# A STUDY OF MANAGING RESISTANCE THAT OCCURRED IN CONSTRUCTION PROJECT

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## SUPERVISOR'S DECLARATION

I hereby declare that I have checked this thesis and in my opinion, this thesis is adequate in terms of scope and quality for the award of the Bachelor of Project Management.

Signature:

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## STUDENT'S DECLARATION

I hereby declare that the work in this thesis is the result of my own research except as cited in the references. The thesis has not been accepted for any degree and is not concurrently submitted in candidature of any other degree.

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**Dedicated to my parents**

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## ABSTRACT

This research was conducted to identify the effective strategy used in managing resistance during project implementation for construction project from the perspective of project manager and project team. Besides that, the objective for this research was to rank the most effective strategy used in managing resistance during project implementation in order to help project manager and project team to be prepared with contingency plan and strategy because every project exposed with the unpredictable things. In this research, the method used for obtaining survey research was questionnaire for collecting the response from the project managers and project team. The Total respondents for this research were 19 from housing developer company that categorized in G2 and located in Negeri Sembilan. Next, Statistical Package for the Social Sciences (SPSS) was used in analyzing these research findings. The result for this research showed that communication plan was the most effective strategy used in managing resistance during project implementation with the highest value of mean. Last but not least, the main suggested recommendation for future research is to study the large number of respondents or participants by include project team from different categories of contractors for more accurate outcome and represent a more realistic population in Malaysia.

# ABSTRAK

Kajian ini dijalankan untuk mengenal pasti strategi yang efektif dalam menguruskan rintangan semasa pelaksanaan projek untuk projek pembinaan dari perspektif pengurus projek dan kumpulan projek. Selain itu, objektif kajian ini adalah untuk menentukan strategi yang paling berkesan yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek bagi membantu pengurus projek dan pasukan projek untuk bersiap sedia dengan beberapa cadangan kontingensi dan strategi kerana setiap projek akan terdedah dengan perkara-perkara yang tidak dapat diduga. Dalam kajian ini, kaedah kajian tinjauan yang digunakan untuk mendapatkan maklum balas daripada pengurus projek dan pasukan projek ialah melalui soal selidik. Jumlah responden bagi kajian ini terdiri daripada 19 syarikat pemaju perumahan yang dikategorikan dalam G2 yang terletak di Negeri Sembilan. Seterusnya, Pakej Statistik untuk Sains Sosial (SPSS) telah digunakan dalam menganalisis hasil penyelidikan ini. Hasil kajian ini menunjukkan bahawa pelan komunikasi adalah strategi yang paling berkesan yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek dengan nilai min tertinggi. Akhir sekali, cadangan utama yang dicadangkan untuk penyelidikan pada masa hadapan adalah untuk memperluaskan lagi bilangan responden atau peserta termasuk pasukan projek dari berbagai kategori kontraktor untuk hasil yang lebih tepat dan mewakili populasi yang lebih realistik di Malaysia.

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# CHAPTER 1

# INTRODUCTION

## 1.0 INTRODUCTION

Construction is an industry that has a huge impact on the economy of all countries included Malaysia. Logically, every implementation of project will have probability to face the resistance, especially among the project stakeholders. Therefore, resistance should be properly managed in ensuring the successful of project.

The purpose of this research is conducted to determine the strategy used in managing resistance during project implementation. Moreover, aim of this research is also to rank the most effective strategy used in managing resistance during project implementation. Besides that, this chapter also discusses on the population of research respondent and the significance of this research. This research is important because the knowledge gained could help project manager and project team in managing the resistance during project implementation.

## 1.1 PROBLEM BACKGROUND

Construction industry is regarded as one of the major contributors towards a country's economy. Almost, it is very difficult and possible to think of any development

activity that does not involve construction. All infrastructure facilities needed for development such as road, electricity, telecom, power projects, and socioeconomic facilities such as school, factories, hospital and many more (Yimam, 2011). Construction is an example of project that has specific time to start and finish. All living and non living things have their own stake in the project. According Keane (2010) from O'Brien (1998), construction projects are complex because they involve many human and non-human factors and variables. They usually involve long duration, various uncertainties, and complex relationships among the participants.

In addition, it also involved various types of stakeholders with different stake and normally they will have different type of interest with different level of project phase. Cooperation from all stakeholders is very important in order to make sure all the progress of the project align with the targeted goals. In the way to ensure we align with project goals, triple constraint is one of the most well known mechanisms that we can use for signifying the interaction of the important attributes of a project. Project manager need to make sure all the stakeholders recognizes the importance of the constraint, so that discussions regarding the scope time and cost far easier.

According to Keane (2010) from O'Brien (1998), changes are common things in the real practical of construction project and it is very important. Even the most thoughtfully planned project may require changes due to various factors. Every stage will encounter different changes and face different type of challenges. Implementation of change in construction project, will welcome for the risks. So, effective steps or strategies are necessary to avoid the risk from happen. According to Lineis & Cooper (2001), it is necessary to find a more effective approach than that of statistical planning and controls in order to reduce the effect of the negative consequences of changes in construction projects. In ensuring the change will be going smoothly and successful, the person or top management who are make a change needs to ensure all the employees very clear about the change. If not, all the project team will get problems in their ways to align with project goals and increase the probability to have issue among them.

## 1.2 PROBLEM STATEMENT

Resistance is the action of opposing something that people disapprove or disagree with. Every activity will immediately suspend if resistance occur especially in implementation stage of project. According to Yimam (2011) from Ansoff (1988), resistance is a complex phenomenon, which introduces unanticipated delays, costs and instabilities into the process of a strategic change. This research focused on resistance came from employees. That is employees resist to change during project implementation stage. According to Elnaseih (2010) from Knights (2002), resistance is an outcome of employees defending their expressions and their identities at the work place. Change affects every aspect of human endeavors, and construction is not an exception.

