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อิทธิพลของระบบการปฏิบัติงานที่ดีและความเกี่ยวพันของพนักงานที่มีผลต่อการคงอยู่ของพนักงานวิสาหกิจขนาดย่อมภาคธุรกิจการผลิตในพื้นที่เขตปริมณฑล

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บทคัดย่อ

การวิจัยนี้มุ่งศึกษาอิทธิพลของระบบการปฏิบัติงานที่ดีและความเกี่ยวพันของพนักงานที่มีผลต่อการคงอยู่ของพนักงานวิสาหกิจขนาดย่อมภาคธุรกิจการผลิตในพื้นที่เขตปริมณฑล กลุ่มตัวอย่างที่ใช้เป็นพนักงานที่ปฏิบัติงานในวิสาหกิจขนาดย่อมภาคธุรกิจการผลิตที่ได้จดทะเบียนกับกรมโรงงานอุตสาหกรรมในพื้นที่เขตปริมณฑล จำนวน 400 คน โดยมีแบบสอบถามเป็นเครื่องมือวิจัย วิเคราะห์ข้อมูลด้วยค่าร้อยละ ค่าเฉลี่ย ส่วนเบี่ยงเบนมาตรฐาน และการวิเคราะห์สมการโครงสร้าง ผลการวิจัยพบว่า ระบบการปฏิบัติงานที่ดี ความเกี่ยวพันของพนักงาน และการคงอยู่ของพนักงานมีค่าเฉลี่ยโดยรวมอยู่ในระดับมาก โดยระบบการปฏิบัติงานที่ดีมีผลทางตรงต่อความเกี่ยวพันของพนักงานด้านความขยันขันแข็ง การอุทิศตน ความเป็นหนึ่งเดียวกับงาน และการคงอยู่ของพนักงาน ส่วนความเกี่ยวพันของพนักงานด้านความขยันขันแข็งมีผลทางตรงต่อการคงอยู่ของพนักงาน แต่ความเกี่ยวพันของพนักงานด้านการอุทิศตนและความเป็นหนึ่งเดียวกับงานไม่มีผลทางตรงต่อความเกี่ยวพันของพนักงาน ซึ่งข้อค้นพบที่ได้นี้สามารถทำให้ทราบข้อมูลของระบบการปฏิบัติงานที่ดีของพนักงานและความเกี่ยวพันของพนักงานที่สามารถทำให้พนักงานคงอยู่ในองค์กร

คำสำคัญ: ระบบการปฏิบัติงานที่ดี ความเกี่ยวพันของพนักงาน การคงอยู่ของพนักงาน

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THE INFLUENCE OF HIGH-PERFORMANCE WORK SYSTEMS AND EMPLOYEE ENGAGEMENT ON EMPLOYEE RETENTION IN SMALL ENTERPRISES IN THE MANUFACTURING SECTOR IN METROPOLITAN AREAS

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Abstract

This research aimed to investigate the influence of high-performance work systems and employee engagement on the employee retention of small enterprises in the manufacturing sector in metropolitan areas. The samples included 400 employees working in small enterprises registered with the Department of Industrial Works (DIW) in metropolitan areas. The research tool used in this study was a questionnaire. Statistical analysis was conducted by using percentage, means, standard deviation, and Structural Equation Modelling (SEM) analyses. The research findings indicated that high-performance work systems (HPWS), employee engagement, and employee retention had overall high mean values. The high-performance work systems had a direct effect on employee engagement in terms of vigor, dedication, and absorption, as well as on employee retention. Furthermore, employee engagement in terms of vigor directly affected employee retention; however, employee engagement in terms of dedication and absorption does not directly influence employee engagement. These findings provided insights into the high-performance work systems of employees and the employee engagement that can contribute to employee retention within organizations further.

