

# **Influence of Employee's Expectancy to Operational Efficiency of SMEs in Dalian City, China**

**<sup>1</sup>Yin Xiaoli, <sup>2</sup>Buraporn Kumboon, <sup>3</sup>Siriporn Sajjanan  
and <sup>4</sup>Suchart Prakthayanon**

Faculty of Business, Bangkokthonburi University, Thailand

Email: <sup>1</sup>dcyxl@outlook.com, <sup>2</sup>burapornkumboon@gmail.com, <sup>3</sup>ssajjanand@gmail.com,  
<sup>4</sup>suchart.prak@bkkthon.ac.th

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## **Abstract**

Any business organization that will be able to succeed steadily and for a long time will find that employees who work hard for the organization play an important part in making the organization successful. This research article aims (1) to study job characteristics that affect work efficiency (2) to study a new model to improve operational efficiency (3) to develop a model of work efficiency of employees in the organization. This research was mixed research using A group of 400 samples. Tools used. to collect data as a questionnaire Most of the quantitative questionnaires were sent by post, individual and in-depth interviews. Data were analyzed by descriptive statistics and content analysis. The research findings were as follows:

1. Regarding the impact of work characteristics on the work efficiency of small and medium-sized enterprises, the research found that we can use the intermediate variable motivation factors affecting expectations to conduct research. Employee work can be determined through wages and benefits, job security, work environment, relationship with superiors and supervisors. Relationships with colleagues to affect work efficiency.

2. In the original conceptual framework, we have a total of 7 assumptions, among which job characteristic has a direct impact on motivation factors affecting expectation, and also has a direct impact on work engagement and operational, but with the help of the SEM model, we found that the second hypothesis: job characteristics have a positive impact on operational efficiency, the current value is -0.87, so it can be concluded that hypothesis 2 is not valid. So, the new model can remove assumption 2 and keep other assumptions.

3. Regarding the development model to improve the operational efficiency of organizational employees, we only need to cancel the job characteristic that has a direct impact on operational efficiency.

**Keywords:** Employee's Expectancy; Operational Efficiency; SMEs

## Introduction

With the ever-increasing market competition, the competitive environment that organizations face is rapidly changing. As well as the diversity of products and services, organizations need to constantly improve their innovation capabilities. And technology has promoted the rapid development of social productivity. and the new economic development situation is both an opportunity and a challenge for Chinese enterprises. All as the diversity of products and services, organizations need to constantly improve their innovation capabilities. And technology has promoted the rapid development of social productivity. and the new economic development situation is both an opportunity and a challenge for Chinese enterprises (Zhang, 2022). In order to get the opportunity for better development and employees are the foundation of organizational development. To improve these capabilities in the final analysis by internal employees to achieve. Employees are the foundation of a business and the key to its success. People are the most active among the three factors of productivity, employees are all the human resources of an enterprise (Chiang & Jang, 2008), and human capital is the most important capital. Therefore, only by organically combining human capital with the material resources of an enterprise can an enterprise effectively creates wealth and have economic and social benefits. Now our country has gradually entered the era of knowledge economy, in the era of knowledge economy, human resources, especially outstanding talent has been unprecedentedly placed in the most important position (Linjee et al., 2023). More and more countries and enterprises believe that talent is the key to success of enterprises and spare no effort to improve and implement more effective policies on personnel (Boonyapraropchai & Premthongsuk, 2023). In the era of knowledge economy, enterprises urgently need many excellent employees to meet the needs of more and more fierce market competition. Therefore, modern enterprise management needs to recruit suitable employees and retain excellent employees (He & Sun, 2023). In this context, in order to retain employees, it is necessary to constantly motivate employees and stimulate their work enthusiasm. Therefore, how to effectively mobilize the enthusiasm of enterprise employees is a very important issue.

It is found that highly motivated employees can create unprecedented value for the company. and is one of the most powerful weapons in competition. This enthusiasm is not the only icing on the cake when the organization is running successfully. But also, the hard work of employees who unite when the organization is going through hardships. This often forces organizations to focus on motivated employees and have high expectations of the organization.

