

## Guidelines for Dealing with Labor Shortages at the Operational Level in the Industrial Sector for Sustainability

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### Abstract

*Operational-level workers play a crucial role in running a business and generating income. When the industrial business sector has an adequate labor force, it leads to continuous business growth, thereby influencing economic expansion in the sector. This research aims to explore strategies for addressing the labor shortage at the operational level in the industrial business sector to ensure sustainability. It is developed into a structural equation model. The research encompasses both qualitative and quantitative methods. It involves surveying quantitative data from questionnaires distributed to 500 human resources executives from industrial business organizations. By employing descriptive statistics, inferential statistics, and multivariate statistics.*

*The research findings provide guidance on managing labor shortages at the operational level in the industrial business sector with a focus on sustainability. The four elements are ranked in order of importance as follows: 1) Corporate image ( $\bar{X} = 4.47$ ), 2) Compensation and benefits ( $\bar{X} = 4.45$ ), 3) Organizational culture ( $\bar{X} = 4.44$ ), and 4) Workforce analysis and planning ( $\bar{X} = 4.43$ ). Regarding the hypothesis testing results, it was found that there is no significant difference in dealing with the labor shortage situation at the operational level in the industrial business sector for sustainability between small and medium-sized business organizations and large business organizations at the 0.05 significance level.*

*Moreover, the analysis of the developed structural equation model demonstrated that it meets the evaluation criteria and aligns with the empirical data. The chi-square probability level was 0.140, the relative chi-square value was 1.120, the consistency index value was 0.966, and the root mean square index of error estimation was 0.015.*

**Keywords:** Labor Shortage, Operational Level Workers, Structural Equation Model.

### Introduction

From the situation of entering into an aging society including, changes in the economic structure of Thailand which has changed from the agricultural sector to the industrial sector and more service sectors as well as government policies that promote special areas to support investment. Having an adequate labor force and the potential to be in line with the needs of the labor market will help drive industrial business organizations, to increase Productivity increases competitiveness, and on the macro side, there will be economic development and growth of the country overall. A study by the SCB Economics Intelligence Centre about the average annual growth rate of the working-age population

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in the age group of 15-65 years in the ASEAN countries consisting of: Thailand, Indonesia, Malaysia, and the Philippines, it is expected that Thailand, Indonesia, Malaysia, and the Philippines, will be a decrease in the working age population from 2018, 2036, 2063, and 2077, respectively as shown in Figure 1. It can be seen that Thailand is the first country where the working-age population has begun a continuous downward trend. In particular, the working-age population in the age group of 15-65 years has decreased, and there is a greater proportion of elderly people. This will cause Thailand to lose its competitiveness compared to other ASEAN countries due to the changing population structure.

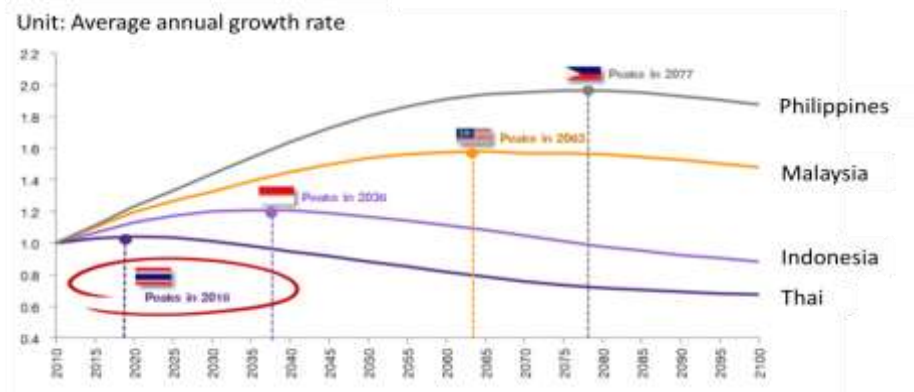


Figure 1: Estimated growth rate of the working age population consisting of persons aged 15-65 years in ASEAN countries from 2010-2100

Source: The SCB Economics Intelligence Centre (SCB Economics Intelligence Centre) (2013) <sup>[1]</sup>

From the database system of demand and supply of manpower to support the industry of the Division of Labor Economics, Office of the Permanent Secretary, Ministry of Labor, as shown in Figure 2, with data estimating the trend of the number of graduates, which is the result of estimating labor production into the new labor market in the year 2024-2027 found that, the rate of decline is -1.31, -1.38, -1.40 and -1.53 percent, respectively. On average represents a decline rate of -1.40 percent per year, resulting in a tight labor market, and estimated labor shortages that will increase in the future.

