

# The Effects of the Government's Construction Contract Administration

Chaiwat Pooworakulchai, Waranon Kongsong, Kijbodi Kongbenjapuch

**Abstract**— This article is analyzed the factors that affect to the construction contract administration of the government. The relationships of the government's construction contract administration principles and structures were presented. The present study is a documentary research one. The data were collected from documents, texts, and printing media. Then, the problems affecting the administration were analyzed and synthesized. It was found that the factors include the initial processes before the administration. Moreover, there are other factors during the administration that could cause the effects at any time. These factors were divided into two groups: internal and external factors. The factors could be controlled if the practices were improved and adjusted according to the construction strategies which will be reduce the effects in contract administration continuously.

**Index Terms**— effect, contract administration, government, construction

## I. INTRODUCTION

The present construction has developed greatly. For the work in the construction project management need to use the knowledge of a wide range of disciplines. To make the construction achieved effectively. In the implementation of knowledge applied in the project. An important topic for the construction project is the construction contract, which the project must be knowledgeable about the contract inevitably. As a saying by [1] “ The basic knowledge of the various departments. In the construction industry need to be there. Is knowledge about contract construction, and covers the various processes involved, contract and contract management.” From the above statement clearly that the administration contract effectively. Need to prepare the contract effective. The drafting and the selection of the contract must be considered appropriate for the project, [2] provided the examples of the factors of contract design such as technical, legal, objective, and limitation.

The construction contracts in present have different details and components, which could be divided from quantity of work, construction employment, and total prices. Most of the government's construction projects used the contract examples created by the committee for procurement

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Chaiwat Pooworakulchai, Dept. Engineering Law and Inspection, Faculty of Engineering, Ramkhamhaeng University, Bangkok, Thailand

Waranon Kongsong, Dept. Engineering Law and Inspection, Faculty of Engineering, Ramkhamhaeng University, Bangkok, Thailand

Kijbodi Kongbenjapuch, Dept. Public Law, Faculty of Law, Ramkhamhaeng University, Bangkok, Thailand

according to the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992). According to the mentioned regulations, procurement must start from identifying requirements, specifying characteristics and details, preparing documents, setting middle prices, scheduling activities, conducting procurements, negotiating with people, and to making contracts.

According to the above regulations, it can be seen that the government or organizations that want construction are the ones starts all processes first. For contractors, they must follow the regulations and details in the contracts. To manage a project' contract, both parties must mutually use documents. However, many constructions had incorrect details that led to conflicts and affect the construction administration. When have some conflicts in the detail, then both parties are bringing the contract to solve the conflicts. If the documents were not clear, then interpretation was needed and led to many obstacles for the construction administration.

Therefore, if the contracts and details were clear, then the conflicts could be solved in order to reduce the effects of the conflicts on the construction administration. This would be tangible for both parties and it could help responsible persons to work peacefully and efficiently in order to complete tasks according to objectives.

[3] Stated that “making contracts and details is a very important process. The practices in the contracts must be clear. If a conflict occurs, the correctness and consistencies of the documents will be necessary. The statements in the contract may also be amended or new statements may be added in order to complete the contracts and meet the requirements of the constructions. This could be done from making construction plans and to amending the contracts in order to efficiently manage the contracts.”

## II. OBJECTIVE

The study of the factors affect to the government's construction administration.

## III. RESEARCH METHODOLOGY

This study is a documentary research study. Relevant documents, textbooks, books, articles, and research studies were collected in order to analyze and synthesize the factors affect to the construction administration between the public and private sectors with descriptions in the descriptive research form.

## IV. RESULTS

### A. The Government's Construction Administration

For the government's construction administration, the

employees must comply with the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992) and the amended. There are many relevant regulations such as No. 72, 73, 136, 137, 138, and 139. By considering the relevant regulations, the government's construction administrators must take actions according to the contracts and details as well as the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992) and amended by controlling activities, verifying and submitting results, accepting offers, withdrawing money, making payments, taking actions about fines and notifications, extending construction periods, and recording the data of projects.

Actually, the processes before the contract construction administration can be summarized as follows.