Sometimes, project needs to introduce changes in anticipation of future problems. This is also one of the precautions plan for the unexpected economic or global condition in future. Though a change process may be vital but often will be resistance to change processes from the workers or organization itself. Based on Bovey and Hede (2001) discuss on individuals social and human aspects may be a risky task to the change implementers. Poorly managed resistance can wreck the project. Employees also the project stakeholder and they have the interest in the project. This is because, they can be affected by any change in project and the employees also can affect the project.

There are several impacts on the resistance from the employees towards the change. Firstly, this might cause employees turnover and employers need to hire new workers if many of them leave the project due to resistance of change. It will automatically increase of the project spending and bad performance on the triple constraint for the project. Next, decreasing in work productivity also one of the impacts of employees resists changing. That is one way to show their reluctance silently. In addition, this likely demonstrates loss of morale of employees. It can be seen by their resist in changing. They even want to know the benefits for the change in current or future situation.

Not only that, there also have indirectly cause for the change. That is impact the work in project planning and procurement for the project. At the same time, if the responsible parties fail to manage this resistance it will effect on employees' motivation. That's mean if a responsible party fails to motivate employees, it will have negative impact on change initiatives in the project. According to Boohene and Williams (2012) from Herzberg (1968), the satisfaction of the drivers of workers performance by the provision of the motivators does not have a positive impact on employees' motivation. However, if employees lack of motivation especially during occurring a change, it influences their motivation negatively. So, the probability resist the change might be increase.

The problem may be caused by the project teams itself or others party. First of all, issue is about leadership in the construction. Usually, construction industry faces major leadership challenges such as those relating to the workforce including dealing with issues such as change or transition, teamwork and communication and many more. If all the project teams have the leadership style, it will make our steps or flows to manage the resistance not too difficult. This is because, once the employees motivated by our leadership style, they will more understand and accept the change. Next, managing the resistance might be hard because of lack information from stakeholders who are involved in the construction project. Employees might be misunderstanding about the change if there have unclear information that only will explain or clarify from certain of stakeholders. So that, the type of strategy used in managing resistance during project implementation is very important and only the most effective strategy will conduct us to align with project's goal.

## 1.3 RESEARCH OBJECTIVES

There are two objectives in this research which are:

1) To determine the strategy used in managing resistance during project implementation.
2) To rank the most effective strategy used in managing resistance during project implementation.

## 1.4 RESEARCH QUESTION

In achieving the goals of this study, there are two research questions that which are focus to:

1) What are the strategies used in managing resistance during project implementation stage?
2) What is the most effective strategy used in managing resistance during project implementation stage?

## 1.5 SCOPE

This research is focus on several aspects such as individual or group involved, type of construction sector and type of resistance occurred. People who are involved in this research are project manager and project team. Firstly, as a project manager, they need constant interaction with stakeholders, which will bring involvement from them as well as complete information to manage the project from start to finish stage. Next, they also have responsibility for the successful planning, execution, monitoring, control and closure. In addition, they also need to be able to perform effectively within tight time-scales. They need to create a positive client environment such that clients remain in a good relationship throughout the contract.

Besides that, project team also plays a crucial roles and responsibilities in project implementation. This is because project team's participation, motivation, capabilities, consistency, and adaptability help promote the effectiveness of team and are found to be a main contributor to project success (Ashley et al. 1987). Project team is a group responsible for executing a project such as consultants, contractors, engineers, and others, who are involved in design, manage and construct a project. For example, civil engineers have a significant roles in manage the project. They involved in several phases of construction such as designing, supervising, managing the project, procuring material, solving problems on the site and etc. Next, contractor also have a vital roles in perform and complete a task that is already assign. They also need to check whether the clients are aware of their duties, satisfy themselves that their staffs are competent and have adequate resources.

This research is focused on the housing developer company that categorized in G2 in Negeri Sembilan that updated from website of 'Ministry of Housing and Local Government'. The type of resistance is related with employee and resistance is focused on 'employee resist to change'. As we know, change is the normal things in any type of project. All the stakeholders whether internal or internal must involved in all situation as long as the project still going on.

## 1.6 SIGNIFICANCE OF STUDY

Construction industry is one of the leaps and bounds industries in most growing country. In order to achieve the goal of year 2020, Malaysian government is taking all the necessary action. One of the actions is to enhance the infrastructure. Infrastructure covers large area of needs include in housing construction (Yahya, 2011). This will lead to establishments of housing construction increase and all the project team need to give all their responsibilities in conducting the project process.

There are several benefits from this study that can give advantages to all project team. Firstly, project team will always be prepared with contingency plan and strategy. The reason is because every project will face with unpredictable things. For example, change in

several things during the project implementation whether it planned or unplanned change. Next, also can give more information to project team how to handle their general workers and take note for the impact to the project if they face any resistance during the project implementation. Last but not least, project teams will give more focused on project goals and triple constraint in the ways to avoid change in their project. Triple constraint is the three attributes that used to illustrate that project management success is measured by the project team's ability to manage the project.

## 1.7 EXPECTED RESULT

In order to achieve project goals and fulfill client requirement, project teams must have contingency plan for anything happen during the project implementation stage. In addition, the entire stakeholder should give all their knowledge and information regarding to the project need. They must be alert with current situation whether among top management or bottom management. The expected result in this study is to know the most effective strategy to deal with employees who resist the change in a residential construction project implementation. Besides succeed in handling the resistance, they also can align back to project's goal and triple constraint. The key attributes of the triple constraint are itemized as Time, Cost and Scope. Not only that, they also do not have to bear the loss, to hire new workers and expertise to consult them to address the resistance. The most important is we can fulfill the entire requirement from client without any complaint from them. Furthermore, we also can predict our bright future business in project construction and will get project tender from people outside. As a conclusion, the construction company can maintain their reputation.