Keywords: High Performance Work System, Employee Engagement, Employee Retention

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Introduction

In the era of modern business, organizations must confront rapid changes and fluctuations due to various economic, social, and environmental conditions, together with rapidly evolving technologies. Consequently, strategic management processes concerning human resources are increasingly recognized as important factors that can lead to business success (Usuphap & Boonyoo, 2021, p. 105). In 2020, all global areas faced the ongoing COVID-19 pandemic, which adversely affected delays in customers' purchasing power, production, and service, alongside, increasing raw materials prices and transportation costs are recognized as a secondary impact of the Russian-Ukraine war, exacerbating inflation that has elevated the cost of living. This causes the cost of living for Thai citizens to increase. As a result, these various situations have had direct and indirect impacts on business sectors both presently and in the future, especially on small and medium enterprises (SMEs) that have continually faced challenges that have led to a decrease in Gross Domestic Product (GDP) of our country in 2020 to 15,703,021 million baht, down by 1,195.069 million baht or 6.1% from the previous year's growth rate of 3.1%. This decline was attributable to the COVID-19 outbreak both domestically and internationally (Ministry of Public Health, 2021). When examining the growth rate of small enterprises by establishment type, it was observed that the registration of legal entities had rather increased compared to the previous year, indicating that new entrepreneurs were more likely to remain in the system and comply with the income tax regulations following the laws highly. Furthermore, an analysis by business groups revealed that in the first mid-year of 2021, small enterprises employed the highest number of employees, totaling 5,274,773 employees, followed by medium enterprises, which employed 4,241,617 employees (Office of Small and Medium Enterprise Promotion (OSMEP), 2021).

Furthermore, the Office of Small and Medium Enterprise Promotion (OSMEP) (2022) conducted a qualitative survey in 2000, gathering data from small enterprise operators, with a sample of 800 respondents across 20 provinces in all six regions of Thailand. The distribution of samples was segmented by region, with 17.50% in the North, 4.50% in the West, 13.75% in the South, 29.25% in the Central region, 7.75 in the east, and 27.75% in the Northeast of Thailand. The survey indicated that in 2000 small enterprises employed 42.38% of the total workforce in the manufacturing sector, with a majority focusing on skilled labor accounting for 48% of total employment. Nevertheless, the survey also highlighted numerous labor-related challenges faced by with the most significant issue being a shortage of skilled labor at 22.91%. This was followed by high wage costs at 14.54%, employment turnover at 10.57%,

absenteeism and tardiness at 6.61%, and low-performance standards due to work behaviors at 9.69% (Office of Small and Medium Enterprise Promotion (OSMEP), 2022). The quantitative survey results of OSMEP underscore the necessity for small enterprises to focus on developing a skilled labor force while also finding strategies to retain skilled workers within the organization. According to Obeng et al. (2021, p. 1), organizations seeking to retain employees must focus on creating structured high-performance work systems, encompassing recruitment, training, performance evaluation, and compensation, which can cultivate high-efficiency work behaviors (Ni, 2017, p. 313). This, in turn, fosters employees' employee engagement characterized by a engagement to skill enhancement and job satisfaction, reflecting the attitudes, thoughts, emotions, and mental states of employees toward their work and organization, encouraging them to express their beliefs and feelings derived from their experiences within the organization (Alam & Asim, 2019, p. 163; Amarneh et al., 2021, p. 5). Moreover, high-performance work systems aim to maximize employee productivity and operational efficiency, positively linking employee behavioral outcomes to emotional engagement, facilitating the alignment of human resource management with employee engagement behaviors that manifest both internally and externally, ultimately promoting employee skill development and inspiration within the organization (Peprah, 2020, p. 6). When equity in management practices that foster employee engagement is coupled with high-performance work systems, it further enhances employees' awareness and responses to perceptions, effectively retaining employees within the organization (Qureshi, 2019, p. 12).

