

CHAPTER 1

INTRODUCTION

1.0 Background of study

Delay and additional cost in a construction project are an inevitable consequence of the risk and uncertainty associated with the execution of any construction project, which is likely to be unique and prototypical in nature. Whilst the risk is reduced by certainty of design and relevant experience in the construction of similar types of project, it is sadly all too common that the project will not be completed within the agreed time of completion. Due to this scenario, it is important to determine the cause of any events which have potential to be the main cause of the delay which will affect the date of completion.

The appointment of engineer or architect as Superintendent Officer (SO) or Contract Administrator (CA) is to act as an agent of the employer to administer the contract on the employer's behalf. The person who holds the CA and SO title is in charge with the responsibility of deciding whether an event is one that gives rise to an entitlement on the part of the contractor under the contract and whether that

events has caused delay and or is likely to affect the date for completion of the work.

Contract period is a period within which the contractor not only must do the work but it is also a license for the contractor to spend that time carrying out the works. In addition, he may plan and do the work in whatever order he pleases. Although he must make sufficient progress to achieve the completion date, there is nevertheless usually an express obligation for the contractor to proceed regularly and diligently with the work. In order to provide further comfort, the employer usually requires the contractor to provide a programme (construction work programme) at the commencement of the work to show the sequences and timing of the activities involved in the construction of the project in sufficient detail for the S.O or C.A to monitor the progress of the work. It is common to use this construction work programme as a basic model against which to consider the effect of delays.

Nowadays, it is believed that by having a proper construction work programme for a project is a smart way in dealing with incoming disputes, especially disputes on extension of time. In Malaysian standard form of contract, only PAM 98 and CIDB 2000 had stated the requirement of preparing work programme in document contract while PWD 203A is silent about it. It is stated under clause 3.4 of PAM 98 and also in CIDB 2000 under clause 5.1. However, the work programme requirement are debarred by clause 3.5 of the PAM 98 and clause 5.2 of the CIDB 2000 respectively from having any formal significance over contractual obligations. The said clauses dilute the significant of the work programme and its contractual effect arising from any aberrations to the programme

Rajoo (1999) stated that the effect of making the programme an express requirement without it being a contract document is that while the contractor may in breach for failure to submit a master programme, he may not be in breach if the series of events are not followed as scheduled.

1.1 Problem statement

In a construction project, if delay occurred and it is believed that the completion date will be affected, the contractor is responsible to inform the SO or CA in writing, identifying the relevant events which caused the delay. It is stated under clause 23.1 of PAM 98, clause 43 of PWD 203A and also under clause 24.2(a) of CIDB 2000 form. In practice, it was found that the contractor normally will state that the delays occurred was caused by employer or it was a neutral event. Due to this, he is entitled to be granted an extension of time and the employer has no right to liquidated damages if the delay were caused by his action. Therefore, it is important for the parties involved to have a proper documented information about the project progress, thus the question of who caused the delay will be answered. In a construction project, delay is normal, therefore it is important to identify whether the delay has the potential to affect the completion date by determining where the delay lies in the critical path or not. For example, it is the employer's fault if he failed to give instruction to the supplier to start delivering material to the site, but does this late instruction really lead to the project to be delayed? Of course there are possibilities that some delays only affect the activities and not the entire project or the critical path activities. It can be said that by having a work programme incorporating critical path analysis, parties can't simply pointing fingers to each other for causing the delay.

Nevertheless, the obligations of the employer's agent when considering the contractor's entitlement to an extension of time are usually defined in subjective terms. For example in case of the PAM 98 Standard Form, in accordance with clause 23.2, architect shall consider the relevant events causing delay and by written notice to the contractor give a fair and reasonable extension of time by fixing such later date as the date for completion. The process of forming an opinion and deciding upon what is fair and reasonable are both subjective requirement. To what based it can be said as fair and reasonable extension of time?

