected using saturated sampling. Data analysis was conducted using Structural Equation Modeling (SEM) with Partial Least Square (PLS). The results show that the work environment has the strongest direct positive and significant effect on work productivity. Additionally, work motivation significantly mediates the effects of transformational leadership, organizational climate, and work environment on productivity. Among the mediating paths, organizational climate has the most substantial indirect effect on productivity through work motivation. These findings highlight the importance of a supportive organizational climate and motivated workforce in enhancing productivity.

INTRODUCTION

The work productivity of an organization is influenced by the management of an organization, both formal and non-formal organizations (Dharmawan, Satria, & Qotrhunada, 2022). Organizations cannot be separated from the human factor as the driving force of the organization itself so that human resource managements become very important like the real body of human resource management is the heart of the organization as the main actor in the organization's operational activities (Asman & Rony, 2023).

PT Sumatera Tobacco Trading Company or often referred to as (STTC) is a cigarette company located in Pematangsiantar City. PT Sumatera Tobacco Trading Company makes a very large contribution to the Pematangsiantar City government in general, in the form of cigarette taxes and excise and also to the Pematangsiantar community in particular, an effort to increas employees works productivities, does not necessary to rely on the qualitys of the product produced, but company must also pay attention to factors that influence work productivity such as organizational climate, work environment and motivation. Based on the result of a pre-survey regarding factors that influence work productivity, 54% of employees were able to achieve company targets and increase their motivation to work to increase work productivity. There are 30% of leaders who encourage employees to be able to use their abilities in working. 34% of employees feel that leaders provide support that builds their enthusiasm in working. And 43% of employees feel that a good and conducive working atmosphere can provide comfort in working. The purpose of this study is to analyze the influence of leadership style, organizational climate and work environment on work productivity through motivation.

LITERATURE REVIEW

Transformational Leadership Style

Setiawan in Apriyanti and Romli (2022) transformational leadership style is a superior who can bring about changes in every individual seen or for the entire company in achieving maximum results. Munawaroh in Zakaria (2022), a leadership style known as transformational leadership is able to motivate subordinates to work at a high level that exceeds their previous performance level. Therefore, the followings hypothesis are proposed: hypotheses 1 Transformational leaders style has a positive and significant effects on work productivity; hypothesis 4 Transformational leaders styles has a positive and significant effects on work motivation and hypotheses 8 Transformational leader style has a positive and significant effects on work productivity through work motivation Compensation.

Organizational Climate

Rasino (2023) organizational climates is the eternal qualities of the internal environment of organizations experience by member and influence their behavior and can be described in terms of the value of a special characteristic of the environment. Organizational climate is something that is really felt by people in a company (Asbari, Purwanto and Santoso, 2020). Therefore, the following hypotheses are formulated: hypothesis 2 Organizational

climate has a positive and significant effect on work productivity; hypothesis 5 Organizational climate has a positive and significant effects on work motivations and hypothesis 9 Organizational climate has a positive and significant effects on work productivity through work motivation.

Work Environment

(Khaeruman, et al., 2021), work environment is all the conditions arounded workers that can create a level of job satisfactions in carry out works so that they can produce optimal work, the following work environment has supporting work facilities when completing the work assigned to improve work. (Soelistyo & Desembrianita, 2021), the work environment is everything that is arounds work and can be influence by themselves when carry out the work assign. Therefore, the following hypotheses are formulated: hypothesis 3 The work environment has a positive and significant effect on work productivities; hypothesis 6 The work environment has a positive and significant effects on work motivations and hypothesis 10 The work environment has a positive and significant effects on works productivities through work motivations.

Based on the literature review and previous researc, an concep framework has been develop to describe the relation between variable in study. The framework consist of three independent variable, namely transformational leader style (X1), organizational climate (X2), and work environment (X3). The dependent variable is work productivities (Y), while work motivation (Z) serves as an intervening variable.

