Impact of Employee Placement, Motivation, and Career Development on Performance and Productivity at Bank XYZ Using PLS-SEM

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Abstract. The role of employees is crucial in achieving the company's goals, as employees perform various activities from input to output in customer service. The purpose of this research is to determine the influence of employee placement, motivation, and career development variables on employee performance and employee productivity at Bank XYZ. This research employs the PLS-SEM method implemented using the statistical software SmartPLS. The results of this study show that the employee placement variable has p-values of 0.033 and t-values of 2.137 on the employee performance variable. The employee placement variable has p-values of 0.819 and t-values of 0.229 on employee productivity. The motivation variable has p-values of 0.000 and t-values of 4.141 on employee performance. The motivation variable has p-values of 0.027 and t-values of 2.217 on employee productivity. The career development variable has p-values of 0.395 and t-values of 0.851 on employee performance. The career development variable has p-values of 0.688 and t-values of 0.402 on employee productivity. The employee performance variable has p-values of 0.000 and t-values of 4.273 on employee productivity.

1. Introduction

Companies or organizations must have employees with good competence and reliability, as human resources (HR) play a vital role in achieving the company's success and excellence (Gustiana et al., 2022). In this process, it is important for the company to ensure that the employees placed are competent and aligned with the company's needs (Fabiolatesly et al., 2021). Employee performance can be a benchmark for whether the human resources in a company have played a role in the company's progress or not (Setyo Widodo & Yandi, 2022). Productive employees help an organization increase its competitiveness, better meet customer needs, increase profits, and ensure long-term growth (Novianti, 2023). Work motivation encourages individuals to focus their attention and efforts on the tasks they are performing (Caissar et al., 2022). Efforts by employees to have good performance and productivity in fulfilling their responsibilities involve understanding career development. Career development is the

advancement of an employee's status or position within an organization (Hamid et al., 2021).

Bank XYZ is a banking company that has grown and serves a diverse range of customers from various segments of society. In preliminary research involving observations and interviews with supervisors at Bank XYZ, several issues related to employee performance were identified. Employees lacked an understanding of procedures needed to meet targets, leading to operational or administrative errors and reduced loyalty. Employee skills or education often didn't align with their tasks, affecting work quality and operational efficiency. Coordination issues among employees caused delays, reducing daily operational efficiency. Therefore, the purpose of this study is to determine the influence of employee placement, motivation, and career development variables on employee performance and productivity at Bank XYZ. Although numerous studies have explored individual factors such as motivation or career development, few have integrated employee placement, motivation, and career development into a single analytical framework. This study provides a holistic view of how these three factors collectively influence employee performance and productivity.

2. Methods

This study uses a quantitative method by distributing questionnaires to 39 employees of Bank XYZ to obtain primary data. The five variables used in this research are Employee Placement (X1), measured through indicators of educational background, job knowledge, job skills, and work experience (Siahaan & Bahri, 2019). The Motivation variable (X2) is measured with indicators of compensation, rewards, employee empowerment, and social driving factors (Nguyen et al., 2020). The Career Development variable (X3) is measured through indicators of loyalty, job performance, and promotion (Al Rinadra et al., 2023). The Employee Performance variable (Y1) is measured with indicators of quality, work quantity, target achievement, timeliness, and effectiveness (Goni et al., 2021). The Employee Productivity variable (Y2) is measured through indicators of competence, efficiency, result improvement, and self-development (Baiti et al., 2020). In PLS analysis, focus is given to two main aspects: measurement models that test the measurement quality of variables, and structural models that explore the relationships between these variables (Rahadi, 2023). The evaluation stages conducted include the measurement model (outer model) and the structural model (inner model) (Purwanti & Chasanah, 2022). The selection of indicators was conducted through observation and interviews with employees of Bank XYZ. The researchers chose PLS-SEM as the analytical method because PLS-SEM can process data with a relatively small sample size while handling complex models. In addressing research issues, problem-solving steps are outlined in the accompanying flowchart.
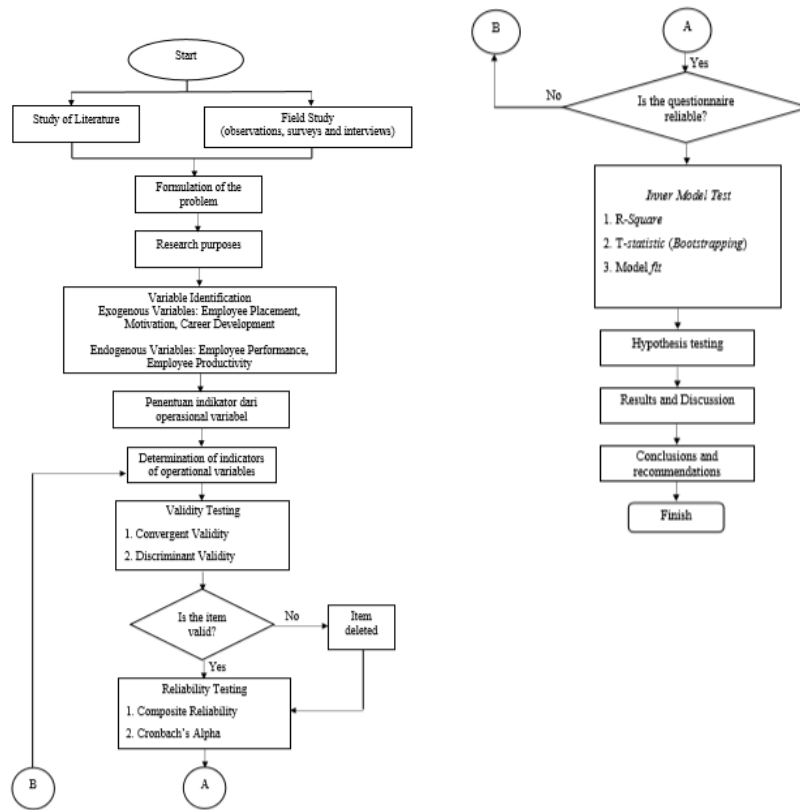
Figure 1. Flowchart