Updated and verified work programme (quality work programme), will be able to show the status or progress of any in contractor's plan of proceeding the

works. It will also be a strong evidence in any dispute which may arise on issues of responsibilities arising from delay to completion from changes of programme sequences and duration of activities. The words quality work programme is a subjective term which there is no specific method or requirement how a work programme suppose to look like. In Malaysian standard form of contract there are no guideline of how to prepare a work programme. Although Rajoo (1999) in *The Malaysian Standard Form of Building Contract (The PAM 1998 Form)* had stated the elements of work programme, it is not defined in any clause in any standard form of contract. He stated that,

..the elements of Work programme is not defined in clause 3.4. As such, it may take the form of a bar chart, critical path, precedence diagram, schedule, network analysis or otherwise. A good work programme should show interfaces with sub-contractors, dated, time frames, activities, stages and more..

Therefore, it is still an issue in this industry the right definition of a good work programme and it had became one of the disadvantages in work programme usage where a good work programme can't be defined precisely.

1.2 Objectives

There are two objectives of this research which writer wish to achieve.

- i. To identify how a construction work programme can contribute in reducing disputes in extension of time.
- ii. To determine the advantages and disadvantages of construction work program usage in construction contract.

1.3 Importance of the research

This research is meant to highlight the importance of having a quality work programme in construction contract. From the theoretical study, by having a quality up graded and verified work programme, it can be a helpful tool in disputes resolving such as critical path analysis which is a main content in a work programme.

The data and analysis in work programme promised valuable information for identifying and modeling delays and their effect on progress and the use of computerized work programme techniques for proving delay is become a practical requirement nowadays. Nevertheless techniques are being considered by the courts and it is now almost inevitable in litigation involving disputes over the extent of project delays that a programming expert will be appointed. Therefore, it is good for the parties involved in a construction project, especially contractor to have a proper documented record such as work programme as a step to help in reducing disputes in the future, although it is still not a legal requirement in standard form of contract in Malaysia.

1.4 Scope

This research will mainly discuss on the work programme terms and provision in Malaysian standard form of contract. There are Public Work Department (PWD) 203A, Persatuan Arkitek Malaysia (PAM) 98 and Construction Industry Development Board (CIDB) 2000. The discussion also will be supported with international court cases, not only focusing on Malaysian court cases.

1.5 Methodology

This research methodology is divided into two types of methods. One is mainly referring to the literature review which found in reference books, seminar papers, articles, magazines and also from internet sources. The other method is to analyse the information gained by compare, relate and support the earlier information with standard form of contract and relevant court cases.

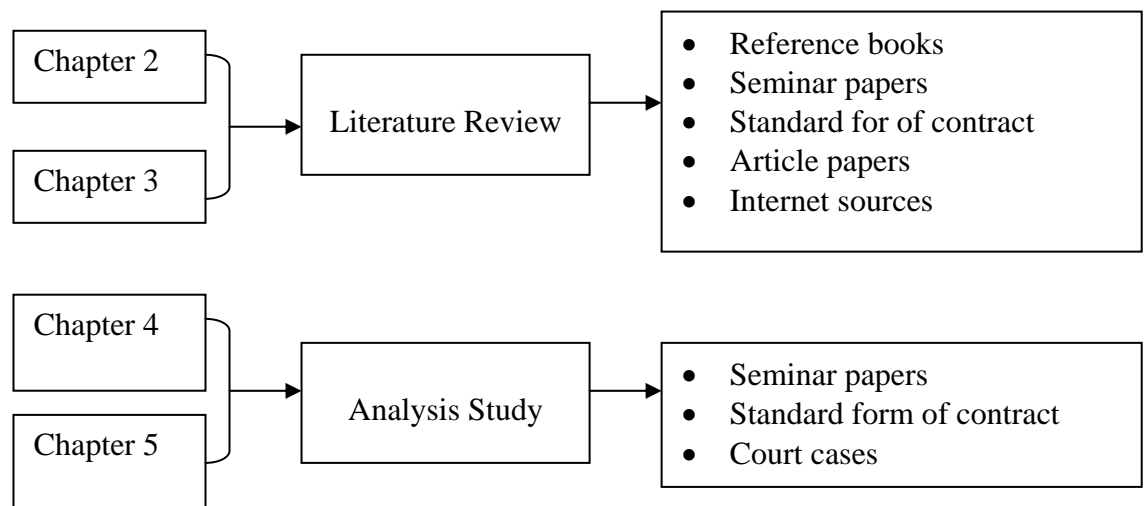


Figure 1 : Research Methodology Flow