

Factors affecting the decision to select suppliers in the Eastern Economic Corridor (EEC)

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Abstract

This article aims to study the factors affecting the decision to select suppliers in the Eastern Economic Corridor (EEC) by reviewing the literature and related research on the issues related to the Eastern Economic Corridor (EEC), the concept and theory of procurement and supplier selection that affect the decision to select suppliers in the Eastern Economic Corridor (EEC). The conceptual framework is defined with the variables of price, service quality and reliability. The dependent variable is supplier selection. Data is collected using a 5-level questionnaire. The statistics used in the research are multiple regression analysis for the decision to select a good quality supplier, which can reduce costs or purchase at a reasonable price and is reliable, and can meet the needs of the business without disrupting or affecting the overall business. Therefore, selecting an efficient and effective supplier will result in more efficient business management and an efficient and sustainable supply chain process.

Keywords: The Eastern Economic Corridor, Purchasing and Supplier Selection selection

1. Introduction

Currently, the Eastern Economic Corridor (EEC) is one of the key projects aimed at promoting the economic development of Thailand. The focus is on developing three main provinces in the Eastern region: Chonburi, Rayong, and Chachoengsao, which are considered areas with high potential for economic growth and improved connectivity for trade and investment both regionally and globally. The EEC project was introduced by the Thai government to enhance infrastructure development in the Eastern region, as well as to attract both foreign and domestic investment. The development encompasses various sectors, including improvements in transportation systems, the promotion of high-tech industries, and creating opportunities for global market competitiveness. The primary objective of the EEC is to increase the economic potential of Eastern Thailand by promoting high-value industries such as the automotive industry, electronics, tourism, and advanced agricultural production technologies. This will help transform Thailand into a hub for production and investment in Southeast Asia. The infrastructure development within the EEC is not limited to industrial promotion but also focuses on critical infrastructure that can link the region effectively with other areas in Thailand and internationally. Examples include Laem Chabang Port, U-Tapao

Airport, and the high-speed rail system, among others. In terms of procurement within the EEC, it plays a crucial role in enhancing the competitiveness of businesses in the region. Since the EEC is an economic hub with a wide range of industrial developments, including the automotive, electronics, tourism, and high-tech agricultural industries, all of these sectors require efficient procurement processes to support production and business operations that grow rapidly and sustainably.

The procurement process is a part of the supply chain process and is an important process in the process of obtaining or ordering raw materials or things necessary in the business process in the industry. The organization must have a supplier who is an expert in procuring, selecting good quality raw materials and being reliable. Therefore, it can be delivered on time in sufficient quantities for production. It also helps to control the cost of raw materials in the production process appropriately. It also affects the planning of storage, distribution and transportation. In addition, the selection of a supplier depends on many factors that the business focuses on and gives importance to. Poor procurement or problematic procurement processes often affect the organization in many ways and cause significant negative effects in both the short and long term. Problems that often arise from poor procurement processes, including the negative consequences, are as follows: 1. Problems with procurement of products or services that do not meet needs When the procurement process is not systematic or decisions are not accurate, the products/services received may not meet the needs, resulting in problems or disruptions in the work of various departments. Because there is a shortage of necessary raw materials Or not of the desired quality May cause time to find a solution or return the product 2. Excessive expenses When the procurement process does not carefully check the price Or there is no good price negotiation May cause the purchased products or services to be priced higher than the market price. Therefore, the company has to pay more than it should be. Which can affect the company's profits in the long term And resulting in a limited budget for investment in other important areas. 3. Delays in delivery may be caused by poor selection of suppliers on time or unclear communication. Delays in delivery can disrupt the company's operations, resulting in missed business opportunities or failure to meet customer needs. 4. Poor quality control, resulting from selecting suppliers without quality control standards or failing to inspect products before use, may result in receiving low-quality products, which will result in wasted time to fix or damage customer reputation if the product or service has a problem. 5. Problems with stock management, may cause stock management problems, such as ordering too much or too little. If there is too much stock, it will result in excessive storage costs. But if there is too little stock, it may not be able to meet customer needs in time. 6. Problems with lack of transparency in the purchasing process without transparent inspection or reporting of results, may lead to corruption or unfair decisions, resulting in a lack of transparency and distrust both in the organization and with the supplier. It may have a long-term impact on the organization's image. 7. Impact on relationships with suppliers, may result in poor relationships, may not receive good conditions from the supplier or may lose the opportunity to negotiate better prices and services in the future.