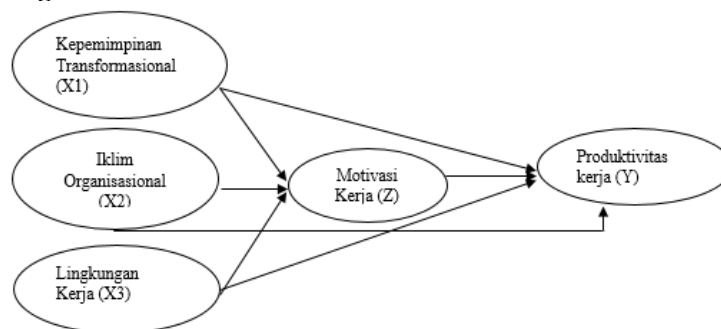


Figure 1. Conceptual Framework

METHODOLOGY

The population in this studies was 100 production employees using saturated or census sampling techniques. From the entire population, the entire population was sampled, namely 100 people. The data analysis use SEM-PLS Version 4.1.

RESEARCH RESULT

Descriptive Analysis Results

According to Sugiyono (2021), descriptive statistic are employed to provide a comprehensive overview of the data utilized in the study, primarily through the analysis of mean values. This statistical approach facilitates clearer and more accessible interpretation of the data. The table presents a range of frequency-

related information, including percentages, as well as minimum, maximum, and average values, all derived from the responses collected from participants.

Table 1. Mean RangeScore

Interval Mean	Category
1,00-1,79	Very Low
1,80-2,59	Low
2,60-3,39	Moderate
3,40-4,19	High
4,2-0-5,00	Very High

The presentation of respondents' answers illustrates the distribution of their responses to the questions ask in the questionnaires. The follow section describe how respondent answer are distribut among the variables studied. The next section presents the distribution of respondents' responses in relation to the variables studied, namely Transformational Leader Style (X1), Organizational Climate (X2), Work Environment (X3), Work Motivation (Z), and work productivity (Y). The frequency of respondent answer can be see in the following table:

Table 2. Descriptive Analysis

No	Variable	Mean	Category
1	Transformational leadership style	3.16	Moderate
2	Organizational climate	2.98	Moderate
3	Work environment	2.76	Moderate
4	Work productivity	3.12	Moderate
5	Motivation	3.10	Moderate

The transformational leadership style variable had an overall mean score of 3.16, which falls into the “moderate” category. Similarly, the organizational climate variable recorded an overall mean score of 2.98, which is also categorized as “moderate.” The work environment variable produced an overall mean score of 2.76, while the work productivity variable achieved a overall’s means score of 3.12 – both considered “moderate.” Finally, the motivation variable achieved a overall mean score of 3.10, which also falls into the “moderate” category.

Hypothesis Test Results

The path model serves as a visual tool to depict the proposed hypotheses and the interrelationships among variables within the framework of Structural Equation Modeling (SEM) (Hair et al., 2021). Hypothesis testing is carried out use the Partial Least Squares (PLS) method, which includes the assessment of both direct and indirect effects. The outcomes of this analysis are detailed in the table below.

Table 3. Summary of Hypotheses

Hypotheses		Finding	Types
H1	Transformational leaders style has a positive and significant effects on works productivity at PT Sumatera Tobacco Trading Company	Accepted	-
H2	Organizational climate has a positive and significant effects on works productivities at PT Sumatera Tobacco Trading Company	Accepted	-
H3	Work environment has a positive and significant effects on works productivities at PT Sumatera Tobacco Trading Company	Accepted	-
H4	Transformational leaders style has a positive and significant effects on works motivations at PT Sumatera Tobacco Trading Company	Accepted	-
H5	Organizational climate has a positive and significant effects on works motivations at PT Sumatera Tobacco Trading Company	Accepted	-
H6	Work environment has a positive and significant effects on works motivations at PT Sumatera Tobacco Trading Company	Accepted	-
H7	Work motivation has a positive and significant effects on works productivities at PT Sumatera Tobacco Trading Company	Accepted	-
H8	Transformational leaders style has a positive and significant effects on works productivity at PT Sumatera Tobacco Trading Company through work motivation	Accepted	Partial mediation
H9	Organizational climate has a positive and significant effect on work productivity at PT Sumatera Tobacco Trading Company through work motivation	Accepted	Partial mediation
H10	Work environment has a positive and significant effects on works productivities at	Accepted	Partial mediation