This research selects small and medium enterprises in Dalian. China's Liaoning Province, which It is a coastal city in China. It has a rapid economic development and a good climate. It has a significant advantage in northeast China. As a result, many entrepreneurs are interested in setting up a company. Therefore, in the past few years the number of mid-sized enterprises in Dalian therefore increased greatly. But staff enthusiasm needs to be improved. And the employee turnover rate is high. The findings are that the organization's existing incentives are currently failing to meet employee expectations. Therefore, there are problems such as insufficient incentives. To some extent, these problems all lead to the phenomenon of poor operational efficiency of the organization. This has a serious impact on the sustainable development of the organization.

## Research Objectives

1. To study job characteristic that affect work efficiency
2. To study new model style to improve operational efficiency
3. To develop model of operational efficiency of employees in the organization

## Literature Review

1. SME related information

Ciemleja & Lace (2011) said small and medium-sized enterprises (SMEs) are socially and economically important for their national economies, since they represent about 99 percent of all active enterprises in the European Union.

Culkin and Smith (2008) said SMEs contribute significantly to a country's gross domestic product, national employment, and export performance.

Chen (2006) pointed out small and medium-sized enterprises account for about 33% of the total number of people in the wholesale and retail industry, played a vital role in facilitating the circulation of goods.

Cook & Nixon (2000) said SMEs play an important role in the development process, such as: encouraging entrepreneurship; employing labor intensive technologies for job creation, and they can often be quickly established and put into operation producing quick returns. More generally, the development of SMEs.

From the above information in conclusion, small and medium-sized businesses (Small and Medium Enterprises = SMEs) refer to entrepreneurs in the form of natural persons. A body of persons or a non-juristic ordinary partnership Limited Partnership, Limited Company or Joint Venture which will operate the business of selling goods, producing goods or providing services

2. Theory of job characteristic

Hackman & Oldham (1976, 1980) proposed the job characteristics theory to suggest that five job characteristics produce critical psychological states in the job holder, and ultimately result in a set of positive work-related outcomes.

- 2.1) Skill variety

Skill variety opens in new window reflects the degree to which a job involves a variety of different activities, which demand the use of a wide variety of the job holder's skills and abilities. For example, a routine, repetitious assembly-line job is low in variety, whereas an applied research position that entails working on new problems every day is high in variety.

- 2.2) Task identity

Task identity opens in new window is the extent to which the job holder feels he or she is responsible for completion of a whole and indefinable piece of work, that is, doing a job from beginning to end with a visible outcome. For instance, a chef who prepares an entire meal has more task identity than a worker on a cafeteria line who ladles mashed potatoes.

- 2.3) Task significance

Task significance opens in new window concerns the degree to which the job is perceived as important and having a substantial impact on the lives or work of other people, whether in the immediate organization or in the external environment. For instance, people who distribute penicillin and other medical supplies during times of emergencies would feel they have significant jobs.

- 2.4) Autonomy

Autonomy opens in new window means the degree to which the job provides substantial freedom, independence, and discretion to the individual in scheduling the work and in determining the procedures to be used in carrying it out. A house painter, for instance, can determine how to paint the house; a paint sprayer on an assembly line has little autonomy.

### 2.5) Feedback

Feedback opens in new window is the extent to which carrying out the work activities required by the job provides information back to the job holder about the effectiveness of his or her performance.

In conclusion, job characteristics mean recognition of 5 dimensions of work features is a variety of skills, continuity of work the importance of work freedom and feedback from work.

### 3. Theory of motivation factors affecting expectation

A broad range of motivational theories derived from motivation research such as self-determination theory (SDT) (Ryan & Deci, 2020), expectancy-value theory achievement goal theory (Senko et al. 2011), and control-value theory (Pekrun et al. 2017) have been widely applied to understand the contextual and psychological factors that optimize students' learning and engagement. These relevant theories have been successfully applied to understand the underlying environmental and psychological factors that affect learners' motivation, engagement, and learning. When pedagogical design adequately addresses these needs, students are actively motivated to engage in learning tasks.

