The Effect of Work Environment and Work Stress on Employee Performance at PT. Solusi Transportasi Indonesia (Grab Palembang)

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This study examines the effect of Work Environment and Work Stress to employees performance. The population in this study were employees at PT. Solusi Transportasi Indonesia (Grab Palembang).The sample technique used in this study is a census technique which means the respondents are all employees of PT. Solusi Transportasi Indonesia (Grab Palembang) as many as 118 people. The data was collected from respondents using research instruments questionnaire. The analysis model uses multiple linear regression.Based on the result of hypothesis testing, The Work Environment has a positive and significant effect on Employee Performance at PT. Solusi Transportasi Indonesia and Work Stres have a negative and significant effect on Employee Performance at PT. Solusi Transportasi Indonesia (Grab Palembang).Based on the results of the analysis, companies should pay attention to the physical work environment such as adding or regulating vents and windows in the workspace so that air circulation is maintained properly and choosing trusted internet network facilitie. Companies must also be able to control work stress such as too much employee workload to be distributed to other employees who have not had much workload at that time so that employee performance remains good and can even increase.

Key Words : Work Environment, Work Stress, Employee Performance.

I. INTRODUCTION

In an organization, both an institution and a company, one of the most important factors is human resources. The level of success of an organization can be influenced by one factor through the performance of members or employees. Every organization really wants good and ever-increasing employee performance, achievements gained by employees can improve company performance.

One effort to improve employee performance is to pay attention to the work environment. An important role in determining the quality of employee performance results is one of them from the work environment. It is certain that employee performance will be maximized if they find a good work environment.

Another effort to improve employee performance is to pay attention to work stress. Job stress is a condition where physical and psychological do not have a balance that affects emotions, the thought process of an employee due to tension in work (Rivai, 2004). Stress can have a negative impact on the psychological and biological state of the employee.

In the study of Angel Susanti, et al 2016, environmental variables and work stress have a positive effect on performance partially and simultaneously. In his research, work stress is the most dominant variable affecting employee performance. In P Lankeshwara's research (2016), only work environment variables did not significantly influence employee performance.

Grab is a startup company engaged in technology that serves transportation provider applications. As a startup company that has not been in operation for a long time and is in the development stage, it is highly needed employees with good performance. Palembang Grab is currently experiencing significant growth so that the Palembang Grab needs more employees than before. Until now Palembang Grab employees have reached 118 employees.

The working environment at Grab Palembang is currently not very conducive for Palembang Grab employees. The condition of the room is less conducive in several divisions, the layout is not so neat and the facilities are not yet complete, potentially making the workers work in conditions that are not so comfortable so that the work done is not optimal because of these limitations.

Grab is a Start Up company as explained above, so that each employee can do more than one job, seeing that the average employee is an employee who has no previous job experience. The work usually continues until at home because the target must be met.

Based on the explanation above and see from the need for employees who have good performance for startup companies due to work demands, the authors are interested in writing "The Effect of Work Environment and Work Stress on Employee Performance of PT Solusi Transportasi Indonesia (Grab Palembang)".

II.   LITERATURE REVIEW

Work Environment

Work environment according to Taiwo (2010) is everything that influences the way people work such as events, people and others. Creating a conducive work environment is something that must be considered by the company.

Work Stress

According to Mangkunegara (2009), stress is a feeling of stress experienced by employees when facing work. Causes of stress include individual level, group level, organizational level, and extra organizational level in the work stress model developed by Ivansevich and Matteson (in Kreitner and Knicki, 2005: 29). Individual level compressor that is directly related to one's job assignment (person-job interface).

Employee Performance

According to John Miner (1988) in assessing performance there are dimensions that can be measured: Quality, namely the level of quality of work; Quantity is the amount of work produced; The use of time at work, namely the level of absence, tardiness, effective working time / lost work hours and cooperation with others at work.

III.   RESEARCH METHODOLOGY

Population and Sample

The study population was all Grab employees in Palembang, amounting to 118 employees. Of the total 118 employees, the sample I took was all employees of PT. Indonesian Transportation Solutions (Grab Palembang). So thus the use of the entire population without having to draw research samples as observation units is called census techniques.Now it is the time to articulate the research work with ideas gathered in above steps by adopting any of below suitable approaches:

Research Instrument Testing

Test of Validity

The item validity obtained using Pearson Product Moment is the type of validity in this study. With the criteria If the statement item value is greater than r table with alpha 0.05, the item is valid. However, if the statement item is smaller than r table with alpha 0.05 then the item is invalid. Items that are declared invalid subsequently are not used to capture research data (Riduwan, 2015).