From the above sources and impacts, including the review of theories and concepts, related research, it can be seen that selecting good suppliers is an important part of a good purchasing process. A good purchasing process is an important factor that can help solve problems that arise. And can greatly improve the efficiency of the business. By using the right concepts and methods to improve the purchasing process, it can lead to good results and create sustainable benefits for the business. On the other hand, if the purchasing is not good, it has many negative effects that can affect the business's operations in terms of cost, time, quality, and image.

Improving the purchasing process to be efficient and transparent is important to enable the business to grow and compete in the market sustainably. Therefore, the researcher emphasizes the selection of suppliers from the literature review, the collection of various concepts, and related research.

2. Literature Review

The Eastern Economic Corridor (EEC)

The Eastern Economic Corridor (EEC), also known as the Eastern Seaboard, is a strategic project aimed at developing the eastern coastal provinces of Thailand, namely Rayong, Chonburi, and Chachoengsao, into key economic zones. The goal is to transform this area into an important economic hub for the country.

The EEC is supported by strong infrastructure and logistics systems designed to accommodate all forms of economic activities. One of its key features is the Laem Chabang Port, a major deep-sea port for international shipping. The EEC has plans to further develop this port into a regional hub for the Indochina trade zone, enabling it to handle an increased volume of container traffic and serve heavy industries like automotive manufacturing.

In addition to port development, the EEC is working on a high-speed rail network connecting Don Mueang, Suvarnabhumi, and U-Tapao airports, which will provide fast and convenient transportation at speeds of up to 250 kilometers per hour. Another significant project is the expansion of Map Ta Phut Port, aimed at increasing its capacity to handle natural gas and liquid cargo, supporting the petrochemical industry and enhancing the country's energy security. Once completed, this expansion will allow the port to handle up to 31 million tons of cargo annually.

To support investment in these sectors, the EEC, in collaboration with the Board of Investment (BOI), offers a range of incentives for qualifying investors. These incentives include exemptions on corporate income tax, import duties on machinery and raw materials for production, land leasing rights, and the ability to own land for business purposes. Additional benefits include financial support for investment and research and development, as well as a One-Stop Service to facilitate business operations.

These initiatives aim to foster economic growth by attracting investments, linking new supply chains, and boosting competitiveness. Furthermore, the EEC plays a crucial role in enhancing Thailand's economic and social stability, positioning the country as a leading force in the global economy.

Concepts and theories of procurement

Purchasing is a process of purchasing by studying the needs, finding sources, selecting suppliers, negotiating prices (Price) and setting conditions that meet the needs, including following up on the delivery of goods to receive goods on time and following up on payment for goods. In fact, purchasing (Purchasing), supply management (Supply Management) and procurement (Supply) are used interchangeably to procure goods and services efficiently and effectively within the organization. Therefore, purchasing (Purchasing) or supply management is not just (Leenders, et al., 2006)

The Ministry of Finance, the Comptroller General's Department (2017), defines procurement as "procurement" means the action to obtain goods by purchasing, hiring, renting, exchanging

or by other legal acts as specified in the ministerial regulations. Procurement must be consistent with the following principles:

- 1) Value for money, whereby the procured goods must have quality or characteristics that meet the purpose of use of government agencies and have a reasonable price. and have a clear and appropriate material management plan
- 2) Transparent: Procurement and material management must be carried out openly, open to fair competition, treat all operators equally, have a suitable and sufficient period for submitting proposals, have clear evidence of operations, and disclose information on procurement and material management at every step
- 3) Efficient and effective: Procurement and material management must be planned in advance so that procurement and material management is continuous and has a suitable time frame, with an evaluation and disclosure of the results of procurement and material management
- 4) Auditable: Procurement and material management data must be systematically collected for the purpose of auditing government agencies to use the principles in paragraph one as a guideline for procurement and material management practices. If procurement does not comply with the 9 principles mentioned above but does not significantly affect the procurement, or is due to an urgent matter, or there is another reason or necessity, the procurement will not be lost.

Concept of Supplier Selection

Donald W. Dobler and Devid N. Burt (1996) mentioned that the decision to select a supplier must consist of 2 steps:

1. Consideration of factors and importance of each factor. The person considering must be involved in the product in each organization, such as the purchasing department, the production department, the design department, etc.
2. Scoring each factor of each supplier, which will be considered from the results of the factors in the past supplier selection. The supplier with the highest total score will be selected.

Dickson (1966) conducted research and presented criteria for selecting suppliers. The criteria were obtained from sending questionnaires to purchasing managers in various industries throughout the United States and Canada who were listed in the National Association of Purchasing Managers. The research results indicated that the criteria that are important for considering suppliers are quality, delivery, and operational history.

Peerapop Chomthong, Nop Khun Saengkheaw, Harsakorn Rotsrisamut, and Chusak Phonsingh (2020) conducted a study on the selection of steel product suppliers using the Analytical Hierarchy Process (AHP). This case study focused on a steel distribution company. To find the criteria for deciding on the most suitable supplier for delivering steel products, this study used 5 main criteria: price, payment terms, delivery time, service, and quality. The data was collected from a questionnaire given to 6 experts. The results of the study found that the most important factor in making the decision was "quality" (48.73%), followed by "delivery time" (18.86%), while the least important factor was "service" (7.72%). For choosing the most suitable supplier, Supplier A received the highest score (43.63%), followed by Supplier C (36.07%), and Supplier B (20.30%). Worapot Sirirak, Haritthirat Chantakhad, Peerawat Luesak, Kapol Jintamarachai, Amornrat Pinchaimun, Somkuan Songwanpang, and Chatchai Sita (2021) studied supplier selection and evaluation. It reviewed and presented important factors related to

supplier evaluation, which significantly affected business operations. In this study, the analytical hierarchy method (AHP) was used in conjunction with Microsoft Excel to process the main factors in the assessment, which consisted of quality, cost, delivery, and price. The criteria used in the assessment were mainly focused on quality, followed by cost and delivery. Additional important factors to consider were environmental management systems, as well as health and safety, which are important elements affecting the long-term development of suppliers and the success of business operations. These criteria are consistent with research reports from many researchers.