3. Results and Discussion

The PLS-SEM methodology can be more broadly applied within organizations to understand the complex relationships between various factors affecting performance and productivity (Wijaya & Sari, 2020). Bank XYZ can implement this methodology for further analysis in various departments or divisions. The sample framework in the study will be stratified based on several criteria. The criteria used in this sampling technique include gender, age, highest education level. The determination of these criteria is based on the research needs as follows.

Table 1. Respondent Distribution Based on Gender

Gender	Number of Respondents	Percentage
Male	15	64,1%
Female	14	35,9%
Total	39	100%

The distribution of respondents based on gender was obtained from the first part of the questionnaire which contained questions related to the respondent's profile. The results obtained were 25 male respondents with a percentage of 64.1%. The results showed that 14 respondents were female with a percentage of 35.9%.

Table 2. Respondent Distribution Based on Age

| Age	Number of Respondents	Percentage
15 – 25 years old	0	0%
26 – 35 years old	15	38,5%
36 – 45 years old	22	56,4%
46 – 55 years old	2	5,1%
Total	39	100%

Distribution of respondents based on age, there were no respondents aged 15 years - 25 years, respondents aged 26 years - 35 years were 15 people with a percentage of 38.5%, respondents aged 36 years - 45 years were 22 people with a percentage of 56.4%, 2 respondents aged 46 years – 55 years with a percentage of 5.1%

Table 3. Respondent Distribution Based on Highest Education Level

Education Level	Number of Respondents	Percentage
High School/Equivalent	0	0%
Associate Degree	1	2,6%
Bachelor's Degree	37	94,8%
Master's Degree	1	2,6%
Doctoral Degree	0	0%
Total	39	100%

Distribution of respondents based on frequency of latest education, there were no respondents with a high school/equivalent education, 1 respondent with a D1/D2/D3 education with a percentage of 2.6%, 37 respondents with a bachelor's degree with a percentage of 94.8%. %, there were 1 respondents with a Master's degree with a percentage of 2.6%, and there were no respondents with a Master's degree. Based on the collected research data, the data processing results using SmartPLS are as follows:
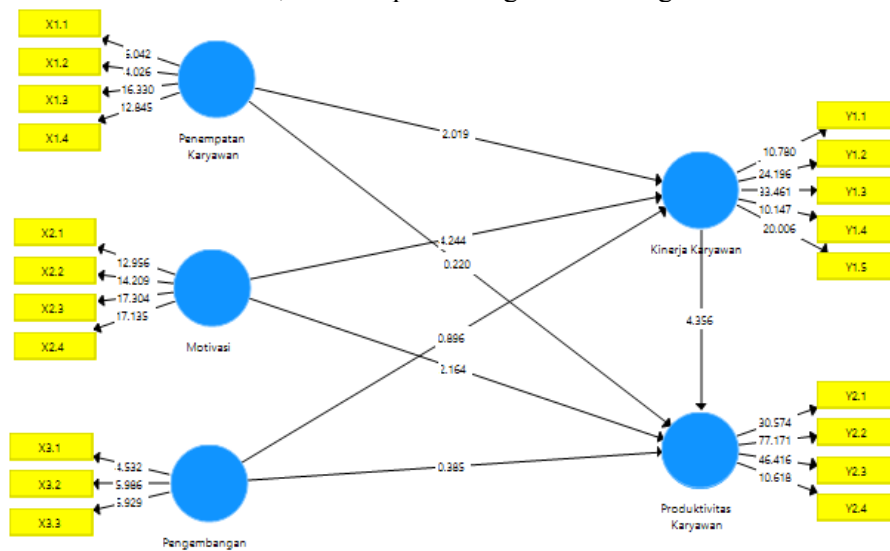
Figure 2. *Output SmartPLS*

