EFFECT OF OCCUPATIONAL SAFETY AND HEALTH, WORK ENVIRONMENT AND COMPENSATION ON EMPLOYEE PERFORMANCE

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ABSTRACT

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Performance is the main indicator for the progress of a company, resulting in increased productivity in all parts of the system. Basically, performance is an individual thing because each individual will have a different level of performance in accordance with the values that apply to each individual. The more aspects of the job that match the individual's wishes, the higher the level of performance. This study aims to analyze the effect of occupational safety and health, work environment and compensation on employee performance. The subjects of this study were employees of PT SMG, with a population of 114 people. The data collection technique used a questionnaire instrument with a Likert scale measurement. The data were analyzed using the SmartPLS software version 3.3.7. The results of this study indicate that occupational safety and health, work environment and compensation have a significant effect on employee performance.

KEYWORDS
Occupational Safety and Health, Work Environment, Compensation, Employee Performance

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INTRODUCTION

According to data made by the Ministry of Manpower, when the Covid-19 pandemic began to spread to all sectors/business fields. Of course, this phenomenon has a fairly severe impact on Indonesia’s economic conditions in 2020. As a result, labor

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productivity in 2020 also decreased when compared to 2019, which was down by around 3.55 percent (Bank, 2021).

This also happened at PT. SMG, which is one of the companies engaged in the procurement of goods to support the performance of its industrial partners (Sumbodo, Supraptono, Meddaoui, Samsudi, & Widodo, 2020). The system works, PT. SMG as a second party that acts as a vendor and has a work target for a project that has been given by its partners (Adiyanti & Fathurrahman, 2021). In the current condition due to the pandemic, there is a work from home system that increasingly makes the company's work system have to adjust to existing conditions so that it remains optimal to manage the company's business processes (Dwivedi et al., 2020).

A phenomenon was found if PT. SMG is experiencing a decline in the performance of its employees due to the impact of this pandemic (Sukandi, RinrinRahmawati, Hendayani, Apriliani, & Sitorus, 2022). The following is an overview of the data obtained from the management of PT SMG:

Table 1 Key Performance Indicators of PT SMG

| Key Performance Indicator                        | Weighting KPI | Target | Realization |
|-------------------------------------------------|---------------|--------|-------------|
| Financial Perspective                           |               |        |             |
| Operating costs                                 | 79            | 80     | 60          |
| Increasing the number of tenders/projects       | 80            | 95     | 60          |
| Employee Payroll                                | 80            | 95     | 65          |
| Process Internal Perspective                    |               |        |             |
| Project processing time                         | 87            | 95     | 67          |
| Availability of employees in the project        | 80            | 80     | 66          |
| QHSE at work                                    | 80            | 85     | 64          |
| Job supervision                                 | 88            | 95     | 66          |
| HR Management Perspective                       |               |        |             |
| Completion of employee tasks                    | 85            | 96     | 65          |
| Worker's attendance                             | 88            | 90     | 68          |
| Solving problems faced by employees             | 80            | 90     | 64          |
| Employee performance improvement                | 80            | 85     | 67          |

Notes:
Score 100 = very good
Score 99-90 = good
Score 89-80 = not good
Score 69-80 = not enough
Score 79-70 = enough

Source: PT SMG management data, 2021

With this data, the researcher conducted a pre-survey with a short questionnaire to the company's employees with a total of 30 people to see how the condition of the company and determine the factors to be studied (Riyanto, Sutrisno, & Ali, 2017). The following are the results of the survey conducted by the researcher.

In Figure 1 it can be seen that 67% of employees feel that they do not feel safe at work, which means that the implementation of company standards in carrying out K3 is still not good.
In Figure 2, it can be seen that 70% of employees are currently not comfortable doing their jobs because of the lack of two-way communication with superiors and coworkers.

Figure 3 shows that 86% of employees feel that the salary given is not enough. Even though the company has given a salary according to the contract, the deadline for giving it is late from the agreement, and incentive wages sometimes don't exist due to the current pandemic.

Thus, it can be concluded that it is assumed that the variables that affect the decline in the performance of PT SMG's employees are K3, work environment and compensation, so a more in-depth study is needed to find out.
RESEARCH METHOD

This type of research uses quantitative research methods, where the data collected are numbers that will be analyzed using statistics (Bloomfield & Fisher, 2019). This research is basic research, namely basic research that has a scientific research objective to improve scientific theories and improve understanding or prediction of business or other phenomena (Baker et al., 2019). This research uses the SemPLS analysis tool and the SmartPLS version 3.3.7 application as a statistical tool to find information about the influence between variables in this study (Asghar, Arif, Iqbal, & Seitamaa-Hakkarainen, 2022).