Therefore, given the labor challenges that small enterprises faced, including the shortage of skilled labor, wage issues, employee turnover, absenteeism, and subpar work performance, this research aims to study whether high-performance work systems and employee engagement on the employee retention of small enterprises in the manufacturing sector in metropolitan areas. This will be achieved by focusing on high-performance work systems and employee engagement, ensuring that small enterprise employees remain within the organization. The study is titled, "The Influence of High-Performance Work Systems and employee engagement on Employee Retention in Small Enterprises in the Manufacturing Sector in the Metropolitan Areas," aimed at enhancing knowledge across dimensions related to high-performance work systems and employee engagement that promote employee retention within these organizations, providing guidelines for planning and developing high-performance work systems to increase employee engagement and retention.

Research Objective

This research aims to investigate the influence of high-performance work systems and employee engagement on the employee retention of small enterprises in the manufacturing sector in metropolitan areas.

Research Hypotheses

Hypothesis 1 (H1): High-performance work systems (HPWS) influence employee engagement in terms of vigor, dedication, and absorption.

Hypothesis 2 (H2): High-performance work systems (HPWS) influence employee retention.

Hypothesis 3 (H3): employee engagement in terms of vigor, dedication, and adsorption influence employee retention.

Research Framework

This research aims to the influence of high-performance work systems and employee engagement on the employee retention of small enterprises in the manufacturing sector in metropolitan areas; The researchers are able to outline the research framework as follows:

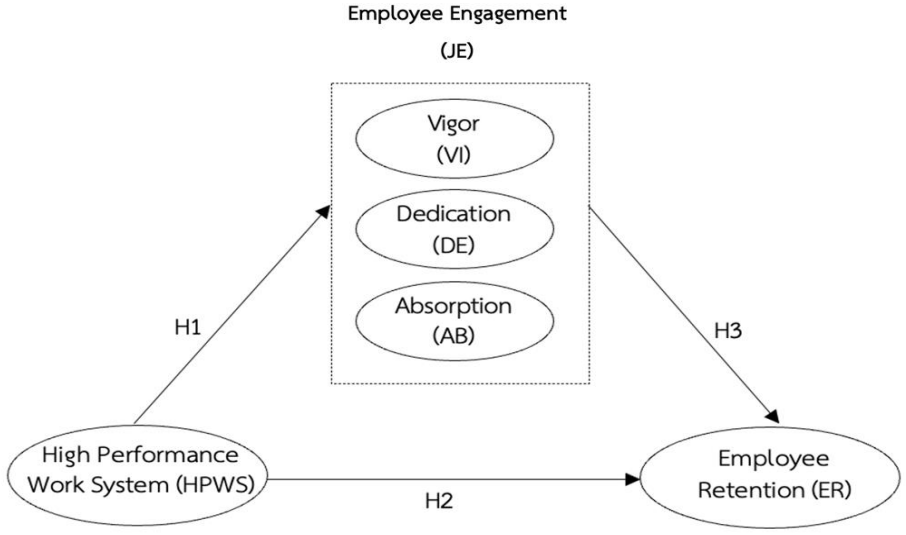

Figure 1 Research Framework

Literature Review

The research, titled “The Influence of High-Performance Work Systems and employee engagement on Employee Retention in Small Enterprises in the Manufacturing Sector in Metropolitan Areas”, reviewed literature, concepts, theories, and related research from various scholars. The researcher summarized the relevant concepts, theories, and research as follows:

1. High-Performance Work Systems (HPWS): The concept of High-Performance Work Systems (HPWS) significantly impacts employee performance outcomes and organizational efficiency. According to social exchange theory, individuals engage in emotional and organizational exchanges and express emotions, which can foster feelings of engagement and dedication to organizational relationships (Huang et al., 2018, p. 341). Teamwork, derived from organizational learning, and the application of production technology, combines management efforts to create overall quality, posing challenges in the creative process that instills in employees the behaviors necessary to leverage organizational strategies for skill development, motivation, and opportunities for participation in such behaviors (Ismail et al., 2017, p. 164). This enables optimal benefits from high-performance work systems in human resource management that stimulate and promote operations at both individual and group levels, achieving overall organizational goals (Qureshi & Tasneem, 2021, p. 129).