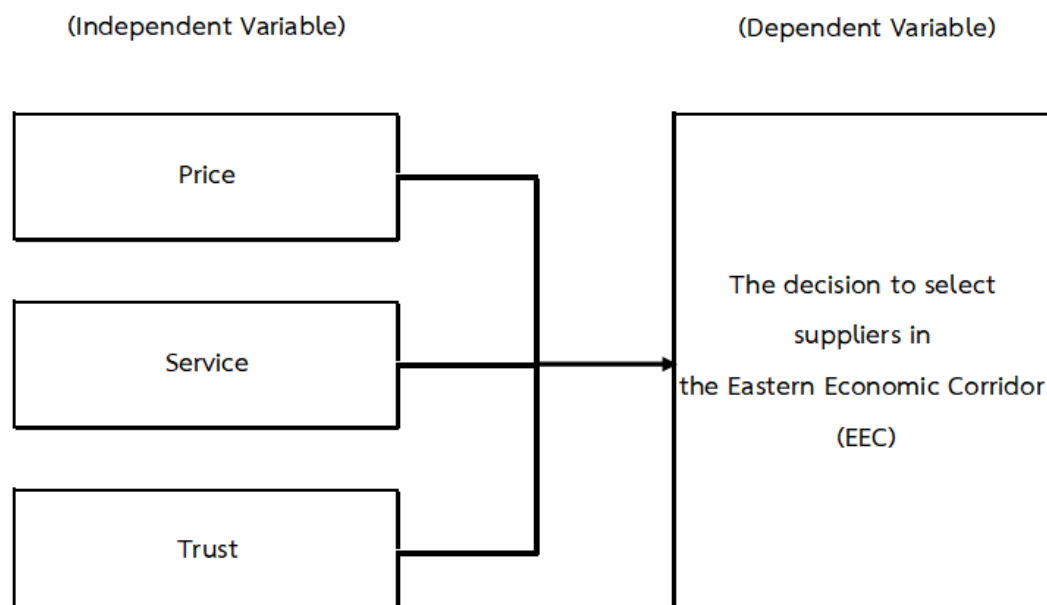
Supplier selection is a process of selecting suppliers by considering several factors, such as price, service quality, and reliability. The selection process has main steps, including setting selection criteria, evaluating and selecting suppliers, negotiating terms, and monitoring supplier performance, in order to obtain suppliers who can effectively support the organization in the long term.

3. Objective

3.1 To study the factors used in the decision-making process for selecting suppliers in the Eastern Economic Corridor (EEC).

3.2 To propose recommendations for selecting raw material suppliers for businesses in the Eastern Economic Corridor (EEC).

4. Conceptual framework



5. Research Methodology

This research employs a quantitative research approach, collecting data from suppliers through a questionnaire divided into six sections:

- 1) Personal Information
- 2) Pricing Information
- 3) Service Quality Information
- 4) Reliability Information
- 5) Supplier Selection Decision
- 6) Suggestions

A five-point Likert scale is used for measurement. Data collection consists of primary data gathered from questionnaires distributed to a sample group of 398 respondents and secondary data from credible sources such as academic papers, books, and textbooks.

The data analysis is conducted using statistical software, ensuring data completeness before processing. Descriptive statistics and inferential regression analysis are applied to test research hypotheses, explain relationships between variables, and systematically summarize the findings.

6. Results

The study found that there were 398 respondents, most of whom were women, aged 31-40, had a bachelor's degree, and most of their businesses were companies and held positions as purchasing officers.

From the study of the factors affecting supplier selection in terms of service, reliability, and price, overall, the service quality was at a high level, ranked from highest to lowest as follows: service, price, and reliability.

In terms of service, the overall level was at a high level. When considering each item, the respondents agreed the most that the supplier could deliver the goods within the specified time frame, and the supplier's communication ability was given the least importance.

In terms of price, the overall level was at a high level. When considering each item, the price of the product per unit was very appropriate. Price negotiation was at a low level.

In terms of reliability, the overall opinion was at a high level. When considering each item, the respondents agreed the most that the duration of the process was the most, followed by the type of registration, and the least that the registered capital was the least.

From the study of the relationship between service factors, reliability, and price, it was found that service factors, reliability, and price had a positive relationship with the factors affecting the decision to select a supplier for Rak Bamrung Logistics Co., Ltd.

7. Discussion of Results

From the study results, it was found that the level of service, trust, reliability and price were found to be at a high level, reflecting that currently, business organizations place great importance on service provision. That is, service provision is an important factor in evaluating and selecting suppliers, including supplier reliability, which is an important factor in deciding to select suppliers to be part of the supply chain. Price is given a lower level of importance than service provision and reliability. Therefore, in developing supplier quality, the importance of service provision and reliability in the eyes of the business sector should be given as an important factor, which is consistent with the results of past research (Kantamon Sakkrajang, Orasa Namsai, Thanarat Rattanakul, Phradon Sosa-at, Worawan Nonthong and Askinah Minsan (2024).

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