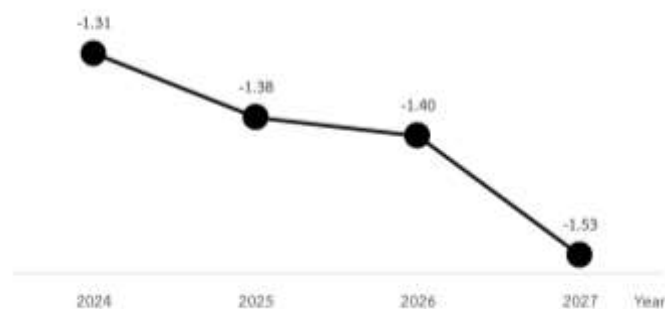


Figure 2: Estimated percentage of labor production, 2024-2027.

Source: Division of Labor Economics Office of the Permanent Secretary, Ministry of Labor. (2022) <sup>[2]</sup>

From data between 2019-2022 as shown in Figure 3, the International Institute for Management Development (IMD) <sup>[3]</sup> has ranked the efficiency of the business sector. It consists of five sub-factors which are: Productivity & Efficiency, Labor Market, Finance, Management Practices, and Attitudes and Values. Increasing the quality or efficiency of manpower will be able to replace the reduced manpower and help maintain or increase

productivity. For this reason, labor productivity plays a role as one of the key catalysts that will help the Thai economy grow under constraints. Productivity & Efficiency of the business sector in Thailand were ranked 43<sup>rd</sup> in 2019, 41<sup>st</sup> in 2020, 40<sup>th</sup> in 2021, and 47<sup>th</sup> in 2022. It can be seen that the productivity and efficiency of the Thai business sector will be lower in 2022, and be below average when compared to the number of countries ranked worldwide ranking of 63 countries by IMD in 2022.

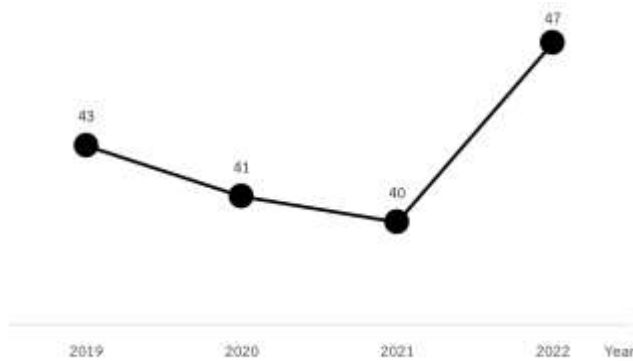


Figure 3. Results of ranking of business sector efficiency in Thailand Productivity and efficiency sub-factors compared with countries around the world IMD (IMD World Competitiveness Ranking) 2019-2022

Source: International Institute for Management Development (IMD) (2023) <sup>[3]</sup>

#### Research Objectives

To study the elements of the guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability.

To develop a structural equation model for dealing with labor shortages at the operational level in the industrial business sector for sustainability.

## Literature Review

### 1. Compensation and Benefits

Thanya (2008) <sup>[4]</sup> Compensation management determines policy, planning, and various activities related to the payment of compensation both directly and indirectly to employees Thongbai (2002) <sup>[5]</sup> mentioned the importance of compensation management and welfare which includes: 1) Importance to employees, 2) Importance to the organization or employer, 3) Importance to shareholders, 4) Importance to Managers, 5) Importance to society in overall Rueangwit (2005) <sup>[6]</sup> divided compensation into three types: 1) Base Pay, 2) Variable Pay or Incentives, 3) Fringe Benefit, sometimes called “Benefit” or “Supplementary Compensation” Supaporn (2005) <sup>[7]</sup> has determined compensation with important principles as follows: 1) Principle of Justice (Equity), that is the determination of compensation must be fair or just. 2) The principle of motivation (Incentive), that is paying compensation to motivate workers, work with better efficiency. 3) The security principle emphasizes the importance of ensuring that remuneration is fixed in both amount and timing. It is essential to establish a clear and consistent payment period and method, which instills confidence in workers regarding their income. 4) Control principle, that is control expenses appropriately and reduce unnecessary expenses. 5) The principle of balance (Balance), that is determining the appropriate proportions of expenditure categories, and various compensation groups, such as the balance between direct compensation with indirect compensation, etc. 6) The principle of sufficiency (Adequacy), which means that, the compensation received must be at least equal to the standard of living in each society. 7) The principle of flexibility (Flexible), which means that, the wage rate is reasonable. Must be able to adjust to the rate of the