Huang et al. (2018, p. 342) asserted that HPWS focuses on supporting and developing employees by enhancing job value, increasing employee skills, and promoting participatory decision-making leading to higher levels of employee engagement. Once organizations emphasize high-performance work systems (HPWS), employees can reciprocate by increasing their employee engagement (Arefin et al., 2019, p. 3), which can enhance market opportunities through proactive engagement strategies, fostering inspiration and positive attitudes for organizational work outcomes (Li et al., 2019, p. 398). Additionally, HPWS can enhance job satisfaction in terms of appropriate wages and rewards, which is helpful for employees' work performance for organizations with their intentionally great attempts. This can also engage the employees' job loyalty which can increase employees' job retention further (Soonchan & Boonyoo, 2021, p. 226). Finally, what if employees focus on increasing HPWS that can improve their job efficacy, it will increase their job satisfaction and foster organizational employee retention as well (Irwati & Ketut, 2022, p. 20).

2. Employee Engagement (JE): Employee engagement is the interaction between an organization and their work (Saks, 2006, p. 605), characterized by feelings about their impression of changes or exceptional events and they respond to those actions through their dedication to both their physical, mental, and emotional engagement to their work which is more powerful than other work engagements (Kahn, 1990, p. 695). This combines engagement, involvement, loyalty, passion, enthusiasm, and focused effort to be their energy (Macey & Schneider, 2008, p. 7). Eresia-Eke et al. (2023, p. 54) argue that employee engagement is a mental state that combines vigor, dedication, and absorption, contributing to employees' work effort

and enhancing meaningful organizational goals. Employee engagement is a positively sustainable way and individuals' perceived emotions toward organizational goals can exhibit their job efficacy (Agarwal, 2017, p. 2). Adversely, when business organizations create a pathway that has the highest negative value possible that leads to burnout, it will cause that emotional behavior to pass through a value of zero. This will then lead to the highest positive value of fully voluntary engagement continuously (Kuok & Taorminal, 2017, p. 263).

Dorta-Afonso et al. (2021, p. 3) stated that employee engagement affects employee retention. Organizational factors will be an important management issue that keeps employees within the organization at a higher level, reducing job turnover or absenteeism. The tangible aspects of management can be seen when employees experience employee engagement which is a psychological attachment that makes them feel part of the organization, leading to a positive relationship that can keep employees within the organization genuinely (Obeng et al., 2021, p. 3). This can develop into outcomes that make employees feel like they are part of the organization and are ready to stay in the organization to work towards achieving the goals set by an organization with their maximum job efficacy (Amarneh et al., 2021, p. 2).

3. Employee Retention (ER): Employee retention is an indicator that reflects the standard of organizational achievement and is the process of maintaining employee job retention as long as possible, without thinking of relocating or changing their work to other departments. Employees' job retention is thus an organization's work performance that must be created and developed for their efficacy (Adi, 2012, pp. 339-340). It can foster loyalty and engagement to the organization with a willingness and satisfaction to perform their work and build a positive image for the organization. Human resources are the most valuable workforce for an organization. When the organization conducts retention activities effectively and strives to maintain both the quantity and quality of employees that are adequate and suitable for the job, employees will gain safety in both physical and mental health, which can directly affect their work performance. In contrast, if the organization neglects retention matters, employees will find new organizations that can support them with better protection (Kossyva et al., 2021, p. 67). This is consistent with the perspective of Fahad et al. (2021, p. 621), which states that to achieve employee retention within the organization, the executives require their management to develop strategies to create inspiration that fosters employees' loyalty and provide support to employees in adapting themselves to be along with rapid changes of organization's culture. Building love and employee engagement in the organization encourages employees to work with pride to achieve the organization's goals (Amarneh et al., 2021, p. 5).