3.1. Outer Model Testing
The measurement model (outer model) defines how each indicator relates to other variables (Priyadi et al., 2020). Validity testing is conducted to determine the extent to which a measuring instrument can

measure the actual condition (Manullang & Mesra, 2024). Therefore, in this study, validity and reliability tests were conducted.

Table 4. Validity Testing Result

Indicators	Variables					
	Employee Placement	Motivation	Career Development	Employee Performance	Employee Productivity	Exp.
X1.1	**0,722**	0,308	0,093	0,198	0,132	Valid
X1.2	**0,707**	0,264	0,084	0,298	0,114	Valid
X1.3	**0,923**	0,413	0,140	0,469	0,442	Valid
X1.4	**0,888**	0,306	0,233	0,327	0,377	Valid
X2.1	0,449	**0,811**	0,358	0,476	0,647	Valid
X2.2	0,221	**0,847**	0,434	0,366	0,448	Valid
X2.3	0,300	**0,845**	0,145	0,580	0,495	Valid
X2.4	0,344	**0,850**	0,248	0,589	0,497	Valid
X3.1	-0,023	0,209	**0,864**	0,218	0,045	Valid
X3.2	-0,016	0,314	**0,903**	0,199	0,227	Valid
X3.3	0,360	0,360	**0,939**	0,377	0,259	Valid
Y1.1	0,376	0,527	0,298	**0,824**	0,538	Valid
Y1.2	0,283	0,505	0,161	**0,897**	0,654	Valid
Y1.3	0,431	0,485	0,279	**0,925**	0,603	Valid
Y1.4	0,283	0,481	0,399	**0,807**	0,514	Valid
Y1.5	0,431	0,610	0,252	**0,863**	0,843	Valid
Y2.1	0,356	0,627	0,179	0,682	**0,919**	Valid
Y2.2	0,384	0,640	0,231	0,735	**0,959**	Valid
Y2.3	0,283	0,534	0,174	0,705	**0,944**	Valid
Y2.4	0,377	0,515	0,242	0,627	**0,862**	Valid

The table above shows that the cross-loading results for each indicator on its construct have higher values compared to the cross-loading results on other constructs. This means that each construct or latent variable has good discriminant validity. This is evident from the indicators of the construct having higher values compared to indicators in other blocks.

Table 5. Reliability Testing Result

Variables	Cronbach's Alpha	Composite Reliability	Explanation
Employee Placement	0,841	0,887	Reliable
Motivation	0,860	0,904	Reliable
Career Development	0,893	0,929	Reliable
Employee Performance	0,915	0,936	Reliable
Employee Productivity	0,941	0,958	Reliable

Based on the table above, it shows that the Cronbach's alpha results of this research can be said to be reliable. Because the Cronbach's alpha value for each construct has a value of more than 0.7. This means that every variable in the study that the researcher conducted has positive reliability. The composite reliability results of this research can be said to be reliable. Because the composite reliability value for each variable is higher than 0.6. This means that every variable in the study that the researcher conducted has positive reliability. The results of a high reliability test indicate that the measurement instrument has good consistency in measuring the intended construct or variable (Waluyo & Rahman, 2020).

3.2. Inner Model Testing

The inner model describes the relationship between latent constructs that have been identified in the research, determining the direction and strength of influence of one construct on other constructs (Evi & Rachbini, 2022).

Table 6. R-Square Testing Result

Variables	R Square
Employee Performance (Y1)	0,421
Employee Productivity (Y2)	0,611

Based on the results of the R-Square test, it shows that the R-square value of variable Y1 is 0.421, which means that the variables of employee placement, motivation and career development influence employee performance by 42.1% and the rest is influenced by other factors that were not studied. Meanwhile, the R-square value of the Y2 variable is 0.611, which means that the variables of employee placement, motivation, career development and employee performance influence productivity by 61.1% and the rest is influenced by other factors not examined.