	PT Sumatera Tobacco Trading Company through work motivation		
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DISCUSSION

Transformational leaders' style has a positive and significant effects on work productivities at PT Sumatera Tobacco Trading Company

The result of the studies stated that's transformational leaders' style has a positive and significant effect on the productivity of PT Sumatera Tobaco Trading Company. Although the effects are relativ smalls, these result indicaties a meaning relation between the two variables. The low values of the path coefficients can be explained through severall contextual factor thats influence works productivities at PT Sumatera Tobaco Trading Company

The low F-Square value indicates that although significant, the effects of transformational leaders' style on works productivity is still limited. This may be due to other contextual factors that have not been identified in the study. This find is in line with a study by Jensen (2020) which revealed that the relations between transformational leaders' style and work productivity is often moderated by motivation, self-confidence and job satisfaction factors

Organizational climate has a positive and significant effects on work productivity at PT Sumatera Tobacco Trading Company

The result of the studies stated that organizationals climate has a positive and significant effect on productivity at PT Sumatra Tobaco Trading Company. This finding indicates that better's organizational climate felt by employees, the higher the level of work productivities.

The result of these studies can be explained through the theorsy put forward by Rasino (2023). This theory's state that the relationship between individuals that can be influenced by behavior to result in increased work productivity, productivity is closely related to existing structures such as the division of labor based on available sections, responsibility for tasks both with individuals or groups, communication generated from leaders to subordinates. In the context of PT Sumatra Tobaco Trading Company, although its influence is moderate, organizational climate seems to play a role in triggering increased work productivity, where employees can feel comfort, care, self-esteem or any form of assistance received by employees so as to create a conducive work atmosphere and can increase their productivity in working. The F-Square value indicates that the influence of organizational climate on work productivity is quite significant, although there is still room for improvement. This may be due to other contextual factors that have not been identified in the study. This finding is in line with a study by Susetya (2024) which states that increasing productivity can be influenced by various factors, one of which is organizational climate.

The work environment has a positive and significant effects on work productivity at PT Sumatera Tobacco Trading Company

The result of the studies stated that the work environment has a positive and significant effects on Work Productivity at PT Sumatra Tobacco Trading Company. Further, the averages values of the work environment are in the moderate category with significant variation in its implementations, where employees are able to work while establishing good working relationships with superiors is still lagging behind.

The F-Square value indicates that the work environment has a substantial influence on work productivity. Dahlia (2019) emphasized that in supporting the level of work productivity, it can be implemented by producing a work environment that has high enthusiasm. Wadu and Chiang (2020) added that a conducive work environmental and formulating the right strategy to ensure that employee share knowledges and experience explicit with coworkers.

Transformational leadership style has a positive and significant effects on work motivation at PT Sumatera Tobacco Trading Company

The result of the studies stated that transformational leader's style has a positive and significant effects on works motivations at PT Sumatra Tobacco Trading Company. Further, the averages values of transformational leadership style are in the moderate category with significant variation in implementations, where leaders try to improve self-development showing aspects of leaders communicating about work clearly.

The positive and significant effect of transformational leadership style on work motivation can be explain through several driving factor. First, motivation. Motivation consists of positive motivation including how leaders stimulate subordinates by give rewards to employees who have achievements. Negative motivation includes how leaders motivate subordinates through their standards and get punish. With these negative motivations, the work enthusiasm of subordinate in the short term can increase because they are afraid of punishment, but in the long term it can result in less good (Hasibuan, 2021).

The F-Square value indicate that transformational leader's style has a substantial influence on work motivation. (Jensen and Bro, 2020) emphasized that transformational leaders have a positive influence on the satisfaction of three basic psychological need, namely autonomy, competence, and relatedness. Therefore, understanding transformational leadership is relevant for managers in increasing work motivations.