labor market McLeod (2007) <sup>[8]</sup> discussed the motivation to do things. The theory of Maslow's hierarchy of needs (Maslow's Hierarchy of Needs) includes: 1) Physiological Needs, 2) Security or Safety Needs, 3) Belongingness and Love Need, 4) Esteem Needs, 5) Need for success in life (Self-Actualization) Thitirat and Phatchanya (2018) <sup>[9]</sup> mentioned two factors that affect employee motivation to work, which are: 1) Hygiene Factors, include salary and benefits, supervision, working conditions, working status stability in work Relationships with co-workers, and various policies in the work. 2) Motivation Factors, consisting of success in work, gaining importance responsibility in challenging work, interest in the work, and growth in work

## 2. Organizational Culture

Wirat (2005) <sup>[10]</sup> Organizational culture is systematically shared values and beliefs, happens within the organization, and use it as a guideline for determining the behavior of people in the organization. Organizational culture is therefore like the personality or spirit of the organization. Gomez-Meija, Balkin, and Cardy (2008) <sup>[11]</sup>. Organizational culture is a system of shared values, beliefs, assumptions, and norms that bind employees together. Organizational culture is therefore reflected from the viewpoint of every employee in the form of the organization's viewpoint. Organizational perspectives that influence factors within the organization to cope with external factors. Thus leading to the success of the organization Denison and Fey (1998) <sup>[12]</sup>. Organizational culture greatly affects organizational effectiveness, this can contribute to: 1) Involvement causing participation in the organization. 2) Ability to adapt to the environment both inside and outside the organization. 3) Consistency the personnel behave in accordance with common values regularly and continuously. 4) The right mission, and vision give the organization a clear framework and direction for operations. Daft and Lane (2008) <sup>[13]</sup> presented four main types of culture as: 1) Adaptability Culture, 2) Achievement Culture, 3) Involvement Culture, and 4) Consistency Culture, Snead Jr, (1988) <sup>[14]</sup>. In creating organizational culture must be motivated encourage personnel to show behavior in order to reach the desired goals. Therefore, McClelland's theory of needs was presented, which includes: 1) Need for Achievement: nAch Person 2) Need for Affiliation: nAff Person 3) Need for Power: nPow Person) Senge, et al. (2012) <sup>[15]</sup> Knowledge Management is the process by which personnel in an organization develop knowledge to continually develop their abilities. In order to achieve the goal, it starts with developing ideas that come from creativity, and create collaborative learning within the organization. A learning organization is a group of people working together to increase the overall potential of the organization, to raise results and have common goals.

## 3. Workforce Analysis and Planning

Somchai (1999) <sup>[16]</sup> Human resource planning, it is a process of surveying human resource needs, and bring about the number of employees with the required skills, and can be provided when required, considering future human resource needs according to the organization's strategic plan and determining the necessary steps to meet those needs, must consider current and future personnel needs as well as future labor market characteristics. Nattaphan (1999) <sup>[17]</sup> Human resource planning must be consistent with the overall objectives of the organization. The main goals are efficiency, stability, and organizational growth. Personnel and Society Krittin (1994) <sup>[18]</sup> discussed the benefits of human resource planning as follows: 1) Reduce the problem of shortage of manpower in the organization. 2) Set guidelines for managing and developing human resource plans to be in line with the organization's strategic plan. 3) Support business expansion. 4) Increase organizational efficiency. 5) Prepare people to keep up with technological changes, and 6) Prepare people for the right job. It is also mentioned scope of human resource planning with a total of nine steps as follows: 1) Examine and consider the organization's plans and objectives. 2) Analyze the current working conditions of employees. 3) Evaluate the number and type of jobs needed in the future. 4) Analyze the amount of manpower needs in the future. 5) Analyze employee movement. 6) Adjust the

number of employees in each position. 7) Compare the balance between the number of manpower needs in the future. and the number of people in the future. 8) Apply organizational policies and philosophies to assist in human resource management, and 9) Consider future labor market conditions. Peters and Waterman Jr (2011) <sup>[19]</sup> presented the concept of McKinsey's 7's framework theory which is a framework for consideration and planning in setting strategy within an organization, with seven different factors as: 1) Structure (organizational structure), 2) Strategy, 3) Staff, 4) Style, 5) System, 6) Skill, and 7) Shared Value. Foong (2007) <sup>[20]</sup> identified strategies that are consistent with resources and capabilities market demand as well as the competitive environment. All of them are integrated together to create a new strategy in addition to the existing one. By building on the organization's Strengths in order to seize advantage from Opportunities, Countering threats (Threats) and solving weaknesses (Weaknesses) of the organization. Chainat, Sunee and Thanin (2022) <sup>[21]</sup> presented that, Organization Management elements have a direct influence on Value Creation elements. Organization Management elements are consisting of: Planning means that, organization should analyze and plan manpower. Good planning results in value for the organization including innovative and quality products and services.