# CHAPTER 2

# LITERATURE REVIEW

## 2.0 INTRODUCTION

As a starting point, it was essential to start with the literature review in order to gain a better understanding of the theories in place regarding resistance management. This chapter is divided into three sections. In the first section, the construction project background is defined. It also includes the type of construction project, stages and individual involved in construction project. The second section discussed on the background of resistance, which includes the definition of resistance in detail, type of resistance occurred in construction project, factor and impact of the resistance towards the individual or group involved. The last section, the definition of strategy is defined and identifies the strategies used in managing resistance.

The purpose of this chapter is to critically analyze and review some of the different literatures and theories currently in place and how they can support the arguments of managing resistance in construction project.

## 2.1 CONSTRUCTION PROJECT

Construction projects are directly related with the strategic vision and mission of the organization. Construction projects are the means of supporting the organizational goals as far as owners of the physical facilities are concerned. Besides that, organizations are always faced with new demands on their physical facilities. So, owners of facilities are continually re-shaping the way they design and organize their work practices, which in turn directly affects the performance of their physical facilities (Whelton, 2004)

### 2.1.1 Background of Construction Project

According to Yimam (2011) from Muriithi and Crawford (2003), project is a temporary endeavor which is conducted following specific cycle of Initiation, Definition, Planning, Execution, and Close to create a unique product, service, or result. Besides that, referring to Yimam (2011) from Stanleigh (2007), project also has a definite scope such as is constrained by limited resource, involves many people with different skills and, usually progressively elaborated throughout its life cycle. In the UK the project definition process is defined to as client briefing. The briefing problem is the process of convert the client's need for a built product into a clear brief for the project development team to implement (Winch et al. 1998).

According to Sunke (2009) from Klein (1999) and Slack et al. (1998), there are several characteristics of project such as objective, uniqueness, complexity, temporary, resources, uncertainty, and life cycle. First of all, objective of the project will define output which is typically referred to costs, quality and timing of the project. Project also unique because it has features which avoid totally reducing its execution to a standardized and always repeatable process. In addition, project also a complex thing because it involved of various sub activities that perform to achieve project goal. Next, project also characterized as temporary work, because project have a start and end date. Project also involved a probability to have uncertainty. Potential causes of uncertainty include inadequate or

inaccurate data, variations in the performance of resources and many more. Last but not least, project also passes through a life cycle which is has a several stages. Normally, the stages in project life cycle depend on the project.

### 2.1.2 Type of Construction Project

According to Debella (2004) from Halphin & Woodhead (1998), there are three major construction categories which are heavy and highway, non residential building, and residential construction. Firstly, construction of highways, bridges, airports, pipelines, dams and tunnel are known as heavy and highway construction. According to Gould and Joyce (2003), construction in heavy and highway sector enables the distribution of goods and people. This sector of construction project is designed principally by civil engineer backgrounds. This is because of the complexity of the projects and the importance of equipment, and relatively few firms are involved. Most heavy and highway project are publicly funded because they serve the public's need. There are two type of non residential building which are Building (Institutional and Commercial) and Industrial. In building construction is consist of institutional and commercial construction such as construction of schools, universities, hospitals, warehouses, government buildings, recreation centers and many more. There are some specializations in this sector. For example, commercial structure such as shopping mall is built for quickly turnaround and focus to marketing and retail image (Gould and Joyce, 2003). While, for the industry building is familiar with all the light and heavy construction such as construction of petroleum refineries, petrochemical plants, nuclear power plants, etc. Lastly, residential construction is also one of the major construction industries. In residential construction, it involves the development of single family homes, multi unit townhouse, apartment and condominiums.

This research is focus on residential construction sector. According to Franca (2012), residential construction sector plays a vital role in society's wellbeing as it provides shelter, employment and promotes economic growth. Besides that, residential construction also plays a crucial role in fulfilling the socioeconomic needs of the population. Figure 2.1 shows projects by category of work in 2012 and Table 2.1 shows the number of projects by

categories. The figure describes that residential construction is highest in 2012 compared with the previous years. This is parallel with the increasing of population in Malaysia every year.

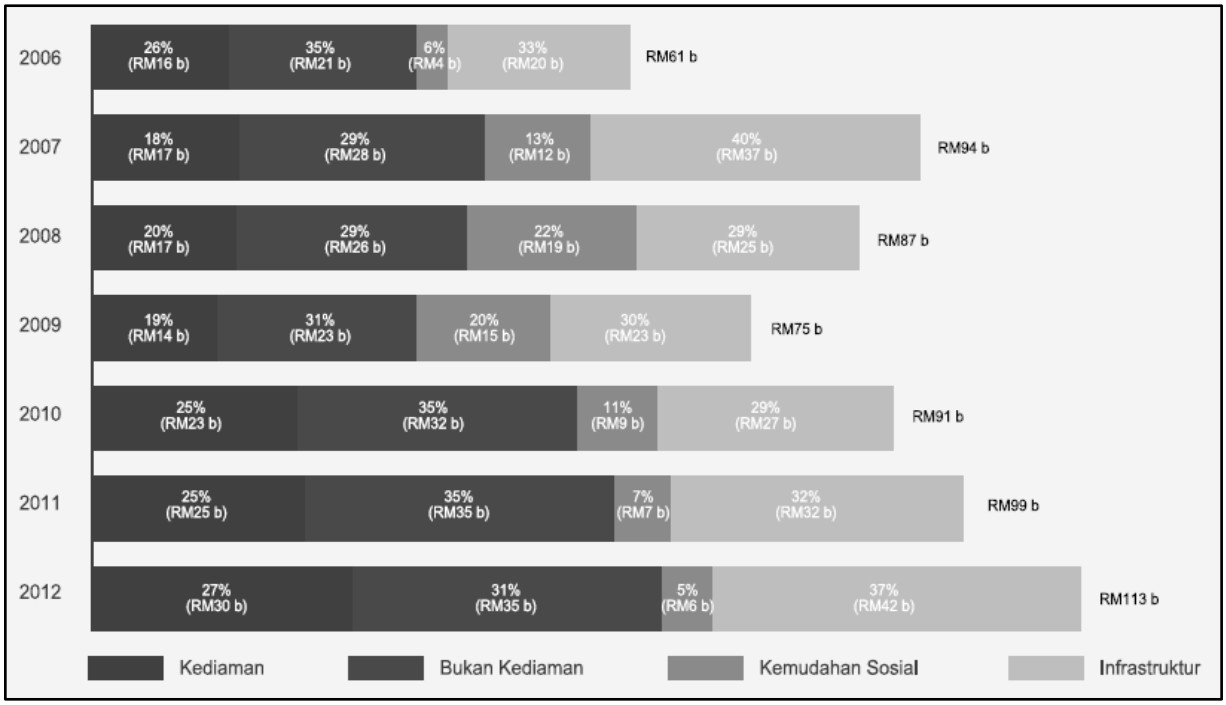


**Figure 2.1**: Projects by Category of Work in 2012

Source: CIDB Malaysia (2012)