### 4. Theory of work engagement

Kanungo (1982) said work engagement refers to a person's positive attitude approach work and feel that my work is meaningful. I also feel that I can manage the tasks I pursue. Pointed out work engagement. Work commitments happen from thoughts and feelings. People's thoughts drive behavior, which will be talked about in general, but it will not be self-evident.

### 5. Theory of operational efficiency

Herzberg et al. (2011). referred to the concept of gives the meaning of “ business management efficiency ” in a narrow sense that it is a cost reduction in production and in the broad sense that is the quality of effectiveness and competence and capacity and in operation business that is considered to be the most effective is to be able to produce quality products or services in the right amount of demand the least cost to take into account the situation and existing financial commitments (Onraksa & Lekhavat, 2023).) therefore, the concept of the term business efficiency there are 5 components: cost, quality, quantity and method in production.

### 6. Theory of expectancy

Vroom (1970) suggested that the relationship between people's behavior at work and their goals was not as simple as was first imagined by other scientists. Vroom realized that an employee's performance is based on individuals' factors such as personality, skills, knowledge, experience, and abilities.

The expectancy-value model of achievement motivations served as the theoretical framework for this study. It is a parsimonious framework and stands as one of the most widely adopted theories for studying student motivation in science and mathematics (Abraham & Barker, 2014; Jiang et al., 2018). This theory embodies two main theoretical constructs affecting individuals' achievement motivation. On the one hand, expectancies of success are conceptualized as internal beliefs about the ability to successfully perform a task or activity.

In conclusion, expectancy theory proposes a theory of the alignment of goal setting with individual needs. Expectancy theory assumes that individuals are thoughtful, rational beings. They have established beliefs and basic predictions about how their lives and careers will unfold. Therefore, when analyzing what motivates employees, we must examine what people want from the organization and how they can achieve their desires.

## Conceptual Framework

This research was quantitative and qualitative. The researcher defines the research conceptual framework based on the theory of Vroom (1970) together with Hackman & Oldham (1976, 1980) The details are as follows.