For an organization to operate effectively and continuously, the organization must manage human resources at each time frame: (1) the time before individuals work for the organization, which is the time when the organization must recruit and select employees; (2) The time when individuals are working within the organization, which is the time when management must find out ways to retain them within the organization; and (3) the time individuals leave the workplace. Although three time frames are significant, the most vital period is the second time frame, because it is the period when employees will work to achieve the objectives set by the organization while continuously developing their abilities to perform their tasks well. When employees achieve organizational goals, executives need to organize activities to retain knowledgeable and capable employees with job satisfaction and willingness to work for the organization (Martadiani et al., 2022).

Methodology

The results of quantitative research approach were found from the responses of questionnaires. The quantitative analysis is constrained to the statistics, numbers, data calculation, as well as to different forms of statistical examination. For research analysis, quantitative research approach has been adopted. This research has used inferential and descriptive statistics for collection of data. The population conducted in this research involved employees working in small enterprises in the manufacturing sector that are registered with the Department of Industrial Works in the surrounding metropolitan area. They involved 5 provinces-Nonthaburi, Nakhon Pathom, Pathum Thani, Samut Prakan, and Samut Sakhon. In this research, the total population was 4,987 participants (Department of Industrial Works, 2023), as shown in Table 1.

Table 1. The number of employees and establishments of small enterprises in the manufacturing sector in the surrounding metropolitan area.

Number	Province	Number of Factories	Number of Employees	Percentage
1	Nonthaburi	21	199	3.99
2	Nakhon Pathom	64	1,192	23.91
3	Pathum Thani	44	525	10.53
4	Samut Prakan	119	1,556	31.20
5	Samut Sakhon	123	1,515	30.37
	Total	371	4,987	100

The sample group in this research consisted of employees working in small enterprises in the manufacturing sector, registered with the Department of Industrial Works in the surrounding metropolitan area, comprising a total of 400 samples. The sample size (Sample) was determined by the study of concepts and theories related to sample size determination to obtain a good representative sample of the population. The researcher applied the sample size determination method by the Proper Solution and Non-Convergence, using the concepts of Marsh et al. (1998, p. 183), which established the sample size and the average number of indicators per latent variable, as shown in Table 2

Table 2. The sample size determination based on the concepts of Marsh et al. (1998, p. 183)

Average Number of Indicators	Types of study results	Sample Size				
		50	100	200	400	1,000
3	Proper Solution	54.80	85.40	97.80	100.00	99.00
	Non-Convergence	10.80	0.90	-	-	-
4	Proper Solution	86.50	99.10	99.60	100.00	100.00
	Non-Convergence	2.20	-	-	-	-
6	Proper Solution	99.60	100.00	100.00	100.00	100.00
	Non-Convergence	0.10	-	-	-	-
12	Proper Solution	100.00	100.00	100.00	100.00	100.00
	Non-Convergence	-	-	-	-	-

The sample size determination based on the concepts of Marsh et al. (1998, p. 183) is based on the total number of indicators (p) divided by the number of latent variables. In this research, there are 41 indicators and 3 latent variables. Therefore, the average number of indicators equals 13.67. Since the sample size determination based on Marsh et al. (1998, p. 183) sets the average number of indicators at the level of 12, this study has more than the hierarchical number of average indicators according to the concepts Marsh et al. (1998, p. 183). Hence, the researcher adopted the hierarchical level of the average number of indicators at the level of 12 as a criterion for calculating the sample size in this research to ensure that the sample size used in this research aligns with the Proper Solution and avoids Non-Convergence (Piriyakul, 2021, pp. 235-237). The researcher will determine a sample size of 100 samples that can represent the population used in the research up to 100%. However, for the

appropriateness of the population in this study, the researcher chose a sample size of 400 samples to achieve a Proper Solution of 100 percent and to avoid any Non-Convergence arising from this research. As for randomized sampling, the researcher selected a sampling plan based on the principle of probability sampling using stratified sampling and proportional allocation according to the population size by multiplying the total sample size by the number of sub-populations and dividing by the total population. After allocating the sample size based on the population size, the researcher will proceed with simple random sampling later.