One of the methods used to determine the number of samples is using the Slovin formula (Susanti, Soemitro, Suprayitno, & Ratnasari, 2019). The company has 172 employees, and a survey was conducted by taking samples (Islami, Mulolli, & Mustafa, 2018). Samples are required if the error tolerance limit is 5%. Thus, the number of samples that are considered valid if there are 114 people or more.

The type of data collection method used is primary data, namely data that comes from the original source obtained directly from the object under study (Ilham, 2019). The primary data in this study were sourced from respondents' responses or questionnaires given, and the sampling used several data collection techniques: Literature study, direct interviews with employees, and questionnaires measured using a Likert scale which is included in the Ordinal measurement scale (Sileyew, 2019).

RESULT AND DISCUSSION

A. Test the Measurement Model (Outer Model)

The Outer Model, also known as the Outer Relation or Measurement Model, defines how each indicator block relates to its latent variables (Caraka et al., 2021). This model is used to determine the validity and reliability of the indicators (Watts, Poore, & Waldman, 2019). The testing stages of the measurement model (outer model) are carried out with the following steps:

1. Convergent Validity Test

   Based on the rule of thumb used in this study, the parameters measured are load factor values greater than 0.7 and AVE greater than 0.5. The test results using SmartPLS will produce load factor values in the model path diagrams and tables.
Based on the analysis of the path diagram above, the model uses SmartPLS, then produces the loading factor values in the form of a path diagram model. It can be seen that all indicators are above 0.7 which means that the indicator is declared valid. Then, you can see the presentation of the data in the following Outer Loadings table:

Table 2 Outer Loading

| Indicator | K3(X1) | Work Environment (X2) | Work Environment (X2) | Work Environment (X2) | Description |
|-----------|--------|------------------------|------------------------|------------------------|-------------|
| KK1       | 0.848  | Valid                  |                         |                         |             |
| KK2       | 0.888  | Valid                  |                         |                         |             |
| KK3       | 0.870  | Valid                  |                         |                         |             |
| KK4       | 0.864  | Valid                  |                         |                         |             |
| KK5       | 0.885  | Valid                  |                         |                         |             |
| KK6       | 0.863  | Valid                  |                         |                         |             |
| KK7       | 0.869  | Valid                  |                         |                         |             |
| KK8       | 0.884  | Valid                  |                         |                         |             |
| LK1       | 0.930  | Valid                  |                         |                         |             |
| LK2       | 0.918  | Valid                  |                         |                         |             |
| LK3       | 0.929  | Valid                  |                         |                         |             |
| LK4       | 0.904  | Valid                  |                         |                         |             |
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It can be seen that K3 has a value between 0.848 - 0.888, the next result is LK, namely the Work Environment with a value between 0.881 - 0.930, then Compensation (KI) with a value between 0.762 - 0.877, and Employee Performance (KN) between 0.778 - 0.896. The results of the outer loadings table above show that all the questions on each latent variable in this study can be understood by the respondents. By referring to a minimum number of more than 0.7, it means that the data is declared valid (Hidayat & Latief, 2018). So that all data, nothing is removed and all data has met convergent validity.

2. Discriminant Validity Test

Discriminant validity of the measurement model with reflective indicators is assessed based on cross loading measurements with constructs. If the construct's correlation with the measurement item is greater than the size of the other constructs, it indicates that the latent construct predicts block size better than other block sizes. Discriminant validity serves to measure the accuracy of the reflective model and for the AVE value of discriminant validity a minimum number of 0.5 is set and better results are more than 0.5.
Table 3 Cross Loading