1. Planning phases – this process includes initially collecting data; accessing projects' appropriateness; and considering choices, compensations, locations, environments, and so on.
2. Decision making phases – this process consists of identifying details such as layouts, requirements, materials, construction plans and methods, and other details. Construction period, methods, and costs can be appropriately specified after the details are identified.
3. Procurement phases – this is to promote competition, to check and analyze construction periods and prices, and to fairly negotiate and make agreements on prices.
4. Phases of the making contract construction – this is used to control and manage construction and to amend and guarantee the construction by referring to the details in phases 2 and 3.
5. Phases of the construction administration – this is for controlling, planning, and managing people, money and contract; modifying the construction according to the plan; and ensuring that the construction is correct and efficiency.
6. Phases of the handover and assuring the quality of the construction.

According to the above processes, it can be seen that all processes are necessary and relevant. For example, the construction price, periods and finance are directly affected by project descriptions, layouts, and construction methods.

For the government's construction administration that follow in command by procurement committee and the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992) and the amended must be followed. Accordingly, the procurement must start from identifying requirements, requesting budgets, making procurement plans, preparing procurement announcements, specifying details, providing documents, setting middle prices, scheduling activities, conducting procurements, negotiating with people, and to making contracts.

The guidelines for the construction administration of the Comptroller General's Department [4] are prepared the manual according to the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992) and the amended. Some parts of the guidelines are related to the contract administration. Accordingly, the head of government agency can consider actions at their own discretion according to the conditions in the contracts. The main conditions are

about contract amendment, abstain or reduce the penalty or the extension of the validity period of contract, right to cancel the contract or agreement and contract administration with supervisors and inspection committees who must cooperate with each other. These are the duties for the contract administration.

There are many parties responsible for the structures of constructions. The first party or employer(s) can be the head of government agency (s), inspection committee(s), supervisor(s), designer(s), and user(s). The other party is the employee or contractor. Some projects may have advisors who may be or not be the supervisors. After studying the construction administration under the Regulations of the Office of the Prime Minister on Procurement B.E. 2535 (1992) and the amended, the duties of the employer are stated. By comparing the contract administration regulations with construction administration principles, the results are shown in Table 1.

**Table 1: Compare roles between contract administration and construction administration**

Contract Administration Roles	Construction Administration Roles
Follow contract instructions and construction details	Follow contract instructions and construction details
– Contract modification	–Control construction quality
– Reduce/exempt penalty fee or extend contract duration	–Control construct cost
– Contract termination	–Control construction duration
–Contract agreement	–Manage construction resources
–Order job changes as appropriate according to handcraft principles	–Manage project risks
–Order job suspension or termination	–Complete construction and fix errors
–Test and control contract procedures	–Record, test and evaluate results for future modifications and examinations
–Record employee's performance	
–Test and check installments	

From Table 1, it is clear that all parties have to follow the contract and contract details. The difference is that contract administration sets only examination, control, change and performance after problem occurs only while project management principles lead to success under contract and details.

Most construction administration is uncertain due to natural factors, organizational constraints, performance changes and performance faults. All changes affect project duration and budget. Many administrative ways are applied to reduce man impacts. [5] Presents Dynamic Planning and Control Methodology for construct administration to reduce change problems and mistakes. In conclusion, policy formulation under the aforementioned methodology is effective with good cooperation.

For construction administration, the employee plays important role in operation for benefit maximization – profit maximization – with clear construction goal. While the

employer manages the administration to maximize public benefits, the project success can be easily achieved with perfect cooperation.

### ***B. Factors Affecting Organizational Construction Contract Administration***

From many study papers, the causes affecting organizational construction contract administration include employers, designers, supervisors/advisors and employees. Each party has his own roles and rights. An employer is to deliver areas and others as agreed in the contract and to pay construction bills by the deadline. A designer is to design patterns, details and materials as specified. A supervisor/an advisor is to examine patterns, constructions and materials. Also, a supervisor/an advisor is to provide information required for further effective construction planning. An employee is to complete the construction planning and to arrange documents, reports and performance for approval.

