

The Impact of Implementing K3 (Occupational Safety and Health) and Human Resource Competency on Employee Performance at Jaya Bore Ponorogo Project Ltd.

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Abstract: *This study intended to investigate the application of K3 and Human Resources Competency contributes to employee performance of Jaya Bore Ltd employees in the Ponorogo project. The population sample consisted of Jaya Bore Ltd employees. The sampling method employed a saturated sampling technique. All of the population was tested; furthermore, this study sampled 48 respondents. The researcher collected the data collection through a survey method. The study utilized partial least squares as a data analysis tool. According to the findings, K3 and human resource competency were shown to have a major impact on employee performance for Jaya Bore Ltd employees. The details reveal that the poorer the level of implementation of K3 at work, the more inferior employee performance. Correspondingly, the lower the employees' competency level, the more lacking the employee performance Jaya Bore Ltd.*

Keywords: *K3 (Occupational Safety and Health); Human Resources Competency; Employee Performance*

I. INTRODUCTION

Performance comes from work in quality and quantity, determined by what employees have achieved in fulfilling their duties and responsibilities. Companies are consciously obliged to realize the importance of employee performance and continuously pay attention to factors that influence employee performance levels, including the occupational safety and health program (Mangkunegara in Prayogi et al. (2019). Performance in an organization is a condition that certain groups must perceive and believe to determine a company's performance level concerning the vision carried out by an organization. Performance is a work output whose development must be monitored continuously and continuously based on existing quality and quantity (Maryam & Prakosawati, 2022). Organizations or companies recognize the impact of positive and negative aspects of an operational policy. As workers, human resources are close to health and safety problems at work. Moreover, K3 (Occupational Safety and Health) can influence employee performance, thereby creating job satisfaction for workers. According to Hasibuan (2021), performance results from work that a person finalizes by conducting a given task through skill, experience, integrity and time.

K3 (occupational safety and health) issues are not only the government's responsibility but also the responsibility of all parties, including employers, workers and the community. Occupational safety and health (K3) is the most essential thing for companies because the impact of work-related accidents and illnesses harms employees and the company. According to Ibrahim and Irbayuni (2022), occupational safety and health (K3) are conditions that impact the health and safety of workers, visitors, or all components in an environment. According to Azri and Azzuhri (2020), strong K3 can increase work discipline and awareness of worker safety and health significance. Based on Akbar M.A.P & Kustini's (2021) research, K3 highly influences employee performance at the Al-Huda Written Batik House.

Apart from employee safety and health, human resource competency is another factor that influences employee performance. According to Winarno in Chotimah (2018), competence is a characteristic a person is obliged to bear, which will be gauged later to determine the employee's behavior and performance. According to Safaah (2019), human resource competency has five types, specifically, task achievements, which are related to good performance, and relationship, which is an individual's intrinsic competency and connects how people think, feel, learn and develop. Managerial is a competency related to management, supervision, empowering others, and leadership related to the organization's leading. According to Habiburrahman & Zhavira (2021), human resource competencies are closely related to knowledge, skills and human characteristics that directly affect performance.

Jaya Bore Ltd is developing and operating in air drilling services (Deep Wells) and Stross Drilling (Pile Bore). It has over 20 years of experience in the drilling contractor industry and has worked closely with state-owned and private client units. Jaya Bore Ltd. was established in 1980 as a CV corporate entity with a well drilling business and later evolved into a deep drilling well firm (depths of 120 m and more than 120m).

Practically, Jaya Bore Ltd employees still frequently experience incidents; according to its supervisors, there are still incidents such as employees experiencing work accidents and absenteeism due to illness. These accidents are caused by discipline towards regulations, ability to use tools and lack of knowledge about the dangers or risks posed by tools and environmental factors. K3 issues still need attention because employees still need to implement K3 well, so many employees still experience injuries, which can hinder the realization of work.

Apart from implementing employee safety and health, other factors can influence employee performance, such as the competency of human resources in the company. The results of interviews reveal that several employees with knowledge and skills still felt less competent when carrying out tasks, in employees who carry out a task with knowledge and skills that they feel are less competent. Employees who carry out a task with sufficient knowledge and skills will maintain the quality of the work produced, which can also make time more efficient, making the work ineffective. The company will face a detrimental situation if the employees are not able to carry out the task effectively and efficiently. Therefore, the results strongly prove that human resource competency at Jaya Bore Ltd has indications of impacting employee performance, which the company should be obliged to give more attention as material for further evaluation.