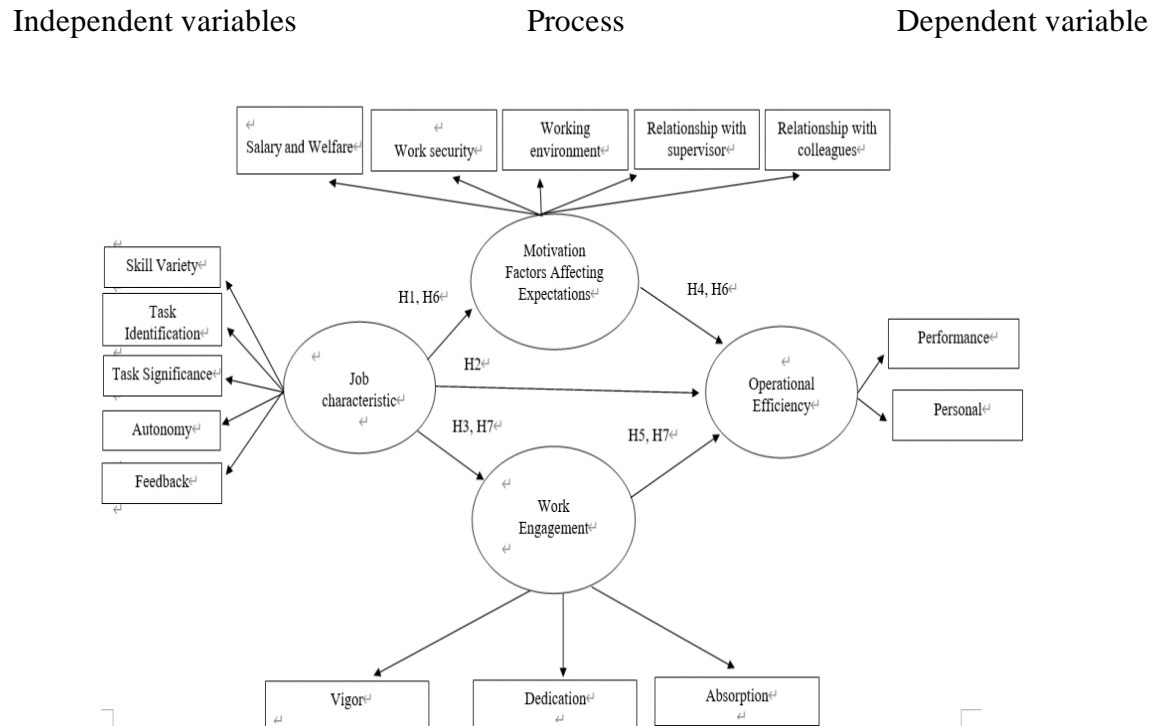


Fig.1. Conceptual Framework

## Research Methodology

### Quantitative Research

#### Population and sample Quantitative

The sample used in the quantitative research were 37,581 SMEs in Dalian. The method of Taro Yamane (1970) was used with a sample size error of 5% or 0.05.

Population size 37,581 (Data source: People's Daily. 2020) Therefore, our research scope is 37,581 it can be determined that the approximate sample is 400.

**Research Tools:** This research uses a questionnaire. which is a popular quantitative method. A questionnaire is a form used for statistics and surveys to present questions in the form of questions. The questionnaire method is a method by which researchers use this controlled measure to measure research questions to collect reliable data. Most questionnaires will be mailed, individually or collectively. The interviewer fills out answers to questions asked on the form.

The questionnaire is selective. For example, the gender of the questionnaire is divided into two types, namely male and female, and there are multiple options for the age range of the questionnaire.

In this survey, I divided the questionnaire into 5 parts,

Part 1: This part of which is personal information, such as: gender, age, education level, job position, working years and other related information, so that you can learn from different cultural levels, people in different jobs are analyzed in order to collect samples of breadth and generality.

Part 2: This part is the information about job characteristics of Dalian SMEs. In this part I mainly discuss from skill variety, task identification, task significance, autonomy and feedback five aspects. This part contains 16 questions.

Part 3: This part is the information about motivation factors affecting expectations of Dalian SMEs. It including salary and welfare, work security, working environment, relationship with supervisor and relationship with colleagues. There are 28 questions in this part.

Part 4: This part is the information about operational efficiency. It including personal and performance. This part we have 8 questions need to select.

Part 5: This part is the information about work engagement of Dalian SMEs, including vigor, dedication and absorption. In this part we have 17 questions.

The statistics used in data analysis: Data collection and analysis the questionnaire was divided into 5 parts. The first part of the questionnaire included personal data which could be analyzed by frequency, percentage, mean and standard deviation. From the second to the fifth part of the questionnaire, we use the Likert scale for the data. We can use native software and SEM models to analyze the collected data.

**Qualitative Research** qualitative research Use open-ended interviews. Speech-based observations and literature reviews that explore concepts and theories.

Population and Sample: The sample consisted of 8 people: managers, supervisors and personnel leaders of small and medium enterprises.

Research Tools: This research used interview research, which is a useful qualitative method. Interview methodology refers to a qualitative research method in which interviewees and interviewees communicate directly to explore and speculate on a particular problem. Researchers designed open-ended questions. This type of question allows researchers to ask questions freely about certain problems. and respondents may provide additional information.

The statistics used in data analysis: To analyze the content and purpose of the interviews, the researchers extracted information provided by eight interviewees. Organize relevant personnel to analyze and deal with the following:

1) Information is grouped according to the interview records according to the four parts of the conceptual framework: Job characteristics, motivation factors affecting expectations, operational efficiency and work engagement.

2) Collect and complete the respondents' answers.

3) Collect the key points answered by all interviewees, analyze and summarize according to the conceptual framework, and write the result report.