There are many causes affecting common construction projects including project delays. From the study of Australia's GDP, 10 percent of the profit in construction industry leads to 2.5 percent increase in GDP [6]. As a result, factors affecting value are studied. [7] Focuses on determinants affecting construction companies in Turkey in term construction value. The determinants are divided into 7 groups and they are ranked. The three most important determinants are construction cost, time and risk. The first ranking determinant is design. The determinant classification is divided based on problems. Moreover, some works study about causes of classification. For example, [8] Studies determinant ranking for post-change project delays in Egypt. Ninety-nine determinants are classified with nine major groups including advisor, employee, design, machinery, external, labor, material, project owner and project feature. For the ranking result, late payment is the biggest determinant. Moreover, employer, designer and supervisor are considered. [9] States that "Problems from governmental employment contract come from requirements in partial employment contract. Some section does not cover all details leading to seamy construction performance." [10] conclude the dispute duration (before, between and after dispute).

By considering construction phase and impact duration, there are three phases – early construction, between construction, and post-construction. [11]concludes "ten construction issues including performance extension, contract termination, agreements, modifications, error responsibility, dispute settlement and perform control."

The study about the guidelines of dispute settlement between official sectors and contract parties to present construction contract administration of Rajamagala University of Technology. In cases of penalty exempt or reduction or construction extension, it is found that Regulations of the Office of the Prime Minister on Procurement B.E.2535 (1992) and revision "do not provide clear performance procedures. Also, penalties are set according to other regulations. As a result, the truth analysis cannot be done to exempt or duce penalty fees or cannot extend the construction contract correctly. Also, decisions cannot be made due to mistake awareness." [12] This result shows contract management of government agencies are not

clearly. The stakeholder is not able to administer the contract and construction projects. The attempt to study the cause that can be used in a claim for the omission of the extended time is not only need to understand the type of the causes. But also is an ongoing process and must be able to determine the amount of time the extended. [13] Suggests that delay and damage records are dynamic processes and they need continuity from planning team, along with collaborations from every unit to prepare Extension of time (EoT).

By considering penalty exempt or extension, disputes often occur. In Thailand, disputes are discussed whenever such the case happens. The Head government agency could send case to Committee in Charge of Procurement diagnose every case. There are studies on delay causes in other countries. The causes are either exemptible or non-exemptible. [14] Studies delay causes. It sets the delay scope to be two types – excusable delays (Excusable delays caused by the employer, consultants and design from the outside of the natural phenomenon or things that do not control can be gathered to a class ride and delays from the transport type that cannot be omitted from the fine) and non-excusable delays. (Non-excusable delays caused by the contractor), which study to use for the government in Malaysia. Not only the study of the cause of delays. In India develop program to help determine the cause of the delay is grouped in any type of [15].

The study of variables for time extension in Pakistan by ranking as follows; legal factors, external factors, pattern change, financial shortage of the owner and payment delay. The study provides guidelines for financial policies for further national development [16]. In case of value change, there are studied on construction industry in Malaysia. The factors that affect the value of the cause from a design that is not complete in the steps of tender. The owners want to change the scope of work and the variance of the price of the material. A study to increase construction quality with the least value change. It is necessary to reduce the cause by professionals try to solve the problems and improve cost minimization of construction industry in Malaysia [17].

The research in case of construction contract change of infrastructure construction in the Netherlands, the important causes are scope change and technical necessity for all of the size of projects. For small projects, negligence in contract is a problem. According to the conclusion from the research, policy setters and planners must consider contract flexibility and contract administration for small projects [18]. In Lithuania, there are studies on disputes about unclear drafts. So, construction contract drafts should be involved in clear disputes, contract history and problem preventive mechanisms [19].

The studies of impacts from contract administration cover procurement steps and construction contract alternative decision-making. The study the factors that affect the success of the construction project. In case study on the comparison between the Post Engineer Department (Thai Army) and U.S. Army Corps of Engineers using Project Management Institute (PMI), it is found that administration development is needed. Also, the largest factors affecting project success are pattern change and scope. Moreover, there are problems on lack of professionals. The result recommend the improves the project

management. They should set up team in the management of the project. This team is appointed since the initiatives phase until the end of projects. And also found the factors that affect the success of the construction project of the Post Engineer Department most is the request for change the format and scope project from the User unit, who is not knowledge in the construction techniques and give heed the success of project. Due to lack of the people, who have knowledge in the construction. They focused in the changes by own idea to maximize the organization benefits only. These issues occur from the management and people who have not the knowledge in direct, they have to claim the scope change in project follow the Regulations of the Office of the Prime Minister on Procurement B.E.2535 (1992) NO.136 [20].