Test of Realiability

Reliability testing in this study was seen from the Cronbach Alpha value, with the following criteria:

- If alpha> 0.90 then reliability is perfect

- If the alpha between 0.70 - 0.90 then the reliability is high

- If alpha is between 0.50 - 0.70, the reliability is moderate

- If alpha <0.50 then reliability is low

After the data validity test, if there is an unvalid statement item, then the statement item cannot be included in the reliability test, and vice versa if the statement item is valid then it can be included in the reliability test (Riduwan, 2015).

Multiple Linear Regression

This research uses multiple linear regression testing which aims to predict the value of the influence of two or more independent variables on one dependent variable. The equations that can be formed are as follows:

$$Y = a + b_1x_1 + b_2x_2 + \varepsilon$$

Information:

Y: Employee Performance

a: Constants

x_1: Internal work environment

x_2: Job stress

ε : Error Term

b_1: Regression coefficient x1

b_2: Regression coefficient x2

t Test

t test basically shows whether the independent variables (variables X1 and X_2) affect the dependent variable (Y) partially (individually) in explaining the variation of the dependent variable (Sanusi, 2011: 145). T test is done by comparing t-counts with t-tables at a significance level of 5% or $\alpha = 0.05$ with degrees of freedom df = (n-k).

F Test

F test is performed to show whether there is an influence of independent variables (X1 and X_2) together or simultaneously to the dependent variable (Y) by comparing the F-count with the F-table at a significance level of 5% or $\alpha = 0.05$ with a degree freedom (degree of freedom) df = (nk).

IV.   RESEARCH RESULT AND DISCUSSION

Frequency Distribution of Respondent Characteristics

Table 1 Characteristics of Respondents by Gender

Age (Years)	Total	Percentage (%)
Male	76	64,4
Female	42	35,6
Total	**118**	**100**

Source: Primary data processed, 2019

From Table 1 it is known that most of the 118 respondents namely 76 people (64.4%) are male, while 42 people (35.6%) are female. It can be concluded from the data that some Palembang Grab employees are male.

Table 2 Characteristics of Respondents Based on Recent Education

Last Education	Total	Percentage (%)
SHS	0	0
Diploma	27	22,9
S1	91	77,1
S2/S3	0	0
Total	**118**	**100**

Source: Primary data processed, 2019

From Table 2 it is known that the most recent education of Grab Palembang employees is 91 people (77.1%) with S1 education, while 27 people (22.9%) of them have Diploma education. It can be concluded from the data that the majority of Grab Palembang employees have a S1 education background.

Table 3 Characteristics of Respondents Based on Marital Status

Marital Status	Total	Percentage (%)
Single	109	92,4
Married	9	7,6
Total	**118**	**100**

Source: Primary data processed, 2019

From Table 3 it is known that most of the 118 respondents namely 109 people (92.4%) were not married, while 9 people (7.6%) were married.

Table 4 Characteristics of Respondents Based on Years of Service

Years of Service	Total	Percentage (%)
< 1 years	15	12,7
1-3 years	103	87,3
> 3 years	0	0
Total	**118**	**100**

Source: Primary data processed, 2019

From Table 4 it is known that the majority of respondents namely 103 people (66.1%) have worked for 1-3 years, 15 people (12.7%) of whom have just joined the Grab Palembang in the span of <1 year.

Test Instrument Data

Validity test

Test Validation for Work Environment Variable Questionnaire

Based on the results of the calculation of the validity test with 15 questions about the work environment are as follows:

Table 5 Test Results of Validity of Work Environment Variables (X_1)

Item	Item *Correlation Value* (r^{count})	Sig	r^{tabel}	Criteria
1.	0,875	0,000	0,374	Valid
2.	0,397	0,000	0,374	Valid
3.	0,923	0,000	0,374	Valid
4.	0,923	0,000	0,374	Valid
5.	0,923	0,000	0,374	Valid
6.	0,923	0,000	0,374	Valid
7.	0,540	0,000	0,374	Valid
8.	0,585	0,000	0,374	Valid
9.	0,596	0,000	0,374	Valid
10.	0,923	0,000	0,374	Valid
11.	0,540	0,000	0,374	Valid
12.	0,585	0,000	0,374	Valid
13.	0,540	0,000	0,374	Valid
14.	0,585	0,000	0,374	Valid
15.	0,923	0,000	0,374	Valid

Source: Primary data processed, 2019

Based on Table 5 above, it can be seen that all questions for the commitment variable have a valid status, because the value of r count (Corrected Item-Total Correlation)> r table is 0.374.