## Research Results

To collect data by means of a questionnaire survey in quantitative research. A specific analysis was then performed on 400 collected questionnaires. The specific analysis results were as follows:

Show the number and percentage of respondents classified by gender

Table. 1 Displays gender information of respondents

Gender	Amount	percentage
Male	120	30.00
Female	280	70.00
<b>total</b>	<b>400</b>	<b>100.00</b>

From Table 1, it was found that most of the respondents were female accounted for 70.00 percent and were male accounted for 30.00 percent. Due to the large number of women in Dalian, the number of women selected during the questionnaire is also relatively large.

2 Show the number and percentage of respondents classified by age

Table. 2 Show respondents' age information

Age	Amount	percentage
Under 30 years old	226	56.50
30-40 years old	103	25.75
40-50 years old	51	12.75
Over 50 years old	20	5.00
<b>Total</b>	<b>400</b>	<b>100.00</b>

From Table 2 it was found that more than half of the respondents were under 30 years old, more than a quarter of the respondents were between 30 and 40 years old, 12.75 percent were between 40 and 50 years old, and the remaining 5 percent of respondents were over 50 years old.

Analysis of opinion data about job characteristic

Table. 3 Shows the mean and standard deviation of the opinion level of skill variety

Skill variety	$\bar{X}$	S.D.	opinion level
1. Use a variety of knowledge and skills in operations	3.89	0.87	Agree
2. You can assign tasks according to your professional knowledge	3.89	0.89	Agree
3. Your work is always updated	4.05	0.79	Agree
<b>Total</b>	<b>3.94</b>	<b>0.85</b>	<b>Agree</b>

From Table 3 the mean and standard deviation of the opinion level of skill variety, it was found that the respondents' opinions about skill variety a agree level ( $\bar{X} = 3.94$ ,  $SD = 0.85$ ).

Table 4. Shows the mean and standard deviation of the opinion level of task identification

task identification	$\bar{X}$	S.D.	opinion level
4. You have the opportunity to work on projects that interest you Question 4	4.07	0.81	Agree
5. You have the opportunity to develop and improve your own work	4.08	0.81	Agree
6. Take pride in the work assigned	4.29	0.91	Strongly Agree
<b>Total</b>	<b>4.15</b>	<b>0.84</b>	<b>Agree</b>

From Table 4 the mean and standard deviation of the opinion level of task identification, it was found that the respondents' opinions about task identification a agree level ( $\bar{X} = 4.15$ ,  $SD = 0.84$ )

Table 5. Shows the mean and standard deviation of the opinion level of task significance

task significance	$\bar{X}$	S.D.	opinion level
7. The nature of your work is challenging	3.84	0.90	Agree
8. The work you do is meaningful and important to other people	3.90	0.90	Agree
9. You can achieve a state of great satisfaction with the results of your work	4.11	0.75	Agree
10. Take pride in every job you get done	4.40	0.82	Strongly Agree
<b>Total</b>	<b>4.06</b>	<b>0.84</b>	<b>Agree</b>

From Table 5 the mean and standard deviation of the opinion level of task significance, it was found that the respondents' opinions about task significance a agree level ( $\bar{X} = 4.06$ ,  $SD = 0.84$ ).

Table 6 Shows the mean and standard deviation of the opinion level of autonomy

autonomy	$\bar{X}$	S.D.	opinion level
11. You can work from start to finish by yourself	3.93	0.90	Agree
12. You can work independently	4.23	0.68	Strongly Agree
13. You can make sound judgments about your decisions	4.44	0.75	Strongly Agree
<b>Total</b>	<b>4.20</b>	<b>0.78</b>	<b>Strongly Agree</b>

From Table 6 the mean and standard deviation of the opinion level of autonomy, it was found that the respondents' opinions about autonomy strongly agree level ( $\bar{X} = 4.20$ ,  $SD = 0.78$ ).