II. THEORITICAL REVIEW

K3 (Occupational Safety and Health)

K3 is a condition and effort to ensure the physical and spiritual integrity and embodiment of the workforce and humans in general, the results of work and culture towards a righteous and prosperous society (T. Hani Handoko in (Dewi & Sundari, 2021). Safety and health work is an activity to protect the safety and health of workers through action to avoid work accidents and illnesses caused by work (Qurbani & Selviyana, 2018). According to Simajuntak, as cited in (Ritoga et al., 2022), work safety and health is an endeavour to prevent accidents and occupational diseases which can cause death, disability or illness and psychological disorders the workers suffer. The following are indicators of K3 according to T. Hani Handoko, as cited in (Dewi & Sundari, 2021) which include: (1) Making safe working conditions, (2) Education and training, (3) Work equipment and clothing, (4) Health services.

Human Resources Competency

Human resource competency is related to knowledge, skills, abilities and personality characteristics directly influencing performance (Mangkunegara in (Dwiyanti et al., 2019). According to Emron, Anwar & Komariah (2017), competency is a person's ability to maximize work and achieve excellence based on knowledge, skills and attitudes. Sutrisno, as cited in (Prayogi et al., 2019), defines competency as an ability based on skills and knowledge supported by work attitudes and application in carrying out a task and job which refers to the specified requirements. Human resource competency indicators, according to Dwiyanti et al (2019): (1) Knowledge, (2) Ability, (3) Skills.

Employee Performance

Mangkunegara, as cited in Jannati (2020), stated that employee performance is the fundamental behavior shown by each employee as produced work performance by their role within the company. Completing the tasks and responsibilities of a group of people in an organization can also be called performance (Silaen, 2021). The organizational goals will potentially be achieved if employees have strong work performance. Khairani & Yulianti (2022) noted that performance results from work in terms of quality and quantity an employee achieves in carrying out the duties according to each responsibility. According to Jannati (2020), employee performance differs as follows: (1) Quality of Work, (2) Quantity of Work, (3) Execution of

Duties, (4) Responsibility.

III. METHODOLOGY

The further research method employed quantitative methods to interview 48 Jaya Bore Ponorogo Project Ltd employees. A sample was determined using a non-probability sampling technique through saturated sampling, the technique for determining if all population members were used as samples. The researcher obtained the data by distributing a paper questionnaire containing several statements related to the research. The PLS (Partial Least Square) method with SmartPLS was also utilized to analyze the data.

IV. RESULTS

Validity Test

The convergent validity test was completed through an analysis of the Loading Factor value of each indicator on its construct with a minimum limit of 0.70. Figure 1 displays a value <0.70 even though it is >0.50, so the figure implies that the measurement fulfils the convergent validity criteria (Chin, as cited in Trenggonowati & Kulsum, 2018).

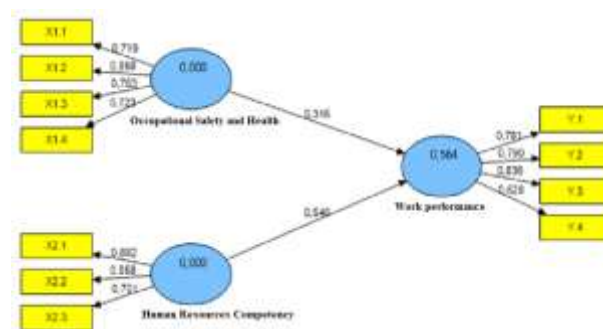


Figure 1. PLS Model Testing

The Average Variance Extracted (AVE) value for each construct, with a minimum of 0.70, is also used to measure convergent validity. Table 1 reveals that several AVE values are less than 0.70, even though some are more than 0.50. The proofs indicate that the measurement is precisely surpassed for convergent validity. (Chin as cited by Trenggonowati & Kulsum, 2018).

Table 1. Average Variance Extracted (AVE)

	AVE
Occupational Safety and Health (X1)	0,585652
Employee Performance (Y)	0,553036
Human Resources Competency (X2)	0,668919

Table 2. Inner Model

	R Square
Occupational Safety and Health (X1)	
Employee Performance (Y)	0,563850
Human Resources Competency (X2)	

Several tests are conducted to check how well the model works or fits. The primary test is R-square. Ghazali and Latan, as cited in (Pura & Madiawati, 2021), expressed that 0.75 indicates a strong model, 0.50 indicates a medium model, and 0.25 indicates a weak model. R², as displayed in Table 4, is 0.56, indicating the model is medium. 56.3% of employee performance is influenced by the K3 (Occupational Safety and Health) and Human Resource Competency variables. In comparison, other variables influence the remaining 43.7%.

Prediction Relevance (Q²) or Stone-Geisser's test is vital to validate the model's predictive ability. Table 4 depicts the Q² value > 0. Therefore, the predictive ability of the independent variable X1 and X2 models is relevant and can predict the dependent variable Y.