Organizational climate has a positive and significant effects on work motivation at PT Sumatera Tobacco Trading Company

The results of the study stated that organizational climate has a positive and significant effect on work motivation at PT Sumatra Tobacco Trading Company. Furthermore, the average value of organizational climate is in the moderate category with significant variations in its implementation, where support from colleagues shows the lowest mean, while getting ease in making decisions has the highest mean.

The positive and significant effects of organizational climate on work motivation can be explained through several driving factors. First, actions taken by superiors include company rules, policies and procedures, especially issues related to personnel issues, distribution, communication style, methods used in motivating, techniques and disciplinary actions (Pratama and Pasaribu, 2020). Second, employee behavior, through their personalities, especially desires and actions taken in satisfying needs. A fairly high F-Square value indicates that organizational climate has a substantial influence on work motivations. Research conducted by (Nurliana, 2020) creates a good climate for the company, so the company must see what is in the organizational climate. Internal environmental conditions and organizational characteristics must be considered to create an organizational climate. Employees who are satisfied with the organizational climate they have will have a positive effect on their performance. Likewise, employees who are dissatisfied with their organizational climate will feel uncomfortable with the work environment and affect employee motivation in working (Redjeki et al., 2021).

The work environment has a positive and significant effects on work motivation at PT Sumatera Tobacco Trading Company

The results of the study stated that the work environment has a positive and significant effects on work motivations at PT Sumatera Tobacco Trading Company. Further, the average values of the work environment are in the moderate categories with significant variation in implementations, where employees can work together showing the highest mean while establishing good relationships with superiors lags behind with the lowest mean.

The F-Square value indicates that the work environment has a substantial influence on work motivations. Amalia (2021) emphasized that the work environment is not only everything in the operational process, but also the relationship between employees from leaders or from coworkers.

Thus, it can be concluded that the work environment has become a critical factor in driving work motivation at PT Sumatera Tobacco Trading Company. Although its implementation is not evenly distributed in all aspects, the positive and significant influence shown through the path coefficient and F-Square values indicates the role of the work environment in maximizing employee work motivations.

Work motivation has a positive and significant effect on work productivity at PT Sumatera Tobacco Trading Company

The result of the studies stated that work motivations has a positive and significant effects on productivities at PT Sumatera Tobacco Trading Company. Further, the average values of work motivation are in the moderate categories with significant variation in implementations, where employees can be creative in their work showing the highest mean, while employees can be respected when working still lags behind with the lowest mean.

The positive and significant effect of work motivation on work productivity can be explained through several driving factors. Organizations that have employees who have a high level of motivation will be able to continue to

achieve shortterm and longterm company goal. The high the levels of motivations, the better their performance will be. A person's desire to work professionally, responsibly, and work to achieve maximum performance will be influenced by their level of motivation (Munarsih et al., 2022).

This finding is reinforced by several studies by Arsyad (2020) showing positive work motivation and no significant effects on work productivities. Work motivation can occur in a company depending on the level of fulfillment of all employee needs provided by the company, the type and conditions of work carried out, colleague and works environment, and the attitudes of the leader while working Robbins and Judge in (Sutrisno, 2021).

The F-Square value indicates that works motivations have a substantial influence on productivity. Fauzi (2021) emphasized that employees who are motivate to work tend to be more effective than organizations that have unmotivated employees.

Transformational leadership style has a positive and significant effect on work productivity at PT Sumatera Tobacco Trading Company through work motivation

The result of the studies stated that works motivations significantly mediate the effects of transformational leaders' style on work productivity at PT Sumatera Tobacco Trading Company. On the indirect effects of transformational leaders' style on work productivities through work motivations. This finding is in line with the initial hypotheses and exit theory, so it requires further analysis.

The role of partial mediation of work motivations in the relations between transformational leaders' style and work productivity emphasizes the importance of being a leader who can bring about positive changes for a company that is used to increase the works productivities of it employe which is used as a tool to increase operational efficiency. This finding provides valuable insight for the development of employee productivity improvement programs that integrate employee motivation enhancement in delivering optimal work results.