Table 7 Shows the mean and standard deviation of the opinion level of feedback

feedback	$\bar{X}$	S.D.	ระดับความคิดเห็น
14. You can follow up and report on your work items at any time	4.41	0.80	Strongly Agree
15. Your supervisor will give you work advice	4.09	0.77	Agree
16. Colleagues will give you work advice	3.80	0.89	Agree
<b>total</b>	<b>4.10</b>	<b>0.82</b>	<b>Agree</b>

From Table 7 the mean and standard deviation of the opinion level of feedback, it was found that the respondents' opinions about feedback a agree level ( $\bar{X} = 4.10$ ,  $SD = 0.82$ )



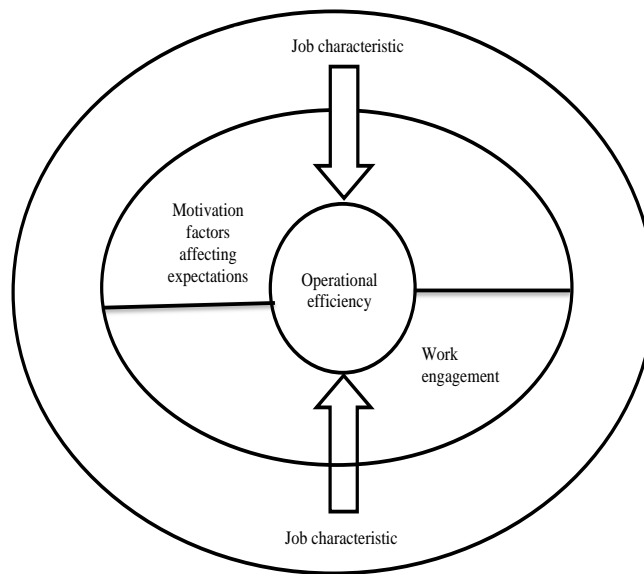
## Discussions

From the analysis of the data, the following conclusions can be drawn: Research Objective 1 To study job characteristics that affect work efficiency. with quantitative and qualitative research methods It was found that the nature of work had little direct impact on operational efficiency. But job characteristics had a positive influence on motivation factors affecting expectations. At the same time, job characteristics had a positive influence on work engagement. Job characteristics indirectly influenced performance through moderately variable motive factors affecting expectations. Job characteristics have an indirect influence on operational efficiency through moderately variable workload, which is consistent with the research of Chan et al. (2020) researched the relationship between employee engagement and satisfaction in the Hong Kong education system. The authors also distributed questionnaires, recovered questionnaires, and used the SEM model for analysis. The results show that the self-efficacy of TAs is positively related to their job satisfaction through the mediating role of work engagement. In my dissertation research, I used work engagement as an intermediate variable to prove that employee engagement in small and medium-sized enterprises will increase employees' enthusiasm for work, enhance employees' job satisfaction, and thus have a positive impact on corporate operating efficiency, and also consistent with the research of Wood et al. (2020) conducted research on the relationship between work engagement and work-life balance in organizations and found that more and more employers began to create a good working environment allows employees to experience work-life balance. At the same time, they use empirical investigation and analysis to find that employees' work-life balance and work engagement are interrelated. In my thesis, I also mentioned that working environment, as a motivating factor affecting employee expectations, acts as a bridge between job characteristics and SMEs' operating efficiency. At the same time, work engagement has the same effect.

From the data analysis according to the 2nd research objective, it was found that it was found that job characteristics had a positive influence on operational efficiency. The proposed value is -0.87, so it can be concluded that hypothesis 2 is incorrect. The new model can remove hypothesis 2 and keep the other assumptions. Implement new models to improve organizational operational efficiency. which is consistent with the research of Robijn et al. (2020) investigate the relationship between engaging leadership and open conflict norms in teams, with work engagement. Based on self-determination theory, the mediation role of basic needs satisfaction between these relationships is proposed. They also used structural equation modelling to score their leaders, teams, and themselves on basic needs satisfaction and engagement, concluding that both engaged leadership and overt conflict norms had an indirect impact on work engagement through the fulfilment of basic needs. In my thesis research, work engagement is used as an intermediate variable, which plays a role in connecting the independent variable's work characteristics and the dependent variable's operating efficiency. And Ta et al. (2022) conducted research on the influencing factors of the balanced scorecard to improve the operating efficiency of listed companies, they believe that the application of the balanced scorecard will have a positive impact on the efficiency of business operations. Therefore, they also conduct research through a mixed research method combining quantitative and qualitative methods, comprehensively using interviews and questionnaires. In the study, the impact of the application of the balanced scorecard on the operating efficiency of listed companies in Vietnam was investigated. The results showed that the higher the application level of the balanced scorecard, the higher the operating efficiency of the enterprise. So far, we have found