Hypothesis Testing

The direct effect significance test works as hypothesis testing. This test aims to see the effect the independent variable has on the dependent variable. There are three ways to test hypotheses: t-tests, p-values, and original samples. In this research, hypothesis testing was carried out directly using the SEM PLS analysis method.

Table 3. Hypothesis Testing

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (O/STERR)	P Value
Occupational Safety and Health (X1) -> Employee Performance (Y)	0,314561	0,319775	0,068865	4,567778	0,000
Human Resources Competency (X2) -> Employee Performance (Y)	0,545696	0,553191	0,074561	7,318807	0,000

Occupational Safety and Health’s Impact on Employee Performance

The obtained hypothesis proves that occupational safety and health statistically and positively impact employee performance. This suggests that the higher safety and health execution for Jaya Bore Ltd employees will boost the employees' performance. The hypothesis test of the indicators indicates that the most influence is training and education. Thus, in K3 training and education, employees will use Personal Protective Equipment (PPE) under Standard Operational Procedures, thereby minimizing work accidents. The phenomenon that occurs at Jaya Bore Ltd, which provides a form of K3 training and education to create employees who carry out projects safely, is perceived by employees as the most crucial thing for employees in the aspect of knowledge regarding occupational safety and health so that work carried out as a team can be maximized and produce results. Work effectively to achieve predetermined project completion time targets. Moreover, the results demonstrate that K3 (Occupational safety and health) has a very influential impact on employee performance, which is also supported by other studies by Nuning Nurna Dewi and Sundari (2021), Siong June and Mauli Siagian (2020), Muhammad Zulfikar, Muhammad Wadud, M. Kurniawan (2022). The studies prove that the K3 variable (occupational safety and health) is a factor that influences employee performance.

Human Resource Competency's Impact on Employee Performance

The obtained hypothesis proves that the human resource competency variable statistically and positively impacts employee performance. The hypothesis suggests that the higher Jaya Bore Ltd human resources competence will increase the performance. Practically, at Jaya Bore Ltd, employees who need more knowledge or still need more knowledge in drilling techniques and other project work affect project work taking longer than when assigning employees who already have more knowledge. Such a factor causes the realization

of the drilling project to exceed the estimated deadline since Jaya Bore Ltd's competent human resources employees still need further training in completing their work. The results further demonstrate the immense impact of human resource competency on employee performance, which is also supported by other studies by Muhammad Zulfikar, Muhammad Wadud, M. Kurniawan (2022), Naputra & Irbayuni (2022) emphasizing that the human resource competency variable becomes a factor that impacts employee performance.

V. CONCLUSION

The implementation of K3 by employees through employee training will further implement K3 in the company. K3 (occupational safety and health) is shown to have effects on the performance of Jaya Bore Ltd employees. The results strongly prove that the better the implementation of K3 (safety and health) for Jaya Bore Ltd employees, the better performance produced by employees. Human resource competency fully affects the performance of Jaya Bore Ltd employees. Moreover, the findings also demonstrate that the higher the competency of Hadi Jaya Boreland Ltd's human resources, the more promising the performance will follow.