Research instruments: The researcher collected the quantitative data using a questionnaire as a research instrument. The questionnaire was divided into four sections:

Part 1 was the 'Personal Factors Section.' This section collected personal demographic information of the respondents, including gender, age, education level, average monthly income, and work duration. This section consisted of five checklist questions and each respondent was asked to select only one answer that most accurately described them.

Part 2 was the 'High performance work system.' This section contained 14 questions assessing the High-performance work system.

Part 3 was the 'employee engagement Evaluation Section.' This section included 12 questions measuring employee engagement.

Part 4 was the 'Employee Retention Evaluation Section.' This section comprised 6 questions evaluating employee retention.

Each section of the questionnaire was structured using a 5-point Likert-type rating scale of Likert (1932, p. 5), with the respondents selecting only one answer per question. Concerning the development and validation of the research instrument, the researcher constructed the questionnaire and ensured that it comprehensively covered the variables outlined by the research indicators. The questionnaire was, then, reviewed by five experts for content validity, with each item being evaluated for its relevance to the intended variables. The content validity index (CVI) for this research ranged from 0.67 to 1.00, which met the established criteria. After receiving expert feedback, the researcher revised and finalized the questionnaire, focusing only on items that met the validation criteria. The final version of the questionnaire was then piloted with a group of 30 participants who had similar characteristics to the study population. The collected data were subsequently analyzed to determine the overall reliability of the questionnaire. Cronbach's alpha coefficient was calculated for each variable, with a minimum acceptable value of 0.70. In this study, Cronbach's alpha ranged from 0.771 to 0.877.

In the data collection, the researcher collected data between March and June 2024. The data were gathered from employees working in small enterprises in the manufacturing sector registered with the Department of Industrial Works, which is located in the Metropolitan areas. A sample of 400 employees was selected, using a stratified and simple random sampling sample size. Before data collection, the researcher explained the research objectives to the participants and informed them about the advantages and their rights to accept or reject participation in the questionnaire. The research results would be used solely for academic purposes, ensuring that the identities of the participants would be confidential and the results would be presented in aggregate form.

The data analysis procedure involved examining the measurement scale for each type of data and issue covered in this study. The researcher reviewed the questionnaires and processed the data using statistical software. The analysis was divided into three parts: Part 1 was the descriptive analysis. This part focused on analyzing the personal factors of employees working in small enterprises in the manufacturing sector in metropolitan areas. The researcher used percentage values to describe the personal demographic characteristics of the respondents. Part 2 was the analysis of key variables. This section analyzed the levels of work performance, job commitment (i.e. Vigor, Dedication, Absorption), and employee retention. Mean and standard deviation were used to evaluate the data, summarize, and explain the characteristics of the variables. Part 3 was the inferential statistical analysis. Inferential statistics were used to test the hypotheses and examine the relationships between variables using Structural Modelling (SEM). This method was employed to identify direct and indirect factors influencing the variables. Statistical software was used to perform these analyses.

Results

This research aimed to study the effects of high-performance work systems (HPWS) and employee engagement on the retention of employees in small enterprises in the manufacturing sector located in metropolitan areas. Data were collected from a sample of 400 employees working in small manufacturing enterprises registered with the Department of Industrial Works in metropolitan areas. Based on the questionnaire responses, it was found that the majority of respondents were male (57.75%), with 34.75% aged between 36 and 45 years. The highest educational level for 47.75% of the respondents was a bachelor’s degree, and 38.50% had an average monthly income between 15,001-20,000 baht. Regarding working experience, 11-15 years was the most common duration, comprising 29% of the samples. The findings from the data analysis are summarized as follows:

1. Summary of the analysis of opinion levels: The analysis covered HPWS, and employee engagement in terms of vigor, dedication, absorption, and employee retention. The results were presented as mean scores and standard deviations, as shown in Table 3

Table 3. The mean scores and standard deviations.