| Indicator | K3(X1) | Work Environment (X2) | Work Environment (X2) | Work Environment (X2) | Description |
|-----------|--------|------------------------|------------------------|------------------------|-------------|
| KK1       | 0.848  | 0.591                  | 0.366                  | 0.508                  | Valid       |
| KK2       | 0.888  | 0.584                  | 0.435                  | 0.567                  | Valid       |
| KK3       | 0.870  | 0.609                  | 0.315                  | 0.465                  | Valid       |
| KK4       | 0.864  | 0.577                  | 0.411                  | 0.543                  | Valid       |
| KK5       | 0.885  | 0.605                  | 0.423                  | 0.564                  | Valid       |
| KK6       | 0.863  | 0.733                  | 0.551                  | 0.673                  | Valid       |
| KK7       | 0.869  | 0.736                  | 0.496                  | 0.636                  | Valid       |
| KK8       | 0.884  | 0.729                  | 0.515                  | 0.659                  | Valid       |
| LK1       | 0.691  | 0.930                  | 0.719                  | 0.527                  | Valid       |
| LK2       | 0.704  | 0.918                  | 0.690                  | 0.504                  | Valid       |
| LK3       | 0.721  | 0.929                  | 0.697                  | 0.486                  | Valid       |
| LK4       | 0.689  | 0.904                  | 0.740                  | 0.512                  | Valid       |
| LK5       | 0.674  | 0.903                  | 0.711                  | 0.512                  | Valid       |
| LK6       | 0.664  | 0.915                  | 0.740                  | 0.532                  | Valid       |
| LK7       | 0.638  | 0.881                  | 0.719                  | 0.570                  | Valid       |
| Ki1       | 0.446  | 0.711                  | 0.861                  | 0.475                  | Valid       |
| Ki2       | 0.400  | 0.644                  | 0.774                  | 0.445                  | Valid       |
| Ki3       | 0.476  | 0.702                  | 0.810                  | 0.495                  | Valid       |
| Ki4       | 0.414  | 0.625                  | 0.762                  | 0.525                  | Valid       |
| Ki5       | 0.401  | 0.618                  | 0.877                  | 0.628                  | Valid       |
| Ki6       | 0.422  | 0.628                  | 0.867                  | 0.577                  | Valid       |
| Kn1       | 0.544  | 0.467                  | 0.563                  | 0.877                  | Valid       |
| Kn2       | 0.592  | 0.513                  | 0.630                  | 0.844                  | Valid       |
| Kn3       | 0.515  | 0.419                  | 0.552                  | 0.843                  | Valid       |
| Kn4       | 0.589  | 0.501                  | 0.554                  | 0.865                  | Valid       |
| Kn5       | 0.526  | 0.432                  | 0.455                  | 0.853                  | Valid       |
| Kn6       | 0.605  | 0.517                  | 0.528                  | 0.898                  | Valid       |
| Kn7       | 0.617  | 0.530                  | 0.528                  | 0.831                  | Valid       |
| Kn8       | 0.563  | 0.490                  | 0.559                  | 0.859                  | Valid       |
| Kn9       | 0.592  | 0.527                  | 0.547                  | 0.850                  | Valid       |
| Kn10      | 0.604  | 0.499                  | 0.516                  | 0.778                  | Valid       |
| Kn11      | 0.548  | 0.472                  | 0.576                  | 0.896                  | Valid       |

Source: Data processing output on SmartPLS 3.3.7 (2022)

Based on the results of discriminant validity testing after model modification at the convergent validity stage, it can be seen in table 3 that all indicators have a cross loading value of their constructs that is greater than the cross loading value of other constructs so that they are declared valid.

Another way to see discriminant validity is to look at the AVE value. The recommended AVE value is greater than 0.5 than other indicators involving the latent variable.

Table 4 Construct Reliability dan Validity

| Variable | K3(X1) | Work Environment (X2) | Work Environment (X2) | Work Environment (X2) |
|----------|--------|------------------------|------------------------|------------------------|
| K3 (X1)  | 0.871  |                        |                        |                        |
The highest value in the Extracted Average Variant is the work environment with a value of 0.912.

Based on Table 4 and the graph in Figure 5 Average Variance Extracted (AVE) shows that all indicators have a value above 0.5 which means the indicators are declared valid and meet discriminant validity.

3. Reliability Test

The reliability test is carried out by looking at the composite reliability value of the indicator block that measures the construct. This is necessary to find out whether the research instrument items, if used twice to measure the same symptoms, will provide relatively consistent measurement results. The results of composite reliability will show a satisfactory value if it is above 0.7.

In Table 5 below, it can be seen that all Cronbach alpha values show numbers above 0.81, which means that all the results are satisfactory and very reliable if the research instrument is used twice to measure all the same symptoms.