that not only employee expectations have a certain impact on corporate operating efficiency, but also the level of application of the balanced scorecard has a certain impact on corporate operational efficiency.

## Knowledge from Research



## Conclusion

According to the research,

1. The job characteristic that employees are assigned affects the efficiency of management within the organization and also affects the motivation to work well.
2. Let the employees receive orders in various fields will have to work in various fields. Assist in the organization and allow unscheduled items. In the organization will help other organizations to be more efficient in their operations.

## Suggestions

From the results of the above research study Recommendations for organizations and government sectors were found as follows:

1) Solve the problem of family placement of highly skilled employees. Solving the problem of family placement and medical care will help employees solve their worries and allow them to work better in small and medium-sized enterprises. This is a very realistic problem. The reason why many high-skilled employees are unwilling to work in small and medium-sized enterprises is because they feel that the supporting conditions of small and medium-sized enterprises are not perfect and cannot help them solve the problems they worry about well, while large enterprises, including foreign-funded enterprises, can better solve them. The work of the employees themselves and their families, the education of their children, etc., so in order to attract high-skilled employees, we should meet their expectations, so as to ensure that they can work better for the company and improve work efficiency.

2) Government policy aspect: Improve the subsidy policy for high-skilled employees of small and medium-sized enterprises. A more obvious status quo today is that the first choice

for high-skilled personnel is often some well-known large-scale enterprises, followed by small and medium-sized enterprises. Therefore, to ensure the healthy and orderly development of small and medium-sized enterprises in Dalian, we should actively absorb excellent high-skilled talents to help small and medium-sized enterprises develop. Therefore, small and medium-sized enterprises should improve high-skilled talent subsidies to help small and medium-sized enterprises accelerate their development.

### **Suggestion for future research**

Future research should explore other issues of the organization, such as how technology can be used to increase efficiency in the organization. Or the motivation that affects the performance of the employees, which will benefit the organization in what areas in this study. Although the list of measurements in the questionnaire survey section were designed with reference to the terminology and scale structure involved in the existing research, they were not included in the survey. Scholars have commented on this. But the universally accepted template is not mentioned yet.