VI. REFERENCES

- [1] Akbar, M. A.P., & Kustini. (2021). Effect of Occupational Safety and Health (K3) and Work Motivation on Employee Performance at Rumah Batik Tulis Al-Huda Sidoarjo. *Budapest International Research and Critics Institute-Journal (BIRCJJournal)*.
- [2] Azri, F. W., & Azzuhri, M. (2020). Pengaruh Budaya K3 Terhadap Kinerja Karyawan Yang Dimediasi Oleh Motivasi Kerja (Studi Pada Rumah Sakit Umum Daerah (RSUD) Sumbawa. *Jurnal Ilmiah Mahasiswa FEB UB*, 6(2), 1-13.
- [3] Chotimah, C. (2018). Pengaruh Kompetensi Dan K3 (Keselamatan Dan Kesehatan Kerja) Terhadap Kinerja Karyawan Pada Pt. Lotus Indah Textile Industries Bagian Winding Di Nganjuk. *Jurnal Ilmu Manajemen Volume 6 Nomor 3*.
- [4] Dewi, N. N., & Sundari, S. (2021). Pengaruh (K3) Dan Motivasi Terhadap Kinerja Karyawan Di Perusahaan. *IQTISHA Dequity Jurnal MANAJEMEN*.
- [5] Dwiyanti, K. (2019). Peningkatan Penguatan Pendidikan Karakter Siswa Melalui Pemberdayaan Kompetensi Sosial Dan Kepribadian Guru. *INTERNATIONAL JOURNAL OF COMMUNITY SERVICE LEARNING*.
- [6] Emron, E., Anwar, Y., & Komariyah, I. (2017). *Manajemen Sumber Daya Manusia*. Alfabeta: Bandung.
- [7] Habiburrahman, & Zhavira, F. (2021). Pengaruh Kompetensi Sumber Daya Manusia Dan Disiplin Kerja Terhadap Kinerja Pegawai Dinas Bina Marga Dan Bina Konstruksi Provinsi Lampung. *Jurnal Manajemen Dan Bisnis*.
- [8] Ibrahim, N. N., & Irbayuni, S. (2022). Pengaruh K3 (Keselamatan Dan Kesehatan Kerja) Dan Kompetensi Sumber Daya Manusia Terhadap Kinerja Karyawan Pada PT. Bambang Djaja. *Scientific Journal Of Reflection : Economic, Accounting, Management And Business*.
- [9] Jannati. (2020). Peran Pemberdayaan Dan Keterlibatan Kerja Terhadap Kepuasan Kerja Dan Kinerja. *Jurnal Bisnis Terapan*.
- [10] June, S., & Siagian, M. (2020). Pengaruh Keselamatan Dan Kesehatan Kerja Dan Lingkungan Kerja Terhadap Kinerja Karyawan Pt Lautan Lestari Shipyard . *EJurnal Apresiasi Ekonomi Volume 8, Nomor 3*. Juniarti, N. H., & Mudayana, A. A. (2018). Penerapan Standar Keselamatan Pasien Di Rumah Sakit Umum Daerah Provinsi Nusa Tenggara Barat. *Jurnal Kesehatan*.
- [11] Khairani, S., & Yulianti, P. (2022). Pengaruh Keselamatan Dan Kesehatan Kerja (K3) Terhadap Kinerja Karyawan Pada Masa Pandemi Covid-19 Pada Pt Bank Syariah Mandiri Cabang Padang. *Jurnal Penelitian Dan Pengkajian Ilmiah Sosial Budaya*.
- [12] Maryam, & Prakosawati. (2022). Pengaruh Budaya Kesehatan Dan Keselamatan Kerja (K3) Terhadap Kinerja Karyawan PT. Angkasa Pura Logistik Pada Masa Pandemi COVID-19 Di Bandar Udara Internasional Yogyakarta, Kulon Progo. *Reslaj: Religion Education Social Laa Roiba Journal*.
- [13] Parashakti, R. D., & Putriawati. (2020). Pengaruh Keselamatan Dan Kesehatan Kerja (K3), Lingkungan Kerja Dan Beban Kerja Terhadap Kinerja Karyawan. *Jurnal Ilmu Manajemen Terapan*.
- [14] Prayogi, M. A., Lesmana, M. T., & Siregar, L. H. (2019). Pengaruh Kompetensi Dan Disiplin Kerja Terhadap Kinerja Pegawai. *Festival Riset Ilmiah Manajemen & Akuntansi*.
- [15] Qurbani, D., & Selviyana, U. (2018). Pengaruh Keselamatan & Kesehatan Kerja (K3) Terhadap Kinerja Karyawan Pada PT. Trakindo Utama Cabang BSD. *FORKAMMA Jurnal Ilmiah Manajemen*.

- [16] SAFA'AH, E. M. (2019). Pengaruh Kompetensi Sumber Daya Manusia (Sdm) Terhadap Kinerja Karyawan. *Jurnal Ilmu Manajemen*.
- [17] Salami. (2019). *Kesehatan Dan Keselamatan Lingkungan Kerja*. Yogyakarta: University Press Yogyakarta.
- [18] SARI, M. D., & SURATMAN, B. (2019). Pengaruh Keselamatan Dan Kesehatan Kerja (K3) Dan Lingkungan Kerja Terhadap Kinerja Karyawan Produksi Di UD. Mulia Jaya Taman Sidoarjo. *Jurnal Pendidikan Administrasi Perkantoran (JPAP)*.
- [19] Silaen, N. (2021). *Kinerja Karyawan*. Jakarta: CV Widina Media Utama.
- [20] Suwardi. (2018). *Pedoman Praktis K3LH Keselamatan Dan Kesehatan Kerja Dan Lingkungan Hidup*. Yogyakarta: PENERBIT GAVA MEDIA.
- [21] Toyibatussalamah. (2022). Pengaruh Tingkat Pendidikan Terhadap Kinerja Karyawan Pada Rumah Sakit Muhammadiyah (RSM) Siti Khodijah Gurah Kediri. *Journal Of Sharia Economic And Islamic Jurisprudence*, 1(1), 1-15.
- [22] Umam, K., Hidayati, N., Saputro, Y. A., & Zarah, D. F. (2020). Kajian Sistem Manajemen K3 Dan Tingkat Kecelakaan Kerja Pada Pekerjaan Struktur Baja Di Pltu Tanjung Jati B Unit 5 & 6 Jepara. *Jurnal DISPROTEK*.