The second test can be by looking at the composite reliability value. In Table 4.13, where the composite reliability test is used to show the internal consistency of an indicator.
in the latent variable. In general, the value of composite reliability tends to be greater than Cronbach's alpha. Composite reliability is considered reliable if the value is above 0.7.

| Variable         | Cronbach’s Alpha | Cronbach’s rho_A | Composite Reliability | Average Variance Extracted (AVE) |
|------------------|------------------|-------------------|-----------------------|----------------------------------|
| K3 (X1)          | 0.955            | 0.960             | 0.962                 | 0.759                            |
| Work Environment (X2) | 0.966          | 0.967             | 0.972                 | 0.831                            |
| Compensation (X3)  | 0.907            | 0.915             | 0.928                 | 0.683                            |
| Employee Performance (Y) | 0.963        | 0.963             | 0.967                 | 0.730                            |

Source: Data processing output on SmartPLS 3.3.7 (2022)

**B. Structural Model Test (Inner Model)**

Inner model (inner relation, structural model, or substantive theory) describes the relationship between latent variables based on substantive theory. The structural model (inner model) is an evaluation of the Goodness of Fit Index or to test the hypothesis of a study. The structural model in SemPLS is first evaluated by using R2 for the dependent construct, the path coefficient value or the t-value of each path for the significant test between constructs in the structural model. The testing stages of the structural model (inner model) are carried out with the following steps:

1. **Coefficient of Determination Test / R Square (R²)**

   See the value of R-Square (R2) which is the Goodness of Fit (GoF) model test. In assessing the model with PLS, it begins by looking at the R-Square (R2) for each dependent variable. The coefficient of determination R-Square (R2) shows how much the independent variable explains the dependent variable. The value of R-Square (R2) is zero to one.

   | Variable         | R Square |
   |------------------|----------|
   | Employee performance | 0.609    |

   Source: Data processing output on SmartPLS 3.3.7 (2022)

   Based on Table 7, it can be seen that the R-square (R2) value of the employee performance variable is 0.609, which means that the K3 variable, compensation and work environment affect employee performance by 60.9% while 39.1% is influenced by other variables not included in the study. this.

2. **Test Goodness of Fit Index**

   The purpose of testing the Goodness of Fit Index (GoF) is to validate the combined performance of the measurement model (outer model) and structural model (inner model) obtained through calculations. GoF values range from 0-1 with the following interpretation: Small Goodness of Fit (GoF) = 0.1, Medium Goodness of Fit (GoF) = 0.25 and Large Goodness of Fit (GoF) = 0.38. Then the calculation of GoF for this research is as follows:

   \[
   \text{GoF} = (\text{AVE} \times \text{R2}) \\
   = ((0.759 + 0.831 + 0.683 + 0.730) / 4) \times (0.609) \\
   = (0.75075 \times 0.609) \\
   = 0.677
   \]

   From the calculation results, the GoF Index value is considered large because the value is more than 0.38 (Ghozali, 2014). This indicates that the overall model is appropriate.
3. Hypothesis Testing

After obtaining a structural model with good goodness of fit, the next step is to test the hypothesis. Hypothesis testing can be seen from using Bootstrap on SmartPLS by looking at the P value or P Values with an error rate of 0.05, then the results are as follows:

| Variable | Original Sample (O) | Sample Mean (M) | Standard Deviation (STDEV) | T Statistics (|O/STDEV|) | P Values |
|----------|---------------------|-----------------|-----------------------------|-----------------------------|----------|
| K3 (X1) > Employee Performance (Y) | 0.660 | 0.635 | 0.148 | 4.464 | 0.000 |
| Work Environment (X2) > Employee Performance (Y) | -0.419 | -0.402 | 0.190 | 2.205 | 0.028 |
| Compensation (X3) > Employee Performance (Y) | 0.633 | 0.642 | 0.112 | 5.665 | 0.000 |

Source: Data processing output on SmartPLS 3.3.7 (2022)

The estimation results of t-statistics are seen in the path coefficient (t-statistics) which can be seen in Figure 6 below:
Figure 6 T-Statistics Table