#### 4. Corporate Image

Anderson and Rubin (1986) <sup>[22]</sup> stated that corporate image, it is the image that arises from the perception of service recipients regarding the entire organization. Organizations are like people who have personalities, and different images. P. Kotler (2012) <sup>[23]</sup> said, organizational image is the perception process that an individual has of an organization. Both in terms of products or services, including the image comes from many different factors which arise from the business operations of the administrative division within the organization. S. S. Kim, Lee and Prideaux (2014) <sup>[24]</sup> have defined that corporate image, it is various factors including: Impressive service, Quality products, Creative product design. Warinyupa (2015) <sup>[25]</sup> has emphasized the importance of corporate image that, corporate image can be a positive or negative feeling. A good image helps make the activity or organization successful. But on the contrary, if the image is not good, it will also cause the organization to suffer failure. For this reason, it is necessary for organizations to create a good image in the minds of service recipients, or outsiders as much as possible. Kotler (2000) <sup>[26]</sup> states that, corporate image is important in managing an organization very well and is also beneficial to the organization, helping to develop more credibility and enhance reputation for the organization rather than wanting to build a reputation for products and services. It is expected that the reputation of the organization will bring support and subsidy for products and services. Including, helping to make a difference to the organization from competitors very well. Punnawit (2012) <sup>[27]</sup> has explained about the elements of image, it consists of five aspects which are: 1) Financial Security, 2) Products, 3) Personnel, 4) Corporate Good Governance, and 5) Corporate Social Responsibility Thanisara (2019) <sup>[28]</sup> has presented the management process theory POSDCoRB Model (POSDCoRB) of Luther Halsey Gulick, which consists of: 1) P – Planning, 2) O – Organizing, 3) S – Staffing, 4) D – Directing, 5) C – Coordinating, 6) R – Reporting, and 7) B – Budgeting.

## Research Methodology

### 1. Synthesis of Elements

From concepts and theories, the researcher was able to summarize guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability into four elements, including Compensation and Benefits, Organizational Culture, Workforce Analysis and Planning, and Corporate Image as shown in Figure 4.

