



اَبُو سَيِّدِي تَيْكُو لُو كِي مَارَا  
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**Title**

**THE CONSTRUCTION OF SUBSTRUCTURE**

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## **ABSTRACT**

This report simply explained about all the process and method that involved in construction of substructure. It is made based on five month experience at site construction project. This report divided into few chapters which started with company's background and project's background. From the observation, it is clearly shows that the construction of substructure is not as easily as it seems. It included a lot time, money, labor, parties and complicated construction. In this report, it is explained about the type of pile used at the site to construct the pile foundation, the design of pile cap at site, the size of column stump and the construction of the ground beam. During the construction, few problems had occurred especially during piling work and this report has mentioned the way to solve it. As a conclusion, this report provided detail process and method for the construction of substructure.

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<b>CONTENTS</b>			<b>PAGE</b>
Acknowledgement			i
Abstract			ii
List of Content			iii
List of Tables			v
List of Diagram			vi
List of Photos			vii
List of Abbreviations			ix
CHAPTER	1.0	INTRODUCTION	1
	1.1	Introduction	1
	1.2	Objective	31.3
		Scope of Study	4
	1.4	Method of Study	5
CHAPTER	2.0	COMPANY BACKGROUND	6
	2.1	Introduction	6
	2.2	Company Profile	8
	2.3	Organization Chart	9
	2.4	List of Project	10
		2.4.1 Completed Project	10
		2.4.2 Current Project	11
CHAPTER	3.0	THE CONSTRUCTION OF SUBSTRUCTURE	13
	3.1	Introduction	13
	3.2	Project's Background	16
	3.3	Case Study	18
	3.4	Problems and Solution to Overcome It	47

# CHAPTER 1

## INTRODUCTION

### 1.1 Introduction

Malaysia is a rapidly growing country with an advanced and well-planned development. Almost all high-rise buildings and residential buildings have two basic components, which are substructure and superstructure. Substructure is really important in construction because to support load from superstructure and transmit it to the supportive soil or rock.

Substructure will include foundation, column stump and ground beam. Foundation is divided into two types, which are shallow foundation and depth foundation. Usually shallow foundation that be used at construction site is pad, strap, raft, combine and for depth foundation is pile, pier and caissons.

However, only certain foundation that can be applied for certain construction area; therefore, the engineer should to design suitable foundation that can be used in construction site and took some important factor that can be applied to construct the foundation based on soil condition.