**Table 2.1**: Number of Projects by Categories

| Kategori | 2006 | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 |
|---|---|---|---|---|---|---|---|
| Kediaman | 1,732 | 1,868 | 1,489 | 1,702 | 2,132 | 2,207 | 1,968 |
| Bukan Kediaman | 2,060 | 2,348 | 2,209 | 2,103 | 2,558 | 2,483 | 2,326 |
| Kemudahan Sosial | 596 | 1,381 | 1,260 | 1,510 | 858 | 843 | 780 |
| Infrastruktur | 1,536 | 1,794 | 1,588 | 1,744 | 1,749 | 1,928 | 1,696 |
| **Jumlah** | **5,924** | **7,391** | **6,546** | **7,059** | **7,297** | **7,461** | **6,770** |

Source: CIDB Malaysia (2012)

**Table 2.2**: Population by Ethnic Group in Malaysia

| | Unit | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 |
|---|---|---|---|---|---|---|---|
| **Population by Ethnic Group** | | | | | | | |
| **Malaysian Citizens** | '000 | **25,423** | **25,848** | **26,264** | **26,618** | **26,974** | **27,336** |
| **Bumiputera** | '000 | 16,943 | 17,293 | 17,677 | 17,962 | 18,251 | 18,546 |
| Malay | '000 | 13,772 | 14,032 | 14,322 | 14,546 | 14,772 | 15,003 |
| Other Bumiputera | '000 | 3,172 | 3,262 | 3,355 | 3,417 | 3,479 | 3,543 |
| Chinese | '000 | 6,315 | 6,373 | 6,430 | 6,475 | 6,517 | 6,559 |
| Indian | '000 | 1,884 | 1,905 | 1,925 | 1,943 | 1,960 | 1,977 |
| Others | '000 | 281 | 278 | 232 | 239 | 246 | 253 |
| **Non-Malaysian Citizens** | '000 | **2,145** | **2,233** | **2,325** | **2,346** | **2,363** | **2,379** |
| **TOTAL**[1/] | **'000** | **27,568** | **28,082** | **28,589** | **28,964** | **29,337** | **29,715** |

Source: Economic Planning Unit, Prime Minister's Department (2013)

### 2.1.3 Stages in Construction Project

According to Gajewska and Ropel (2011), phases in construction project also known as Project Life Cycle (PLC). Every project has their own time frame, which is time to start and time to finish all the activities or process. In engineering world, this starts and finish or end concept used to systemize projects over time. In having a good time frame management, it will prevent or reduce risk happened in the project. Project life cycle also used as a management tool in improving project's performance. The scope of life cycles differs among industries and will have varied number of phases that is depending on the sectors of the project. According to Gajewska and Ropel (2011) from Smith et al. (2006), even though a number of phases in project can be various, it will have a several terms is always used in particular sector.

Based on Gajewska and Ropel (2011) from Smith et al. (2006), they conclude that different types of project will have its own various forms of project life cycle frameworks. For example, in construction project the PLC model can contain of eight phases such as

pre-feasibility, feasibility, design, contract or procurement, implementation, commissioning, handover and operation. According to Wesland (2006), described PLC has the four phases which are identifies initiation, planning, execution, and closure as principle project steps.

To describe more the PLC in construction project, this research adopts the PLC framework presented by Bennett (2003). This framework consist of six phases which are pre-project phase followed by planning and design, contractor selection, project mobilization, operations, and close-out and termination phase its graphic illustration is presented in Figure 1. In order to manage the complex project, we need to have a special approach and proper modification in the PLC that can bring benefits to project management and its performance.