Greece divides 9 criteria for contract categorization. They are price uncertainty, scope uncertainty, performance uncertainty, money value, time constraints, quality constraints, personnel fitness, contract complexity, and right condition. From the research result, price-per-unit contract is perfect for application and easier for contract administration [21]. Moreover the research in the impact and procurement for construction project such as [22] States "The study of delay is important for project success and bidding steps need carefulness." [23] Studies procurement of public sector in Malaysia by mentioning priority of the lowest price which lead to corruption and non-standard performance. This research suggest the method of procurement by dividing the part of the bidding, the decisions of the government and stakeholder need the transparency, and can be investigate. Those help to develop the performance in country. When, this research compares the Regulations of the Office of the Prime Minister on Procurement B.E.2535 (1992), which must be handled with the transparent without corruption.] In the tender, Have a goal just low price that affect to the duration and quality control ,who proposed that in the tender must be considered in 3 points ; the construction price , construction duration , and warranty duration by the competitors provide to the owner [24].

Construction administration under risks has many variables. So, risk management is used for decision-making facilitation. [25] Presents risk management on construction administration under many variables such as performance statistics, performance data and possible conditions to facilitate decision-making process. For the barrier variable in the management construction have multiple groups. [26] the ranking of variables affecting construction projects using RII (Relative Importance Index) under nine categories. For project owners, RII = 76.542%, including duration payment. For project consultants, RII = 74.304%, including approval delay.

The Impact incurred as a result of the incomplete contract has conflict and the role is assigned in the contract administration according to the Regulations of the Office of the Prime Minister on Procurement B.E.2535 (1992) that affect to the management as well as the practices. Which are not clear for the agent both parties. Such as determine the work duration, the payment duration and the neutrality from the employer agent. The studies in cause of the delay in the Past projects are the key lesson for creating a new project. If the last lesson are updated before the bidding process or in the

planning stage. However, the construction management has the goal ; good quality on time and low cost, which the 3 points must be consistent with the reason such as the construction is so fast then may cause the high cost in the construction or the best quality is the reason for the high cost in the construction. When consider the cash-flow in the project, period payment are very important part of the project management planning.

Such as the payment plan be unavailable with the construction plans and construction methods, When the project is been the shortage of capital, which affects to the project duration [27] said to prevent the problem in the construction that "Troubleshooting should be will prevent the issue from the first stage", which has a two-stage is the tender stages and construction stages.

Summary problems often since the tender process or the system is not appropriate to the type of work and work styles, etc. Many of the issues occur in the construction, who is duty in the project management, is responsible to solve its lead to project's success.

### CONCLUSION

The government's contract administration set the role for officer according to the Regulations of the Office of the Prime Minister on Procurement B.E.2535 (1992). It is the broad guideline in accordance with laws and penalties for who non-compliance. The appointment is responsible for the extra duty or according to the position. It includes employment contract and other important construction phases. Which are the step before the construction, when has error both of the employer and the contractor often use the contract details. This is used to interpret to the conclusion. It is regardless the project management's principle to achieve the goals. This cause is the litigation problem and person problem. This factors impact from the first process until the end of the project. The causes of any mistakes are divided into internal factors (the details in the contract, creating a contract, creating a drawing, creating a time schedule , the price of construction, delivery construction area, payment, the time extension , change of scope) and external factors (natural disasters, terrorism. the variance of the economic, laws, regulations of the relevant authorities, other authorities). Internal factors can be controlled but external ones cannot.

The regulation of the Council of Ministers and the practices of the government set the management process. The government's construction management is not vary with in the private's construction management but does not apply to improve the appropriate application used to promote and support in the process so that the impact that create problems and obstacles in the government's contract construction management. So that the learning is to follow the Empiricism and phenomenologist blend in with the regulations in the government's construction management. It can reduce the obstacles in construction projects of the government. The regulations are used to promote every phase. If problems are well-solved, construction problems can be minimized and avoided.

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