Variable	Mean	Standard Deviation	Interpretation
High-Performance Work Systems	4.38	0.476	High
Employee Engagement	4.46	0.469	High
Vigor	4.51	0.551	Very High
Dedication	4.45	0.529	High
Absorption	4.43	0.527	High
Employee Retention	4.30	0.589	High

The Table 3, It was found that employees in small manufacturing enterprises in the metropolitan area had a mean score of 4.46 and a standard deviation of 0.469 for employee engagement in terms of vigor, indicating a very high level of agreement. The overall mean scores for employee engagement, dedication, absorption, HPWS, and employee retention were 4.51, 4.45, 4.43, 4.38, and 4.30, respectively, with standard deviations of 0.551, 0.529, 0.527, 0.476, and 0.589, indicating high levels of agreement. These findings suggest that employees in small manufacturing enterprises exhibit high levels of employee engagement, particularly in terms of vigor.

2. Summary of the structural equation modeling (SEM) analysis: The analysis examined the relationships between the variables and the hypothesis testing results, as shown in Figure 2.

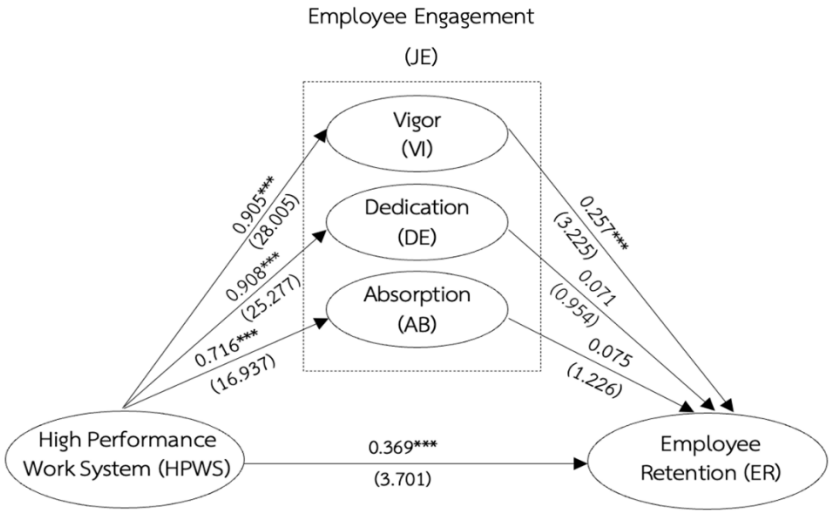

Figure 2. The structural equation modeling (SEM) analysis.

The Figure 2, It was found that the structural equation modeling (SEM) analysis was divided into two parts: Part 1 was about factors affecting employee retention (ER). The analysis revealed that HPWS and employee engagement in terms of vigor (VI) had a direct effect on employee retention, with path coefficients of 0.369 and 0.257, respectively. Additionally, HPWS had an indirect effect on employee retention, with a path coefficient of 0.352. employee engagement in terms of dedication (DE) and absorption (AB) did not have a direct effect on employee retention, with a path coefficient of 0.071 and 0.075 respectively. Part 2 was 'Factors affecting employee engagement in terms of vigor (VI), dedication (DE), and absorption (AP), with path coefficients of 0.905, 0.908, and 0.716 respectively.

3. Summary of hypothesis testing: Based on the SEM analysis of the relationships between HPWS, employee engagement in terms of vigor (VI), dedication (DE), absorption (AB), and employee retention (ER) in small manufacturing enterprises in metropolitan areas, the following hypotheses were confirmed, as shown in Table 4

Table 4. The hypotheses were confirmed.

Influence of Variables	Path Coefficient (Coef.)	t-value	Result
Direct Effect			
HPWS → VI	0.905***	28.005	Accepted
HPWS → DE	0.908***	25.277	Accepted
HPWS → AB	0.716***	16.937	Accepted
HPWS → ER	0.369***	3.701	Accepted
VI → ER	0.257***	3.225	Accepted
DE → ER	0.071	0.954	Rejected
AB → ER	0.075	1.226	Rejected
Indirect Effect			
HPWS → ER	0.352***	3.702	Accepted