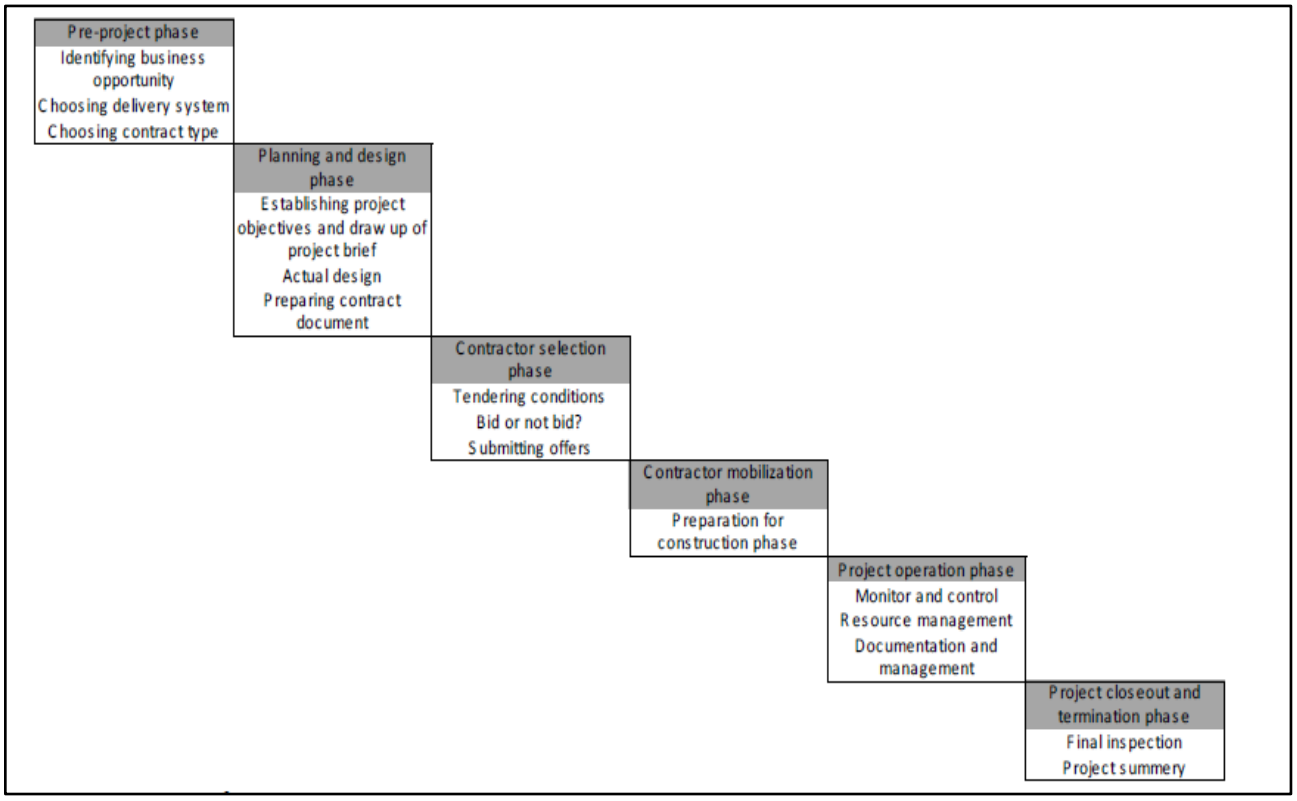


**Figure 2.2:** Project Life Cycle for a Construction Project

Source: Bennett (2003)

First of all, the pre project phase is to develop an idea for the potential project. In addition, Westland (2006) said that this first step describe more on developing business opportunity which includes identification of a problem which could be further developed in the project. Not only that, according to Westland (2006), the factors which should be determine by the time the proposal is present to a potential sponsor are initial problem description, its scope, time frames and an outline of a plan for activities and steps in next phases of the PLC.

The second stage is planning and design phase. According to Bennett (2003), this phase usually longer than the others. This phase also has significant impact on project success (Zwikael and Sadeh, 2007). This stage consists of three sequential steps that can make the project delivery more convenient. Based on Bennett (2003), start with formulating the project organization. In this step, we will define all the main actors in the project and their roles along with competences which are assign for every position in the particular. Next step is implement site investigation and constructability analysis. The purpose for constructability is to determine whether a proposed structure is easy to build and forecast the effect will it have on schedule, budget or safety. Last but not least, development of a contract document also include in this phase.

In third stage, contractor is selected. There are several criteria that will be consider in this selection phase, such as qualifications, bid price and compiled in a criteria matrix. Next phase is project mobilization phase. In this phase, contractors have responsibility to apply any type of necessary licenses and permits prior to start construction works. In addition, computer software also use in this phase to detail the schedule, cost estimation and etc (Bennett, 2003).

The scope of this study will focus on the fourth phase which is project operation phase that also known as executions phase. According to Bennett (2003), there are three keys activities that include in this phase which are monitor and control, resource management and documentation and management. During monitor and control phase, it covers supervision of, among others, time, cost and quality. The person who is undertakes this management process is project manager. They need to ensure all works align in track.

The schedule drawn up in previous phases was compared to the actual schedule and work progress. If any confusion or discrepancies are detected, a person who has responsibility will take the action in order to make sure all works smoothly done and conformance. In addition, all the actual works of the project are implemented in the execution phase (Slevin and Pinto, 1987). For example, materials and resources are procured, the project is produced, and all the performance capabilities are verified. In addition, during execution phase will incurred high time, money and effort compared to conceptual phase (Debella, 2004). Figure 2.3 shows, the money, time, and effort required in conceptual phase is lower than execution phase.