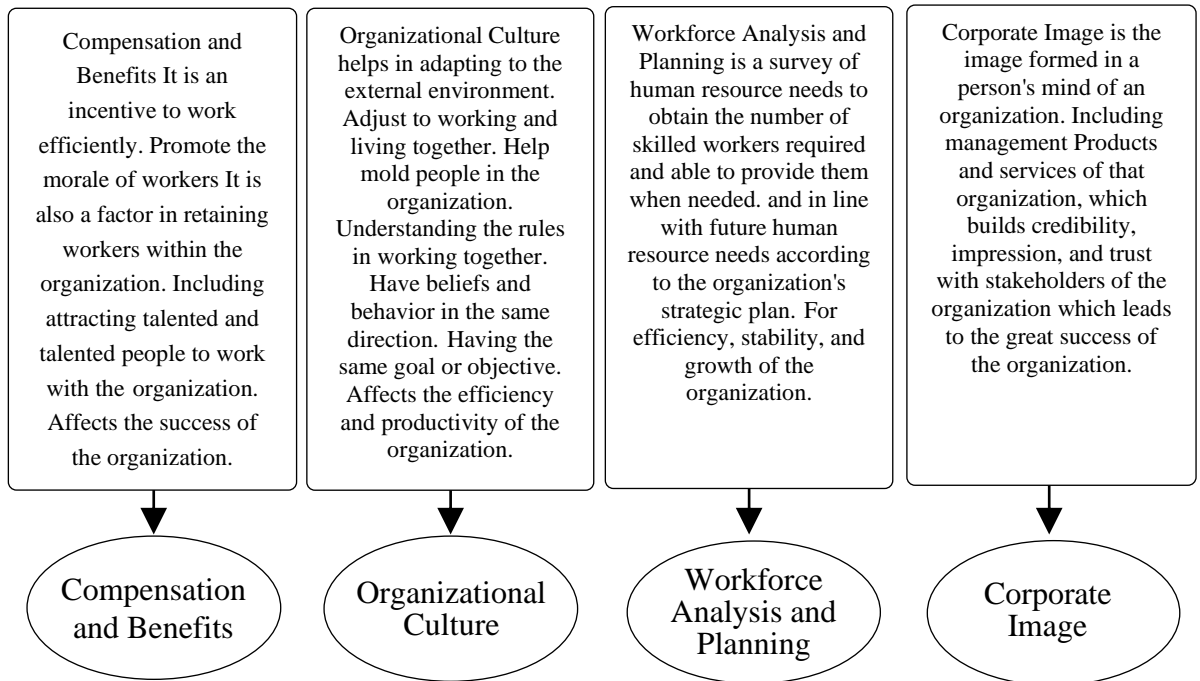


Figure 4: Conceptual Framework of the Research

## 2. Population and Sample

The population used in this research was determined from responsible persons and experts in human resource management in the industrial business organization sector, and received certification of quality management system standards (ISO 9001: 2000) for 5,899 locations. Determining the sample size use the research criteria of factor analysis, or structural equation models which have determined the sample size to be at a very good level of 500 samples. (Thanin, 2020) <sup>[29]</sup> used a multi-stage sampling method (Multi-Stage Sampling) (Thanin, 2020) <sup>[29]</sup> consisting of, Cluster Sampling procedure by dividing industrial businesses into two sizes, including: Small and medium-sized industrial businesses with large industrial businesses use probability sampling, using the lottery method by collecting data from a sample group.

## 3. Research Tools

The research instrument is a rating scale questionnaire, which has criteria for giving weight to the evaluation in five levels according to the Likert method (Thanin, 2020) <sup>[29]</sup>. The researcher took the draft questionnaire created along with the assessment form to the experts who has knowledge and experience in the field that will be studied, five people have considered the questionnaire. To search for tool quality by checking the index of consistency between the questions and the research objectives (Index of Item-Objective Congruence: IOC). The results of checking the index of consistency between the questions and the research objectives, the value is between 0.80-1.00, and the appropriate value is 0.50 and above. The researcher then used the questionnaire to try out (Try-Out) a population of 30 people with similar characteristics to the population intended for this study to analyze and determine the discriminatory power (Discrimination). In the section of questions that are in the form of a checklist. and questions that are in the form of a rating scale. with standard deviation (Standard Deviation: S.D.), and questions that are in the form of a rating scale. By analyzing the correlation coefficient (Correlation), and finding the confidence value of the questionnaire (Reliability). Classified between 0.45 and 2.41 the confidence value of the entire questionnaire was equal to 0.99, which values greater than 0.8 are considered to be at a very good level of confidence, then use the tool to collect data by asking for help answering questionnaires from the sample group.

#### 4. Data Analysis

Data analysis used both descriptive statistics. Statistics are based on the SPSS package for multivariate statistical analyses, and develop structural equation models, using the AMOS package, there are four criteria for evaluating the consistency of the model (Evaluating the Data-Model Fit) that are used for consideration, including: 1) The chi-square probability value is greater than 0.05, 2) Relative chi-square value less than 2.00, 3) The consistency level index value is more than 0.90, and 4) The root mean square index of error estimation is less than 0.08 (Thanin, 2020) <sup>[29]</sup>.

### Research Results

The level of importance of the elements of the guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability was found to be:

1) Results of analysis of the “Compensation and Benefits” elements. The results of the study found that Overall, the average was at a high level ( $\bar{X} = 4.45$ ). When considering each item, it was found that welfare was designed to accommodate future changes ( $\bar{X} = 4.56$ ).

2) Results of analysis of the “Organizational Culture” elements. The results of the study found that Overall, the average level was at a high level ( $\bar{X} = 4.44$ ) When considering each item, it was found that there were slogans (Slogans) or short, concise messages that were easily remembered ( $\bar{X} = 4.51$ ).

3) Results of the analysis of the “Workforce Analysis and Planning” elements. The results of the study found that Overall, the average was at a high level ( $\bar{X} = 4.43$ ). When considering each item, it was found that the analysis included vision, mission, goals, and related manpower issues, and the organization's strategic plan ( $\bar{X} = 4.54$ ).

4) The results of the analysis of the “Corporate Image” the elements. The results of the study found that Overall, the average level was at a high level ( $\bar{X} = 4.47$ ). When considering each item, it was found that the policy for creating the organization's image was clearly stated ( $\bar{X} = 4.59$ ).

The researcher has worked to improve the model. By considering the Modification Indices values obtained from ready-made programs with theoretical principles. To eliminate some inappropriate observational variables one by one. Then proceed with the new processing.