### **References**

- Abraham, J., & Barker, K. (2014). An expectancy-value model for sustained enrolment intentions of senior secondary physics students. *Research in Science Education*, 45(4), 509–526. <https://doi.org/10.1007/s11165-014-9434-x>
- Boonyapraropchai, N., & Premthongsuk, P. (2023). A causal relationship model of factors affecting happiness at work of department stores employees in Bangkok. *Journal of Educational Management and Research Innovation*, 5(1), 147–162.
- Chan, E. S., Ho, S. K., Ip, F. L., & Wong, M. W. (2020). self-efficacy, work engagement, and job satisfaction among teaching assistants in Hong Kong's inclusive education. *SAGE Open*, 10(3). <https://doi.org/10.1177/2158244020941008>
- Chen, J. (2019). Development of Chinese small and medium-sized enterprises. *Journal of Small Business and Enterprise Development*, 13(2), 140-147. <https://doi.org/10.1108/14626000610665854>
- Chiang, C. F., & Jang, S. C. (2008). An expectancy theory model for hotel employee motivation. *International Journal of Hospitality Management*, 27 (2), 313–322. <https://doi.org/10.1016/j.ijhm.2007.07.017>
- Ciemleja, G., & Lace, N. (2011). The model of sustainable performance of small and medium-sized enterprise. *Engineering Economics*, 22(5), 501-509. <https://doi.org/10.5755/j01.ee.22.5.968>
- Cook, P. & Nixon, F. (2000) Finance and small and medium-sized enterprise development. University of Manchester.
- Hackman, J. R., & Oldham, G. R. (1976). Motivation through the design of work: Test of a theory. *Organizational Behavior and Human Performance*, 16(2), 250-276. [https://doi.org/10.1016/0030-5073\(76\)90016-7](https://doi.org/10.1016/0030-5073(76)90016-7)
- Hackman, J. R., & Oldham, G. R., (1980). *Job redesign*. Addison-Wesley.
- He, C., & Sun, P. (2023). Behavioral effects of performance in distinguishing between work connectivity behavior after-hours: Recognition role to compensation payments of workers fairly. *Journal of Multidisciplinary in Humanities and Social Sciences*, 6(1), 289–307.
- Herzberg, F., Mausner, B., & Snyderman, B. B. (2011). *The motivation to work*. Transaction Publishers.
- Jiang, Y., Rosenzweig, E. Q., & Gaspard, H. (2018). An expectancy-value-cost approach in predicting adolescent students' academic motivation and achievement. *Contemporary*

- Educational Psychology*, 54, 139–152. <https://doi.org/10.1016/j.cedpsych.2018.06.005>
- Linjee, C., Rattanavisut, S., Sutthitham, N., & Sangsuk, S. (2023). Efficiency of accounting information system used for enterprise resources planning of small and medium enterprises in Bangkok. *Journal of Multidisciplinary in Humanities and Social Sciences*, 6(2), 851–864
- Onraksa, K., & Lekhavat, S. (2023). Implementing the economic ordering quantity principle for supplier selection: A case study of building store. *Journal of Educational Management and Research Innovation*, 5(2), 305–314
- Pekrun, R., Lichtenfeld, S., Marsh, H. W., Murayama, K., & Goetz, T. (2017). Achievement emotions and academic performance: Longitudinal models of reciprocal effects. *Child Development*, 88(5), 1653–1670. <https://doi.org/10.1111/cdev.12704>
- People's Daily. (2020). *China's attitude and measures towards the epidemic are admirable*. Retrieved from, <https://baijiahao.baidu.com/s?id=1659465579094630859&wfr=spider&for=pc>
- Robijn, W., Euwema, M. C., Schaufeli, W. B., & Deprez, J. (2020). Leaders, teams and work engagement: A basic needs perspective. *Career Development International*, 25(4), 373–388. <https://doi.org/10.1108/CDI-06-2019-0150>
- Ryan, R. M., & Deci, E. L. (2020). Intrinsic and extrinsic motivation from a self-determination theory perspective: Definitions, theory, practices, and future directions. *Contemporary Educational Psychology*, 61, Article 101860. <https://doi.org/10.1016/j.cedpsych.2020.101860>
- Senko, C., Hulleman, C. S., & Harackiewicz, J. M. (2011). Achievement goal theory at the crossroads: Old controversies, current challenges, and new directions. *Educational Psychologist*, 46(1), 26–47. <https://doi.org/10.1080/00461520.2011.538646>
- Ta, T. T., Doan, T. N., Tran, H. N., Dam, T. A., & Pham, T. M. (2022). Factors affecting the application of balanced scorecard to enhance operational efficiency of listed companies: The case of Vietnam. *Cogent Business & Management*, 9(1), Article: 2149146. <https://doi.org/10.1080/23311975.2022.2149146>
- Vroom, V.H. (1970). *Work and motivation*. John Wiley & Sons.
- Wood, J., Oh, J., Park, J., & Kim, W. (2020). The relationship between work engagement and work–life balance in organizations: A review of the empirical research. *Human Resource Development Review*, 19(3), 240–262. <https://doi.org/10.1177/1534484320917560>