Table 6 Work Stress Variable Validation Test Results (X_2)

Item	Item *Correlation Value* (r^{count})	Sig	r^{tabel}	Criteria
1	0,868	0,000	0,374	Valid
2	0,666	0,000	0,374	Valid
3	0,886	0,000	0,374	Valid
4	0,857	0,000	0,374	Valid
5	0,857	0,000	0,374	Valid
6	0,772	0,000	0,374	Valid
7	0,779	0,000	0,374	Valid
8	0,773	0,000	0,374	Valid

Source: Primary data processed, 2019

Based on Table 6, it can be seen that from the 8 items asked about job satisfaction, all of them have a valid status, because the calculated value (Corrected Item-Total Correlation) is greater than the table of 0.374.

Table 7: Performance Variable Validation Test Results (Y)

Item	Item *Correlation Value* (r^{count})	Sig	r^{tabel}	Criteria
1	0,898	0,000	0,374	Valid
2	0,904	0,000	0,374	Valid
3	0,898	0,000	0,374	Valid
4	0,904	0,000	0,374	Valid
5	0,904	0,000	0,374	Valid
6	0751	0,000	0,374	Valid
7	0,533	0,000	0,374	Valid
8	0751	0,000	0,374	Valid
9	0,438	0,000	0,374	Valid
10	0,533	0,000	0,374	Valid
11	0,751	0,000	0,374	Valid
12	0,533	0,000	0,374	Valid
13	0,751	0,000	0,374	Valid

Source: Primary data processed, 2019

Based on Table 7, it can be seen from the 13 items that were asked about the work performance of all employees that are valid, because the value of the calculated (Corrected Item-Total Correlation) is greater than the table of 0.374.

Reliability Test

Table 8 Reliability Test Results

Item	Variable	*Cronbach Alpha*	Criteria
1	Lingkungan Kerja	0,767	Reliabel
2	Stres Kerja	0,923	Reliabel
3	Kinerja	0,768	Reliabel

Source: Primary data processed, 2019

Based on Table 8 the alpha cronbach value of work stress variables> 0.90, it can be concluded that the instruments on the work stress variable are included in the perfect reliability category and the alpha cronbach value of the work environment variable is 0.767, and the work performance is 0.768 based on the above table, it can be seen that the instrument the work environment and employee performance variables are included in the high reliability category.

Hypothesis testing

Multiple Linear Regression

Table 9 Linear Regression Equations

Model		B	Std. Error	Beta	t	Sig.
		Unstandardized Coefficients		**Standardized Coefficients**		
1	(Constant)	0.336	0,074		6,652	0,000
	Work Stress	-0.162	0,070	0,204	-2,298	0,023
	Work Environment	0.495	0,061	0,486	5,470	0,000

a. *Dependent Variable*: Performance

Source: Primary data processed, 2019

Linear Regression Equations $Y = 0.336 - 0.162X_1 + 0.495X_2 + e$

If we pay attention to this equation, the constant (a) of 0.336 can be interpreted that if there is no influence (work environment and work stress) then the performance of the employees of PT. Solusi Transportasi Indonesia (Grab Palembang) will remain at 0.336. Then the equation also shows the coefficient (b_1) which results obtained by -0.162 this figure can be interpreted that if stress rises by 1 unit, then the performance of employees of PT. Solusi Transportasi Indonesia (Grab Palembang) will drop to 0.162, and the coefficient (b_2) which results are obtained by 0.495 This figure can be interpreted that if the work environment rises by 1 unit, the performance of Palembang Grab employees will rise to 0.495, and can therefore seen that the variable work environment and work stress has an influence on employee performance at PT. Indonesian Transportation Solutions (Grab Palembang).

T Test

Table 10 Test Results t

Model		t	Sig.
1	(Constant)	6,652	0,000
	Work Stres	2,298	0,023
	Environment	5,470	0,000

Dependent Variable: Performance
Independent Variabel : Work Stress, Environment
Source: Primary data processed, 2019

From the t test results obtained: a value of 0.023 <0.05, for work stress variables the work stress variable has a significant effect on the performance variable, while for the environmental variable is obtained 0,000 <0.05, the environment variable has a significant effect on the performance variable. So it can be concluded that Ha "work environment and stress have a significant effect on performance", meaning that the hypothesis is accepted.