Repeat this until get a model with all four statistical values that pass the criteria, after the model has been improved, find that,

5) Results of the objective analysis to study the elements of the guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability, consisting of four elements: Compensation and Benefits, Organizational Culture, Workforce Analysis and Planning, and Corporate Image. All four aspects were obtained from a review of related literature. It appears that the empirical data are consistent with values of  $CMIN-\rho = 0.140$ ,  $CMIN/DF = 1.120$ ,  $GFI = 0.966$ , and  $RMSEA = 0.015$  with a statistical significance of 0.001. Consistency with literature and empirical data Passed the specified criteria as shown in Table 1 and Figure 5.

Table 1: Observational variables for dealing with labor shortages at the operational level in the business sector, industry for sustainability.

Abbreviation	Description
Compensation and Benefits.	
CB1	Make labor compensation tied to business results and performance results.
CB2	Provides compensation for overtime work, shift work, or special holidays.
CB3	Provide benefits for medical expenses, Health insurance and life insurance.
CB11	Promotion based on ability and performance.
CB15	Create flexibility in working hours and the workplace.
Organizational Culture.	
OC26	Set a clear organizational direction (vision, mission, keys to success, shared values, and goals).
OC34	Effectively communicate your organization's vision, mission, and values.
OC37	Requires everyone in the organization to participate in determining the organizational culture together.
OC44	Give some kind of reward or status and performance evaluation is linked to organizational values.
OC46	Recruit and select talented people with attitudes that are consistent with the organization's culture.
Workforce Analysis and Planning.	
WP52	Determine the types of work groups needed to drive the organization's mission.
WP65	Analyze the difference in workforce (Gap Analysis) both in quantity (Number of Staff) and qualitatively (Needed Skills).
WP69	Consider proactive recruiting, to get the required manpower to keep up with demand.
WP70	Set guidelines for retaining manpower within the organization.
WP72	Create a replacement plan or succession to have continuity in operations.
Corporate Image	
CI76	Appoint executives with leadership and have a public mind.
CI81	Operate your business using the principles of transparency can be checked.
CI83	Communication, public relations, advertising, products and services, and organizational identity.
CI86	Organize activities to reflect social responsibility or return profits to society.
CI91	Provides quality products and services to customers.



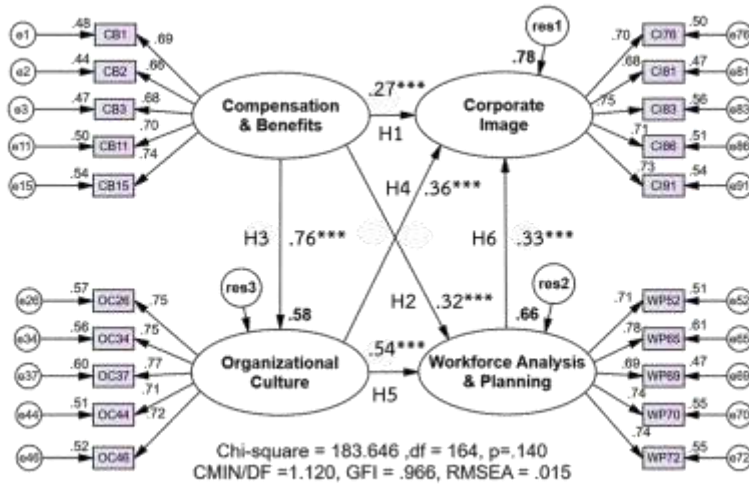


Figure 5: Guidelines for Dealing with Labor Shortages at the Operational Level in the Industrial Sector for Sustainability in Standardized Estimate Model.

Figure 5 shows the results of the analysis of the overall influence of the latent variables in the structural equation model for dealing with labor shortages at the operational level in the industrial business sector for sustainability. After improving the model, it consists of four latent variables. Divided into one Exogenous Latent Variable, namely: Compensation and Benefits, and three Endogenous Latent Variable, namely: Elements of Organizational Culture, Elements of Workforce Analysis and Planning, and Elements of Corporate Image. In the Standardized Estimate mode after model improvement, the greatest overall influence is on the Compensation and Benefits component, having an overall influence on the Corporate Image component with a Standardized Regression weight of 0.79.