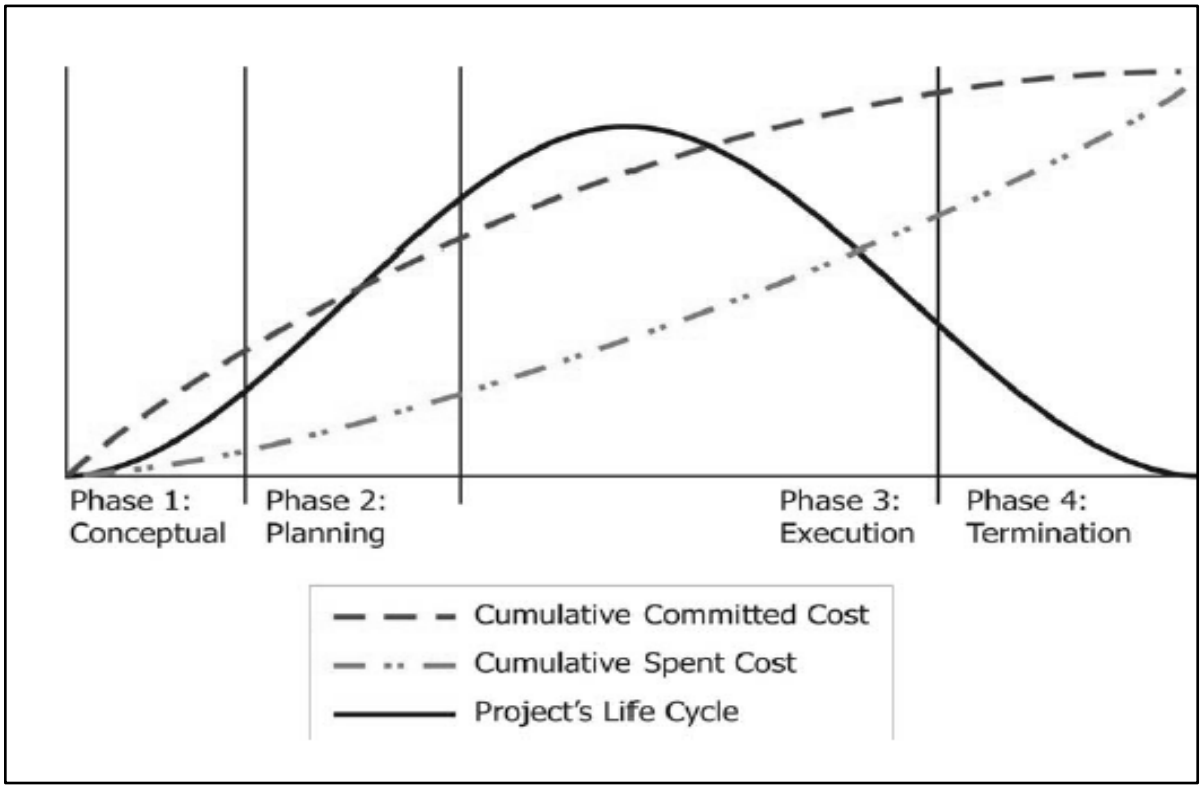


**Figure 2.3**: The Cost in the Project's Life Cycle

Source: Debella (2004)

Last but not least, project close-out and termination phase also one of the important phase that consist of several activities such as final clean up, inspection, handover to the owner and the project closure (Bennett, 2003). According to Westland (2006), this final

stage also the phase that we give possibility to draw conclusions for the next projects to improve their performance. In addition, all the initial planned activities such as cost, schedule or scope are compared to the completed activities to assess how the product was delivered in comparison to the plan.

### 2.1.4 Individual / Group Involved in Construction Project

In order to have a good project performance, project team need to be formed early of the project. As well-known fact that the members of a team perform much better than just a group of individuals is one reason why we need to form a project team early. Team's members may be able to cover many types of roles or there may be a sub team that focuses on specific area according to their own expertise. Project teams consist of engineer, contractor and others, who are involved in design, manage and construct a project. First of all, project manager is the first person assigned to a project (Gould and Joyce, 2003). Project manager responsibilities are to construct the project team, schedule the job, and set up the cost control system. Other than that, project manager has responsibility in planning and controlling the project resources efficiently and ensure the entire project complete within the schedule, budgeted cost, and quality. For example, project manager have responsibility in set up the team, training, communication and etc. According to Abu Bakar et al., (2011), successful of project manager in their project is dependent on their competency, leadership style comprising emotional intelligence and management focus as well as intellectual capabilities.

Next, civil engineers also have a significant roles in manage the project. They involved in several phases of construction such as designing, supervising, managing the project, procuring material, solving problems on the site and etc. The phenomenon in construction industry is people always expect civil engineers to perform a multi task of job. To show the importance of civil engineer is when they saying that 'An engineer hired, is equal to a quantity surveyor, a designer engineer, a project manager and an on-site engineer. According to Gould and Joyce (2003), 25% to 65% of construction costs going to

engineered systems. At the same time, they must understand an owner's requirements such as budget, operation, durability and etc. There are several types of engineers such as structural engineers, mechanical engineers, electrical engineers, civil engineers and surveyors.

According to Zahrani (2013) from Banki et al. (2009) the successful of construction project is highly related to contractors. Based on Zahrani (2013) from Baykasoglu et al. (2009), the most suitable contractor selected is the crucial thing in ensuring the successful of the project. Besides ensuring the overall quality of the project, probability to save cost also increases. There are several roles of contractor which are ensuring co-operation and co-ordination between parties involved in the project, prepared construction phase plan, make sure that welfare facilities are in place and all the workforce is inducted, informed, trained and consulted. Besides that, contractors also need to ensure all the risks is identified, assessed and managed.

## 2.2 RESISTANCE IN CONSTRUCTION PROJECT

### 2.2.1 Definition of Resistance

Various definitions for resistance come from different authors. Resistance known as a multifaceted phenomenon, which can caused unanticipated delays, costs and instabilities into the process of a strategic change (Ansoff, 1988). In addition, according to Mutihac (2010) from Piderit (2000), resistance was described in three main dimensions and one of that is he said that resistance as a behavior. Next, according to Mutihac (2010) from Zander (1950) said resistance was the behavior which can intend to protect an individual from effects by the real change. Other than that, Folger and Skarlicki (1999) described resistance as an employee behavior that try to challenge, disrupt or invert prevailing assumptions, discourses and power relation.

### 2.2.2 Type of Resistance in Construction Project

This research will focus on resistance to change from the employees. In anticipation of future problems, changes are compulsory in an organization. There are many reasons that conduct change in construction project. Any addition, elimination or other things that can affect the projects goals are known as project change. According to Erdogan (2005) from Lazarus and Clifton (2001), expand the meaning of project change by said that change in project is anything that can affect the scope, cost estimating, duration time required, project team relationships, risk management and the form of procurement in the project. Referring to Erdogan (2005) from Lazarus& Clifton (2001), they divide the factors of changes at construction project into two parts that is external and internal reasons. In external reasons, changes are occurred relate to the economic and financial issues. To facing this issue might be compulsory to project organization makes a changes in order to avoid project from fail. Environmental, ecological, technology, standards and regulations issues also some of the reasons changes in project construction occurred. There are also a lot of project changes come from the internal reasons. For example, changes in project plan execution, contract disputes, design improvements or design error and organizational culture. In addition, unexpected weather condition also can be one of the reason project changes occurred.

Nevertheless, resistance to change often occurred among employees. According to Smith (2005) said some of people are welcomed to the changes that might be who are the early adaptors to the changes. Meanwhile, others may be resist the change and maybe vigilant to examine change before accept the change. According to Senaratne and Kuruwita (2010) from Waddell and Sohal (1998), resistance was a constructive tool for success of change process that recognized by some of the academics. So, management may look for ways of utilizing rather than overcoming it.