Figure 6 shows the T-Table that will be used in formulating the T value to be used is 114 samples and the number of variables is 4, then df = 114 - 4 so that with a df value of 110 at an error rate of 5%, the standard value is 1.981. The estimated value of the causal relationship from the tested structural model and the results of hypothesis testing with the t-value of each relationship is said to have a significant effect if the t-values 1.981 as follows:

| Hypothesis | Structural Path | t-values | Description | Conclusion |
|------------|-----------------|----------|-------------|------------|
| H1         | K3→Employee Performance | 4.464 | Data Supports Hypothesis | K3 has a significant effect on employee performance |
| H2         | Work Environment→Employee Performance | 2.205 | Data Supports Hypothesis | Work environment has a significant effect on employee performance |
| H3         | Compensation→Employee Performance | 5.665 | Data Supports Hypothesis | Compensation has a significant effect on employee performance |

Source: author's data processing (2022)

C. Discussion

1) Effect of Occupational Safety and Health on Employee Performance

The better the implementation of K3 it will affect employee performance. Based on observations of conditions in the field, employees when doing work still pay less attention to wearing clothes and safety equipment for work that have been provided. Meanwhile, superiors sometimes do not monitor continuously and periodically when employees work
on projects because superiors play a more role in carrying out tender negotiations with work partners.

From the results of the study, it was assessed the importance of the rules and application of K3 in the work that the company must pay attention to because there are still some employees who are not aware of the importance of applying K3 and the machines used have not been confirmed to be safe. This is in line with the results of research by Supriyatna (2021) which states that the factors of the application of K3 have an influence on the performance of workers. Likewise, research by Firmansyah (2021) concluded that K3 had a significant positive effect on employee performance.

2) Influence of Work Environment on Employee Performance
   It is concluded that if the work environment is good, then the employee's performance will decrease. This anomaly occurs with the previous theory, because from the original sample it is concluded that the work environment variable has a negative but significant effect on employee performance. This is concluded because the object of research is a vendor company, so there is a clash of views from employees who work in a room with working in the field. Based on observations of conditions in the field, there are several conditions of the work environment that affect employee performance. For the physical environment, temperature and weather cannot be predicted for work carried out outside the building, it is more important to look at the temperature for indoor work, namely PT SMG's head office. The room used for administrative work is not too good from the installation of air conditioners and circulation such as inadequate ventilation, including lighting related to the wattage of the lamps used. If for work in the field, the physical work environment is not really a priority for field workers, but workers refer to the work environment from a non-physical perspective, the most important thing to pay attention to is communication. Sometimes there is often miscommunication between co-workers and superiors because they are more mobile. This is also one of the reasons for the lack of supervision by superiors and employees working in the field.

   Discomfort at work is a very bad condition for workers in their activities, because workers will carry out their activities that are less than optimal and will cause a work environment that is not enthusiastic and boring, on the contrary if workers will carry out activities optimally, because the conditions of the work environment are very good. and support. In line with research from Alfiyah and Riyanto (2019), it is stated that in carrying out work, it is not only related to the physical environment, but also the non-physical environment related to good communication, the relationship between superiors and co-workers, can help in completing the quantity of work that is also provide good quality.

3) The Effect of Compensation on Employee Performance
   It is concluded that if the compensation given is not commensurate with the workload, then the employee's performance will decrease. Based on the results of the study, compensation cannot be justified, of course there are rules for giving salaries that have been set by the company. However, some employees expect an incentive bonus if the employee delivers more work than the target. There are also employees who expect an award in the form of a salary increase or position if they have worked for a certain period of time. However, the company pays less attention to this which could be a factor to increase employee motivation and performance so that employees are more active at work.

   Naturally, if compensation is the concern of employees and employees feel entitled to compensation, it should be balanced with the workload carried. If the compensation given is not appropriate, it can be estimated that the employee's performance is less stable. This is in line with research by Alfiyah and Riyanto (2019) concluding based on the incentive dimension explaining that the rewards provided by the company can increase...
employee morale and encourage them to do their jobs and duties and responsibilities well.

CONCLUSION

Based on the results of research and discussion in the previous chapter regarding the effect of K3, work environment, and compensation on employee performance at PT SMG as follows: K3 affects employee performance. From the results of the study, it was assessed the importance of the rules and application of K3 in the work that the company must pay attention to because there are still some employees who are not aware of the importance of applying K3 and the machines used have not been confirmed to be safe. The work environment has an effect on employee performance. It can be concluded that companies need to pay attention to the physical and non-physical work environment so that employee performance can be maintained. Compensation affects employee performance. It can be concluded that the compensation given at this time should be adjusted according to the workload in order to improve the performance of employees at PT SMG.

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