### Discussion and Conclusion

From research on guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability. It is a guideline that represents management principles within industrial business organizations administrative and human resource planning Organizations that place a high level of emphasis on this issue serve as models for sharing experiences on issues, and making improvements in the structure and nature of operations to gain success in dealing with the labor shortage situation at the operational level in the industrial business sector to support the mission of the organization both present and future and increase competitiveness from the results of this research The researcher brought the discussion to a conclusion by bringing relevant research documents to support or contradict the following five points:

1) From the results of the research, when comparing the elements of approaches to dealing with labor shortages at the operational level in the industrial business sector for sustainability. Small and medium-sized business organizations (with no more than 200 workers) and large business organizations (There are more than 200 workers). Overall and in each aspect, it was found that there was no statistically significant difference at the 0.05 level. That is, the size of the organization has received great attention from researchers and management writers as a basic element that affects designing the structure and shape of the organization. Some researchers claim that size influences organizational effectiveness and efficiency. And some claim that this is not the case. From the results of research on the influence of the size of the organization on organizational

culture. and the morale of workers indicates that large organizations may want to imitate them. Small companies achieve higher worker morale this is consistent with Connell (2001) <sup>[30]</sup>. Fayol's principle. Fayol said that the organization must have five administrative tasks which include: Planning, Organization, Commanding, Coordination, and Controlling. It is necessary in every organization whether it is a government or private organization. large or small" which is consistent with Kannika (1997) <sup>[31]</sup>. In general, organizations that are stable and have high incomes can pay more compensation to their workers than organizations that are just starting or have an unstable position. But in reality, larger organizations do not necessarily pay the highest salaries in their industry. This is because the stability, reputation, and image of the organization will result in workers' confidence. and have a desire to join the event as well. Additionally, organizations in the private sector tend to return higher returns than organizations in the government or public sector. Because private businesses want to compete fully. Therefore, it requires efficient labor to join the work. This results in an increase in profitability which will be used to hire continuously efficient workers. This is consistent with Kannikar (2014) <sup>[32]</sup>

2) From the results of the hypothesis testing, it was found that the Compensation and Benefits elements have a direct influence on Organizational Culture elements. Has the highest weight of influence line (Standardized Regression Weight) at 0.76 showing the empirical data that Organizational culture influences creativity and innovation, rewards and recognition This affects the creation of an organizational culture in terms of innovation. Consistent with Martins & Terblanche (2003) <sup>[33]</sup>, the effect of compensation, leadership, and job motivation on labor performance is consistent with Widodo (2017) <sup>[34]</sup>. This study was conducted at a university. Islamic private sector in Indonesia. The population of the study was 295 teachers. Research results, compensation, and Islamic work ethics have a positive and significant effect on job satisfaction. Job satisfaction has a significant positive effect on teacher performance, consistent with Jufrizen (2017) <sup>[35]</sup>. In today's competitive business environment, organizations tend to be more customer-focused. Therefore, they recognize the need to create a customer-focused culture and related strategies to gain a competitive advantage. The interdependence of organizational culture and financial and non-financial compensation and reward strategies in creating a customer-focused culture is consistent with Madhani (2021) <sup>[36]</sup>.

3) From the results of the hypothesis testing It was found that the Compensation and Benefits elements have an overall influence on the Corporate Image elements, having the highest influence weight value. (Standardized Regression Weight) at 0.79. Shows empirical data that Having a positive image as an employer in the community and providing high-quality services that make employees feel proud to be a part of the team play an important role in building a positive reputation. Strategies that contribute to the goal of becoming a preferred employer include offering extensive training. Providing adequate opportunities for career advancement and providing good internal support to employees. These activities help in creating positive word-of-mouth communication between current and prospective employees. It also facilitates employee referral programs, in line with Kale (2007) <sup>[37]</sup>. Employment policy affects the image of the organization. Intention to find work and intention to become a member of a labor union One part said corporate wages and growth opportunities it effects attracting labor, consistent with Schwoerer and Rosen (1989) <sup>[38]</sup> . Labor affects the image of the organization. The workers will feel good about the organization. When the organization creates participation in work. Create pride in working with appropriate compensation. There is progress and growth and various benefits, it is all factors that affect the efficiency of the organization's operations, in line with Poj (2015) <sup>[39]</sup>

4) Guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability in terms of Corporate Image, the average was 4.47, which is the aspect with the highest average. The reputation and image of the organization will result in workers having confidence, and have a desire to join the event as well, in line with Kannika

(1997) <sup>[31]</sup> Employer branding through social media tools. It is getting more and more attention. Organizations use social media to build good relationships with customers and workers. It was found that, social media helps in increasing business efficiency and business capabilities. In the same way, social media is also used to build a corporate image. Social media helps in increasing business efficiency and business capabilities. In the same way, social media is also used to build a corporate image. The impact of employer branding through social networks on building an organization's image effects knowledge sharing, labor relations and the labor recruitment process. Employer branding, it helps the organization maintain its corporate image and facing the competition in the competitive world, in line with Rana and Kapoor (2016) <sup>[40]</sup>. Corporate social responsibility (CSR) affects the duties, roles, and activities of the human resources department. (recruitment and employment, training and career development, and workplace well-being) Corporate social responsibility (CSR) positively influences the supportive role of workers Dupont, Ferauge and Giuliano (2013) <sup>[41]</sup>.