Table 7. Hypothesis Testing Result

Variables	P Values	P Values Frrom Table	T Values	T Values From Table	Explanation
X1 -> Y1	0,033	0,05	2,137	1,96	Accepted
X1 -> Y2	0,819	0,05	0,229	1,96	Rejected
X2 -> Y1	0,000	0,05	4,141	1,96	Accepted
X2 -> Y2	0,027	0,05	2,217	1,96	Accepted
X3 -> Y1	0,395	0,05	0,851	1,96	Rejected
X3 -> Y2	0,688	0,05	0,402	1,96	Rejected
Y1 -> Y2	0,000	0,05	4,273	1,96	Accepted

In this method, statistical testing is conducted to determine the significance of relationships between variables and to test the research hypotheses (Fauzi & Akbar, 2023). Based on table 7 above, it can be seen that the employee placement variable has a p-value of 0.033 and a t-value of 2.137 for the employee performance variable. The employee placement variable has p-values of 0.819 and t-values of 0.229 on employee productivity. The motivation variable has p-values of 0.000 and t-values of 4.141 on employee performance. The motivation variable has p-values of 0.027 and t-values of 2.217 on employee productivity. The career development variable has p-values of 0.395 and t-values of 0.851 on employee performance. The career development variable has p-values of 0.688 and t-values of 0.402 on employee productivity. The employee performance variable has a p-value of 0.000 and a t-value of 4.273 on employee productivity.

Table 8. Model Fit Result

	Saturated Model	Estimated Model
Chi-Square	324,890	324,890

Based on the results of the fit model, the chi-square value in the saturated model and estimated model is 324.890 respectively. This shows that there is no difference between the hypothesized model and the observed data. Thus, this model can be considered fit, supporting the validity of the constructs and relationships tested in the research. The fit model equation obtained in this research is Y1 = 2.019 X1 + 4.244 X2 + 0.896 There is also the equation Y2 = 8,794 X1 + 18,486 X2 + 3,902. This study is limited to Bank XYZ and may not fully reflect conditions in other organizations or industries. Future research

could test this model in various types of organizations and industries to determine if similar findings can be identified.

4. Conclusion

The results of research regarding "The Effect of Employee Placement, Motivation, Career Development on Employee Performance and Employee Productivity Using the Partial Least Squares Method at Bank XYZ" produced several conclusions that have been analyzed, namely Employee Placement (X1) has a positive and significant effect on performance employees (Y1), Employee placement (X1) has no positive and significant effect on employee productivity (Y2), Motivation (X2) has a positive and significant effect on employee performance (Y1), Motivation (X2) has a positive and significant effect on employee productivity (Y2), Career development (X3) has no positive and significant effect on employee performance (Y1), Career development (X3) has no positive and significant effect on employee productivity (Y2), Employee performance (Y1) has a positive and significant effect on employee productivity (Y2). For further research, integrating additional variables within the human resources domain that could enhance employee performance and productivity is advisable (Zulfikar, 2022). By including these aspects, the study can investigate how factors such as job satisfaction, organizational commitment, competency development, and work-life balance management comprehensively influence employee outcomes.

References

[1]   Al Rinadra, M., Fauzi, A., Galvanis, W. J., Unwalki, J., Awwaby, M., Satria, H., & Darmawan, I. (2023). Analisis Manajemen Talenta, Pengembangan Karier, dan Pengembangan Talenta Terhadap Kinerja Karyawan (Tinjauan Literatur). *Jurnal Ilmu Manajemen Terapan*, vol. 4, no.6, 752–767..

[2]   Baiti, K. N., Djumali, D., & Kustiyah, E. (2020). Produktivitas Kerja Karyawan Ditinjau dari Motivasi, Disiplin Kerja dan Lingkungan pada PT. Iskandar Indah Printing Textile Surakarta. *Jurnal Ilmiah Edunomika*, *4*(01), 69–87

[3]   Caissar, C., Hardiyana, A., Nurhadian, A. F., & Kadir, K. (2022). Pengaruh Motivasi Kerja Dan Disiplin Kerja Terhadap Kinerja Karyawan Pada PT. Antam Tbk (UIBPEI) Pongkor. *Acman: Accounting and Management Journal*, *2*(1), 11–19.

[4]   Evi, T., & Rachbini, W. (2022). Partial Least Squares (Teori Dan Praktek). Sukoharjo: Tahta Media Group.

[5]   Fabiolatesly, N., Pio, R. J., & Sambul, S. (2021). Penempatan Kerja dan Kepuasan Kerja Kaitannya Dengan Kinerja Karyawan PT PLN Persero Wilayah Manado. *Journal Productivity*, *2*(6), 494–498.