### 2.2.3 Factor of Resistance

There are several factors of resistance to change among employees in construction project. As we know, employees also a stakeholder in the project. This is because they also a group which can affect or is affected by the achievement of the organization's objectives (Freeman, 2001). So, any of resist from employees can immediately affect the project performance and enhance the probability of project fail. First of all, many of employees resist changing because of their disappearance of social status within the organization and the ignorance of their skills in the preceding stetting (Lawrence, 1954). In changing it will have the probability to gain or lose something good or bad. It's good if we gain or achieved something can give benefit to us, but how if otherwise, it will definitely make people fear and resist the change. Based on Kotter et al. (1979), the reasoned employees' resist changing is they fear to lose something of value. Not only that, misunderstanding towards the change and its implications also one of the reason they cannot accept the change. Employees think the change does not make sense at all and lack of tolerance also the factors employees resist the change (Kotter et al., 1979). Lack of tolerance means less of level on try to understand the change. When this happen, it will make someone or groups look down through the change and immediately resist it without know the positive impact to them especially to the project goals. To conclude that, communications also play the important role in managing change in project construction and the same time prevent employee's resistance towards change. Proctor and Doukakis (2003), lack of information about the change can cause employees resist to changing. So that, communication is a tool to delivered the change's information and prevent miscommunication.

Levels of trust also play a crucial factor in resistance. Trust also the crucial thing in develops a bonding between groups especially in an organization. They also need to cultivate trust among them in order to achieve organization goals. Besides that, in having a high levels of trust between each other will help us to face all the constraint or barriers occurred during project implementation. According to Coch and French (1948) said that the group who have high levels of resistance to change is employees. They also found that the levels of trust in management of employees also low. In the simple understanding, they

conclude that the level of resistance to change will decrease if the level of trust increases. Employee do not really confident towards the change agent also one of the factor (Weinbach, 1984). We can conclude that, to have a full confident level with someone will need a trust to them. So, in the same time we can give them support or encouragement in doing the certain job.

### 2.2.4 Impact Resistance

Impact also known as an effect or influence of something. It might be positive or negative impact. There is not a big issue if the situation received a positive impact but diff if there is a negative impact. This is because it will cause in undue things happen to the project or organization. For example, the projects unable to follow project triple constraints. Besides that, the entire stakeholder involved will be affected by the impact.

According to Senaratne and Kuruwita (2010), there are several impacts in resistance to change among employees in construction project. First of all, from a case study showed that when there is an employee resistance to change will caused the rose up the tendency and amount of staff turnover. This is because they feared for their career or job. One manager believed that the main factor of employee's turnover is because of the change. Besides that, they come out with various reasons in make sure their resignation process success. Not only that, for those who are not quit from the organization they will less or decreased in their productivity of work. It also critical issues because the level of productivity for every employee's work is the term or thing used to forecast the client satisfaction in our commitment in doing their project until finish. As a simple word, it will affect the entire stake involved in the project. Not only that, Schiffer (2011) revealed that resistance also can affect all the organizational change efforts. In addition, for the long term impact, company of construction will lose their client royalties, decrease the company reputation and etc. Next, reduced their commitment in the construction project also way they show their reluctance to accept the change. This is because the top management of the project does not allow they to participate in the change process or to give their views, ideas, and decision towards the change that will be implement in the construction project. As a stakeholder in the project, they fully not have a stake to get involved in the change.

According to the case study, they also expressed their dissatisfaction about top management do not give them any chance towards the change. Not only had that, because of the poor in managing the change by the top management in the construction project also caused some of the managerial level employees also leave the organization project, especially middle level (Senaratne and Kuruwita, 2010).

## 2.3 STRATEGY USED IN MANAGING THE RESISTANCE

### 2.3.1 Definition of Strategy

Strategy is a plan of an action in a way to achieve something in short-term or long-term. According to Nickols (2012) from Henry Mintzberg (1994) has clarified in his book 'The Rise and Fall of Strategic Planning' about the definition of strategy. People always used strategy in 4 different ways which are plan, pattern, position and perspective. Plan described how people getting from here to there while, pattern means in actions over time. Strategy also states as a position that is influent an organization to offer particular products or services in particular markets. Last but not least, strategy also known as a perspective which are vision and direction. Vision is a crucial thing in infuse the spirit and ensuring employee's workflow or performance align with project goals.

Besides that, strategy is also something that related to tactics. It is all about the way how we want to get something or achieve goals. Strategy and tactics will narrow the gap between goals and steps. While narrow the gap, we also need to allocate the resources then employ in the course of implementing a given strategy until achieve organization's goals (Fred Nickols, 2011). Not only that, strategy also related to SWOT analysis. That is consisting of internal strength and weakness and external opportunities and threats. According to Hax and Majluf (1986) from Argyris (1985), strategy is a response to those internal and external forces. This is because to form and implement a strategy, we need to identify those forces. After that it easier to us in step of implementation such as design the structure, define roles, hire appropriate individual or groups, and finally develop the appropriate reward or appraisal in keeping their motivation to make contributions.

### 2.3.2 Types of Strategy

In order to achieve project's goals, we need to have a strategy in managing resistance to change among employees. Implementation of good and strategic strategy will reduce this resistance and later will make employee accept the change and continue doing their responsibility. Not only that, if employee can accept the change, project timeframe will be going smoothly. There are several strategies in managing employee's resistance to change in project implementation stage.