5) Guidelines for dealing with labor shortages at the operational level in the industrial business sector for sustainability. It was found that the policy for creating an organization's image was clearly stated. has an average of 4.59 is of utmost importance According to recent reports, the nursing shortage is a worldwide trend. Efforts are being made to change policies to maintain and continually provide quality nurses. This review evaluated 12 studies from 8 countries around the world. Appropriate policies to solve the problem of maintaining the country's nurses and success in increasing the supply of nurses by various policies are as follows: 1) Wage policy. 2) Emergency employment plan. 3) RN Residency Program. 4) Special contract system. 5) Rural subsidy policy, and 6) Recruiting and guaranteeing incentives for nursing graduates and employment full-time government. It can be seen that having a clear policy will help alleviate the nursing shortage Park and Yu (2019) <sup>[42]</sup>. Having a good vision will help the organization motivate everyone in the organization to move in the right direction. Help coordinate the operations of the agency, and human resources with clear directions Achara (2015) <sup>[43]</sup> Declaring a formal vision will help. Workers have a focus on the future and determine the path the business will take. Vision influences business decisions, and helps in creating incentives for workers. A clear vision helps to stimulate workers to practice because workers want to work for the business to have a good image and grow. Amnaj (2010) <sup>[44]</sup>

## Suggestions

This research is a guideline for dealing with the labor shortage situation at the operational level in the industrial business sector. To increase Competitive Advantage, the researcher has suggested guidelines for dealing with the labor shortage situation at the operational level in the industrial business sector as follows:

- 1) The industrial business sector should determine labor compensation linked to skills and abilities as an incentive to work in addition, it may be necessary to compare in the nearby industrial business group or nearby areas, etc.
- 2) The industrial business sector should invest in Automation systems and machinery to reduce the need for labor. In addition, Automation systems and machines help reduce costs, increase quality, increase production ability, and maintain good health and safety.
- 3) The industrial business sector should increase the number of overtime hours as a short-term adjustment. To be able to increase productivity from increased working hours during the period when labor is still not available. Including hiring Outsource workers to be able to find workers faster than recruiting workers ourselves. It also reduces training costs.
- 4) Industrial businesses should consider using proactive recruitment to get the workers they need to keep up with demand. By thinking and planning what must be the qualifications of the workers that the organization needs in the future? The organization will go to find talented

workers. Where can I get it? The organization must go out and recruit from sources that are likely to get the workers we need. Instead of waiting for applicants to apply for the job themselves.

5) The industrial business sector should set guidelines for retaining workers within the organization, to reduce the rate of entry and exit from work. This allows good quality workers to stay and provide benefits to the organization for as long as possible.

6) The industrial business sector should open up opportunities to work with educational institutions to recruit interns and create MOUs together for labor development. Transfer knowledge and prepare workers to enter the organization.

7) The industrial business sector should have a labor demand forecast, that is, a demand estimate, and the supply of labor in terms of quantity Type and quality to reduce the problem of shortage of manpower in the organization Set management guidelines and develop human resource plans to be consistent with and support the organization's strategic plan, and support the expansion of the business.

8) The industrial business sector should create a workforce with multi-Skills that can work in many ways. Multi-skills can make the organization Able to switch duties (Transition) and coordinate (Collaboration) better. Able to plan work better. Better operational results and there is a new way of working that gives better results. It is also better at resolving immediate situations.

9) The industrial sector should create a positive image to help build credibility and attract qualified applicants to the organization. That gives the organization more opportunities to choose the right workforce for the organization. As well as helping workers to have love and commitment to the organization, and reduce the resignation rate as well.

10) The industrial business sector should create a Succession Plan, which is a proactive process that will help reduce the problem of a lack of new workers in important positions. Because it is a strategy that assesses the situation and predicts in advance which workers the organization will recruit, develop, and prepare for replacement. They will be able to immediately recruit people with similar qualifications to replace them. For continuity in seamless management and prevent interruption while waiting for replacement This allows the organization's work processes to continue continuously.

11) The industrial sector should consider expanding retirement, or hiring elderly people to solve the problem of labor shortages in some occupations

12) The industrial business sector should have training to increase the ability of workers to increase their work efficiency. Reduced labor demand due to increased labor productivity.

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