[6]   Fauzi, A., Akbar, F. M., Cahyaningtyas, F., & Adi, L. (2023). Pengaruh Motivasi , Kepuasan Kerja , dan Disiplin Kerja Terhadap Produktivitas Kerja Karyawan. *Jurnal Ilmu Multidisiplin*, *1*(4), 1007–1012.

[7]   Goni, H. G., Manoppo, W., & Rogahang, J. (2021). Pengaruh Motivasi Kerja terhadap Peningkatan Kinerja Karyawan pada PT. Bank Rakyat Indonesia Cabang Tahuna. *Journal Productivity*, 2(4), 330–335.

[8]   Gustiana, R., Hidayat, T., & Fauzi, A. (2022). Pelatihan Dan Pengembangan Sumber Daya Manusia (Suatu Kajian Literatur Review Ilmu Manajemen Sumber Daya Manusia). *Jurnal Ekonomi Manajemen Sistem Informasi*, *3*(6), 657–666.

[9]   Hamid, N., Hakim, A. A. A. A., & Shaleha, W. M. (2021). Etos Kerja Dan Pengembangan Karier

Terhadap Komitmen Organisasi Karyawan Pada Hotel Claro Kota Kendari. *Jurnal Valuasi: Jurnal Ilmiah Ilmu Manajemen Dan Kewirausahaan*, *1*(1), 200–215.

[10] Manullang, S., & Mesra, T. (2024). Penerapan Sistem Manajemen Rantai Pasok UKM Dodol Nenas dengan Menggunakan Metode Partial Least Square. *Jurnal Industri, Manajemen, Dan Rekayasa Sistem Industri*, *2*(2), 60–68.

[11] Nguyen, H. M., & Nguyen, L. V. (2023). Employer Attractiveness, Employee Engagement and Employee Performance. *International Journal of Productivity and Performance Management*, *72*(10), 2859–2881.

[12] Novianti, & Situmorang, I. R. (2023). Pengaruh Budaya Organisasi Dan Lingkungan Kerja Terhadap Produktivitas Karyawan Outsource Dengan Retensi Karyawan Sebagai Variabel Intervening. *Journal Of Information System and Management*, *2*(4), 1–9.

[13] Priyadi, D. T., Sumardjo, M., & Iman Mulyono, S. (2020). Pengaruh Kepuasan Kerja, Komitmen Organisasional, Dan Job Insecurity Terhadap Organizational Citizenship Behaviour (Ocb) (Studi Pada Pegawai Non-Pns Kementerian Sosial Ri). *Jurnal Ilmu Manajemen Terapan*, *2*(1), 10–22.

[14] Purwanti, Y., & Chasanah, A. N. (2022). Analisis Motivasi Pelajar Indonesia Melanjutkan Studi di Jepang dengan Structural Equational Modeling Partial Least Square. *Jurnal Pembangunan Manusia Dan Kebudayaan*, *2*(2), 114–123.

[15] Rahadi, D. R. (2023). Pengantar Partial Least Squares Structural Equation Model (PLS-SEM). Tasikmalaya: Lentera Ilmu Madani.

[16] Setyo Widodo, D., & Yandi, A. (2022). Model Kinerja Karyawan: Kompetensi, Kompensasi dan Motivasi, (Literature Review MSDM). *Jurnal Ilmu Multidisplin*, *1*(1), 1–14.

[17] Siagian, H. P. I., & Pohan, Y. A. (2024). Pengaruh Latar Belakang Pendidikan, Penempatan Karyawan, dan Pengalaman Kerja Terhadap Produktivitas Karyawan Pada PT. Multi Mas Chemindo. *Jurnal Widya*, *5*(1), 15–29.

[18] Waluyo, M., dan Rahman, M (2020). Mudah Cepat Tepat dalam Aplikasi Structural Equation Modelling (Edisi Revisi). Batu: Penerbit Literasi Nusantara.

[19] Wijaya, E., & Sari, P. P. (2020). Pengaruh Penilaian Kinerja dan Motivasi Terhadap Produktivitas Pegawai Pada BKDPSDM Kabupaten Kepahiang. *Creative Research Management Journal*, *3*(1), 63–76.

[20] Zulfikar, M., Wadud, M., & Kurniawan, M. (2022). Pengaruh Keselamatan dan Kesehatan Kerja Karyawan terhadap Produktivitas Kerja Karyawan Bagian Gudang PT Muara Dua Kota Palembang. *Jurnal Nasional Manajemen Pemasaran & SDM*, *3*(1), 19–25.