Note: ***p-value ≤ .01 / ค่า t ≥ 2.58

The Table 4 the following hypotheses were confirmed that HPWS had a direct effect on employee engagement in terms of vigor (VI), dedication (DE), absorption (AB), and employee retention (ER), with path coefficients of 0.905, 0.716, and 0.369, and t-test values of 28.005, 25.277, 16.937, and 3.701 respectively. Additionally, employee engagement in terms of vigor (VI) had a direct effect on employee retention, but dedication (DE) and absorption

(AB) did not have a direct effect on employee retention. The path coefficients were 0.257, 0.071, and 0.075, with t-test values of 3.225, 0.954, and 1.226, respectively. Furthermore, HPWS had an indirect effect on employee retention (ER), with a path coefficient of 0.352 and a test value of 3.702.

Discussion and Implications

Based on the literature review, theoretical frameworks, and findings of this research, the researcher has discussed the results based on the objectives of the study, focusing on the effects of high-performance work systems (HPWS) and work engagement on employee retention in small manufacturing enterprises in metropolitan areas. The research results indicate that HPWS directly affects work engagement in terms of vigor, dedication, and absorption, together with employee retention. Additionally, vigor has a direct effect on employee retention, which aligns with the research hypothesis. This is because a well-defined HPWS-encompassing selection, training, performance evaluation, and compensation-induces employees to feel engaged in their work, increasing their vigor, willingness to dedicate themselves, and happiness at work. As a result, employees are more likely to stay in the organization for a long time, with no intent to leave. Furthermore, high-performance work systems had an indirect effect on employee retention.

This finding is consistent with the study by Obeng et al. (2021, p. 5), which found that for employees to stay, organizations must establish effective HPWS, including selection, training, performance evaluation, and fair compensation, which fosters an intent to change personality traits, self-efficacy, and work resources efficiently for the organization (Akter et al., 2021, p. 740). Furthermore, such systems promote work engagement, which stems from the fair recognition of employee skills, knowledge, and participation, creating a sense of retention as part of an organization (Alam & Asim, 2019, p. 163; Amarneh et al., 2021, p. 6). Additionally, a well-structured HPWS that organizations implement can enhance organizational efficiency, which, in turn, fosters innovation in human resource practices, creating distinct activities, roles, and processes that aim to retain and develop employees (Soonchan & Boonyoo, 2021, p. 226). The involvement of HR management in influencing employee work engagement behaviors will visibly impact the development of employee skills, increasing their motivation within the organization (Peprah, 2020, p. 6). When fairness and support from HR management are combined with HPWS, employees will become more engaged, leading to positive attitudes

and a greater willingness to remain in the organization, contributing to more effective work outcomes (Qureshi, 2019, p. 12).

Recommendations

This research, which studies the influence of High-Performance Work Systems and work engagement on employee retention in small manufacturing enterprises in metropolitan areas, provides the following recommendations on various points:

1. General Recommendations

According to the research on high-performance work systems that small enterprises in the manufacturing sector in metropolitan areas should focus on high-performance work systems. This will help employees improve their work efficiency and lead to voluntary retention within the organization.

According to the research on work engagement that small enterprises in the manufacturing sector in metropolitan areas should focus on elevating the work engagement of employees to retain capable and potential employees, allowing them to grow with the organization. Additionally, there should be a clear plan to develop high-performance work systems to prepare employees for engagement, full capability, and long-term engagement with the organization.

According to the research on employee retention that small enterprises in the manufacturing sector in metropolitan areas should focus on internal work planning and involve employees in problem-solving and decision-making processes. This will help employees feel valued and encourage them to stay and work effectively within the organization.

2. Recommendations for Future Research

This study provides an overview of the variables studied. Future research should delineate the scope by focusing on specific employee departments, such as production, administration, marketing, and finance, to study the factors influencing employee retention in each department accurately.

This study provides an overview of the variables HPWS variables, including vigor, dedication, absorption, and their effects on employee retention. Future research should also examine other factors to further understand the factors influencing employee retention in small manufacturing enterprises in peripheral areas.

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