Organizational climate has a positive and significant effect on work productivity at PT Sumatera Tobacco Trading Company through work motivation

The result of the studies state that organizational climate has a positive and significant effect on productivity at PT Sumatra Tobaco Trading Company through work motivation. The mediated role of work motivation in these relations is partials, meaningfull that parts of the influence of organizational climate on productivity occur through increase work motivation, while the direct effects also remain significant.

The finding is in line with recents research by Widyasari (2023) which revealed that organizational climate not only improves operational efficiency but also encourages a culture of mutual support for one another to improve interaction in the company. Likewise, a study (Rasino, Alhadihaq and Sumiati, 2023) at PT Sumatra Tobaco Trading Company found that a successful

organizational climate often results in maximum work productivity. The partial mediation role of work motivation on the relationship between organizational climate and work productivity at PT Sumatra Tobacco Trading Company emphasizes the importance of viewing organizational climate not only as a change in the way of interacting, but also as a catalyst for creating a harmonious and mutually supportive organization. This finding provides valuable insight for leaders to continue to establish social interactions but also to increase employee work motivation so that employees are more enthusiastic in working.

The work environment has a positive and significant effect on work productivity at PT Sumatra Tobacco Trading Company through work motivation

The result of the study stated that the work environment has a positive and significant effects on productivity at PT Sumatra Tobacco Trading Company through work motivation. The mediated role of work motivation in these relations is partial, which means that some of the influence of the work environment on work productivity occur through increase work motivation, while the direct effect also remains significant. The partial mediating role of work motivations in the relations between the work environment and work productivity at PT Sumatra Tobacco Trading Company emphasize the importance of planning a conducive work environment in creating a sense of comfort when employees work and can calmly complete their work. This finding provides valuable insight for companies to continue to create or plan work in a safe and comfortable environment so that they work according to high concentration.

CONCLUSION AND RECOMMENDATION

The result of the analysis show that all variable studied, namely transformational leaders style, organizational climate, work environment, and work motivations significant affect works productivities. Among all of them, the work environment emerged as the most influential factor, indicating that the conditions in which employees work greatly affect them in increasing their work productivity. Followed by organizational climate, transformational leadership style has the smallest influence. These results highlight that a conducive environment can increase employees work motivation and produce maximum work results for increasing work productivity.

ADVANCED RESEARCH

Exploring contextual factor such as transformational leaders style, organizational climate, and work environment that influence the relations between work productivity and work motivations.

REFERENCES

- Apriyanti, L., & Romli. (2022). Gaya kepemimpinan transformasional dan kompetensi pekerja berpengaruh padapeningkatan produktivitas karyawan PT. *Adikarya Inti Solusi.Mediastima*, 28(2), 143–152. <https://doi.org/https://doi.org/10.55122/mediastima.v28i2.580>
- Asbani, Purwanto and Santoso (2020) 'Pengaruh Iklim Organisasi dan Kepemimpinan Transformasional Terhadap Produktivitas Kerja Inovatif