F Test

Table 11 Test Results F

ANOVA[b]

	Model	F	Sig.
1	Regression	36.861	.000[a]
	Residual		
	Total		

a. Predictors: (Constant), Work Environment, Work Stress

b. Dependent Variable: Performance

Source: Primary data processed, 2019

From the F test results obtained: the value of 0,000 is smaller than 0.05, and the calculated F value is greater than the F table (36,861> 3.09) then the independent variable simultaneously has a significant effect on the dependent variable. So it can be concluded that Ha "work environment and stress have a significant effect on performance", meaning that the hypothesis is accepted.

Discussion

a. Hypothesis H1, Work Environment has a positive and significant effect on Employee Performance at PT. Solusi Transportasi Indonesia (Grab Palembang).

Based on the results of the study it can be concluded that the work environment has a positive and significant effect on employee performance at PT. Indonesian Transportation Solutions (Grab Palembang). The work environment is a very important part in employees doing work activities. By paying attention to a good work environment it will motivate employees to work better so as to improve employee performance. According to Terry (2006) the work environment is defined as the forces that influence, both directly and indirectly, the company's performance. This is the same as Sundastrom's opinion (in Saleem, 2012), most people spend around 60 percent of their lives in a physical work environment that greatly influences behavior, morals, abilities and performance. The influence of the work environment on employee performance in this study is supported by the results of research Kusuma Sari and Agus Frianto (2013), Pima Nela et al. (2014) and Aji A. Tri and Amelia Kartini (2015) which stated that the work environment had a significant and positive effect on employee performance.

Based on the results of the questionnaire work environment variable frequency, the statement of the workspace free of pollution (pollution) and wifi access is very high quality and convenient to use to get a low value compared to other statements on this variable. According to researchers, the company PT. Indonesian Transportation Solutions (Grab Palembang) to pay more attention to the physical work environment such as adding ventilation or windows so that air circulation in the office can be maintained and free from pollution, choosing a trusted internet network vendor that can supply internet networks to support employees in carrying out their work, given the majority of work must use the internet network.

b. Hypothesis H2, Job Stress has a negative and significant effect on Employee Performance at PT. Solusi Transportasi Indonesia (Grab Palembang)

Based on the results of this study concluded that work stress has a negative and significant effect on employee performance at PT. Indonesian Transportation Solutions (Grab Palembang). Job stress is a condition experienced by an individual both physically and non-physically which can put pressure on employees so as to create unstable employee emotions which will then result in his work. Robbins (2006) states that the level of stress experienced continuously over a long period of time can result in lower performance. Although this U-Reverse model is popular and intuitively appealing, it does not get much empirical support, so researchers and company managers must be careful in relying that this model accurately describes the relationship of performance stress. The effect of

work stress on employee performance in this study is supported by research results of Cristine Julvia (2016), Nu Saina (2013), Sari Rahma et al (2012) which states that work stress has a significant and negative effect on employee performance.

According to researchers, the company PT. Indonesian Transportation Solutions (Grab Palembang) must pay more attention to things that can cause employee work stress such as, workloads that are too much at a certain time can be overcome by attracting employees in other divisions whose jobs are not piling up to help, rearranging work time so deadlines do not overlap and add temporary employees over time.

V. CONCLUSIONS AND RECOMMENDATIONS

Conclusions

From the results of the analysis of the discussion there are several conclusions as follows:

1. The independent variable, namely the Work Environment individually (partial) there is a significant positive effect on the dependent variable, namely Employee Performance at PT Solusi Transportasi Indonesia (Grab Palembang).
2. The independent variable Work Stress individually (partial) there is a significant negative effect on the dependent variable, namely Employee Performance at PT. Solusi Transportasi Indonesia (Grab Palembang).
3. Independent variables namely the Work Environment and Work Stress together (simultaneously) there is a significant influence on the Performance of Employees at PT. Solusi Transportasi Indonesia (Grab Palembang).

Recomendations

Based on the conclusions above, the advice that can be given is

1. The company should pay more attention to the physical work environment and work stress in an effort to improve employee performance.
2. This research has been attempted in its implementation in accordance with scientific procedures, but there are some limitations that are owned by this research, such as;
a. This study is still limited by the variables used only work environment and work stress, if this study will be used as a reference for further research, researchers should then add other variables so that research results can be maximized.
b. In this study the dependent and dependent variable indicators are still limited. Henceforth, it should be added back indicators in each variable so that results can be maximized.

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