- Pada Industri Manufaktur di Pati Jawa Tengah', *Jurnal Produktivita*[Preprint]. Available at: <https://doi.org/http://123.231.151.250/index.php/jp/article/view/1797>.
- Arsyad, Siwi, & Sumampouw. (2020). Pengaruh Kepemimpinan Transformasional dan Motivasi Terhadap Produktivitas Kerja Karyawan Pada PT. Bintang Sewu Sejahtera di Manado. *Jurnal Administrasi Bisnis*.
- Asman, Z. and Rony, Z.. (2023) 'Pengaruh Gaya Kepemimpinan Transformasional terhadap Produktivitas Kerja: Studi Analisis Tinjauan Literatur Sistematis', *Jurnal bisnis dan ekonomi*, 1(1), pp. 68-7. Available at: <https://doi.org/https://doi.org/1061597/jbe-ogzrp.v1i1.5>.
- Dahlia, M. (2019). Pengaruh Lingkungan Kerja Dan Kelelahan Kerja Terhadap Produktivitas Kerja Karyawan Bagian Produksi (studi kasus PT. Sumber Graha Sejahtera (SGS)). *Jurnal Manajemen*, 6, 11-16.
- Dharmawan, G. ., & Satria, H. (2022). Pengaruh Kepemimpinan Transformasional Terhadap Produktivitas Kinerja Pegawai Pemerintahan Yang Dimediasi Oleh Disiplin Sebagai Regulator (SYSTEMATIC REVIEW). *Jurnal Widya Ciamago*, 4(1).
- Hair, J.. (2021) 'Partial Least Squares Structural Equation Modeling- Based Discrete Choice Modeling: An Illustration In Modeling Retailer Choice.', *Business Research*, 12(1), pp. 115-142.
- Jensen, U.. and Bro, L.. (2020) 'How Transformational Leadership Supports Intrinsic Motivation and Public Service Motivation: The Mediating Role of Basic Need Satisfaction.', *The American Review of Public Administration*, 48(6), pp. 535-549. Available at: <https://doi.org/https://doi.org/10.1177/0275074017699470>.
- Khaeruman, Marnisah, L., Idrus, S., Irawati, L., Farradia, Y., Erwantiningsih, E., et al. (2021). Meningkatkan Manajemen Sumber Daya Manusia Konsep dan studi kasus. Serang: CV AA RIZKY.
- Munarsih et al. (2022) *Etika Profesi Manajemen*. CV Rey Media Grafika.
- Nurliana, L. (2020). Pengaruh Iklim Organisasi Terhadap Produktivitas Kerja Pegawai Di Kantor Kepala Desa Ciharalang Kecamatan Cijeungjing Kabupaten Ciamis. *Dinamika*, 6(3).
- Pratama, K.. and Suana (2020) 'Lingkungan Kerja Non Fisik Berpengaruh Terhadap Motivasi Intrinsik Dan Kepuasan Kerja Karyawan', *E-Jurnal Manajemen*, 9(7). Available at: <https://doi.org/DOI:https://doi.org/10.24843/EJMUNUD.2020.v09.i07.p04>.
- Rasino, Alhadihaq, M. ., & Sumiati, N. (2023). Pengaruh Iklim Organisasi Terhadap Produktivitas Kerja Pegawai Di Sekretariat Daerah Kota Bandung. *Jurnal Komunikasi Dan Administrasi*, 10(2), 863-870.
- Redjeki, S., Sihite, M. and Supriyadi (2021) 'Pengaruh Iklim Organisasi Dan Kualitas Kehidupan Kerja Terhadap Produktivitas Karyawan Melalui Kepuasan Kerja Dengan', *EKOBISMAN* [Preprint].

- Soelistyo, D., & Desembrianita, E. (2021). Strong point Kinerja karyawan motivasi kunci implementasi kompensasi dan lingkungan kerja. Sidoarjo: Nizamia Learning Center.
- Sugiyono (2021) Metode Penelitian Kuantitatif, Kualitatif dan R&D. Ketiga. Bandung: Alfabeta.
- Susetya, P., and Setyaning, A. (2024) 'Pengaruh Gaya Kepemimpinan Transformasional dan Lingkungan Kerja terhadap Produktivitas Kerja Mahasiswa Magang Program Studi Manajemen FBE UII : Kepuasan Kerja sebagai Mediator', JPEK (Jurnal Pendidikan Ekonomi dan Kewirausahaan), 8(2), pp. 471-481.
- Wadu, M. and Chiang (2020) 'The impact of new working practices on employee productivity: The first exploratory study in Asia', Journal of Facilities Management, 17(2), pp. 122-141. Available at: <https://doi.org/10.1108/JFM-03-2018-0020>.
- Widayati, C., Rahardjo, Thea, & Febriyanti. (2020). Pengaruh Gaya Kepemimpinan Transformasional, Motivasi Dan Kompensasi Terhadap Kinerja Karyawan. Jurnal Ekonomi, XXII(3), 466-485.
- Zakaria, I., Djaelani, A., & Khalikussabir. (2022). Pengaruh Gaya Kepemimpinan Transformasional, Kompensasi, Dan Budaya Organisasi Terhadap Produktivitas Kerja Karyawan (Studi Pada PT. Berlian Multi Servindo di Kabupaten Kotawaringin Barat). E-Jurnal Riset Manajemen, 12