Firstly, implementation of communication plan is one of the strategies that can help in managing resistance to change among employees (Denise Laframboise et al., 2002). Good communication plan will ensure the news concerning the change is successful received by the employees. Project team will have the responsible in good communication planning. The communication plan should consist of all about the change such as when, where, how the employees will receive information about the change. The communication plan should include preliminary information on the project, which can affect and will be affected, and where the employees will be able to find more information about the change. Besides that, during draft the communication plan, they need to ensure employees plenty of notice prior the change date. Not only that, in having a good communication plan, they need to have a formal announcement such as meeting in the proper room so that all employees or stakeholders have opportunity to hear directly from senior management and if they have an objection, they can directly speak out. This session also can give chance to senior management to address fears and concerns about the possibility of downsizing. Besides that, according to Denise Laframboise et al. (2002), in the meeting, senior management also can tell them about the guaranteeing a degree of job security and this way also the most effective ways to reduce employees fear of change.

Next strategy is employees' involvement. Allowing individuals to participate in the change process is known as one of the most popular strategies undertaken to combat resistance (Chirico and Salvato, 2008). This strategy allow employee to get involved in the

change process. According to Vithessonthi (2007), employees' participation in making decision will help to reduces resistance. Besides that, it also can enhance two way communications and deliver an implicit message to employees that they are valued and trusted by organization. According to Self and Schraeder (2009), in order to regain confidence as a credible leader and to remain two way communications, leader should directly involve to the change, attending training with employees, listen their comments with an open minded way, and serving as a backer for the employees during times of dispute.

Thirdly, according to Marker (2012) to CRED (2009), link the change to relevant issue also one of the strategy to manage resistance to change among employees. No one wants to lose something priceless in their life. This strategy can be shown by bond the change to issues of health, job security, and other things that have value to them. So that, they will look the change as a compulsory action in ensuring they will not lose anything. In addition, resistance also can be reduce by ensure employees clear about the benefits they will get from the change (Heathfield, 2014). For example, get recognition from boss, increase of salary, and etc. So, they will give full commitment to the change activities with hoping they will get the benefits at the end of the implementation stage of the change.

Last but not least, the change also must adapt to employees' expectation beliefs, desires, or feelings. This type of strategy needs us to give all the logical arguments in the world to support the change. In addition, all the arguments also have to match the basic assumptions and rules to the way the person sees the world. For example, we need to endorse the change that appeal to the current beliefs, desires, or feelings. The reason to have logic arguments is because employees normally hold views of how the world works (Carey, S., 1986).

## 2.4 CONCLUSION

Resistance is a complicated phenomenon which can cause negative impact to change process such as unexpected delays, costs and instabilities. Resistance to change one of the scenarios happened in construction project sector. Employees were the one individual or group involved in this change. Employees resist to change can give a big impact to project. This is because they also one of the project's stakeholder. So, they automatically affect the project besides can be affected. There are many factors why employees resist to changing which are feel fear to lose something value, misunderstand about the change and its implication, lack of information and many more. When faced with resistance from employees, it will make the change process more complicated and will take more time to solve the change and employees resistance. Anything that happened will have it impact whether positive or negative impacts. Same goes to this situation. Resistance to change from employees will make the project time frame disrupted and also will affect project cost and performance. Decreased in their productivity of work and rose up the tendency and amount of staff turnover are some example of the impact. In order to avoid this situation become worse, we need to implement some strategy to manage and reduce the problem. There are several strategies that we can implement in managing resistance to change among employees, which are link the change to other issue people care and have value, employees' involvement, communication plan and tailor to employees' expectations. The successful in implementing the strategies will help senior management or who are execute the change in managing this resistance.

# CHAPTER 3

# RESEARCH METHODOLOGY

## 3.0 INTRODUCTION

The main objective of this chapter is to describe the phases involved in the research methodology that has been used in this research. This chapter consists of procedures or steps and techniques used to conduct a research. Then, this chapter consists of few sections that explained in details on the participants for this research. For example, the steps and techniques of this research are conducted by collecting data and analyzing data. The design of the research methodology is formulated with several phases. Lastly, this chapter provides the information about the research design, population and sampling, data collection, design of questionnaire and statistical technique.

## 3.1 RESEARCH DESIGN

Referring to Kumar (2005), research design is a procedural plan that is adopted by the researcher to answer questions objectively, accurately, validly and economically. The research design used for this study was descriptive survey. According to Boohene and Williams (2012) from Nwadinigwe (2005), this approach also can produce good responses from wide range of people.

According Sekaran (2003), descriptive method can be divided into 3 main types which are observational methods, case-study methods and survey methods. Firstly, observational method is closed observation on human and animal behavioral. While, for case study is involved an in-depth study of an individual or group of individuals. Survey method is used in this research design. In survey method research, participants answer questions administered through interviews or questionnaires. After respondent answer the questions, researchers describe the responses given. Reliability and validity test is important in ensuring the questions will properly construct. This research also known as statistical research because it is defines as an approach that describes data and characteristics about the population or phenomenon (Satilmis, 2011). Survey methods are frequently used to collect descriptive data because this approach is the most suited for gathering descriptive information for this research.

This research is focused to determine the strategy used in managing resistance during project implementation. A survey is a systematic method of collecting data from a population of interest. The purpose of a survey method is to collect quantitative information through the use of a structured questionnaire. According to Harwell (2011) from Lincoln & Guba (1985), quantitative research methods attempt to maximize objectivity, replicability, and generalizibility of findings, and are typically interested in prediction. Significant to this approach is the expectation that a researcher will set aside his or her experiences, perceptions, and biases to ensure objectivity in the conduct of the study and the conclusions that are drawn

## 3.2 POPULATION & SAMPLING

Sekaran (2003) stated, population is the specific group of people, events, or things of interest that the researcher want to investigate. For instance, if the manager of the computer firm wants to know the kinds of advertising strategies adopted by computer firms in Malaysia, then all computer firms located there will be the population. Besides that, population also known as a well-defined collection of individuals or objects that is has similar characteristics. The population for this research was the housing developer

company that categorized in G2 and the population area was focus on Negeri Sembilan. The summary of grade, categories and specialization was showed in Table 3.1 below. An element is a single member of the population. For example, if 100 blue shirt workers in a particular organization happen to be the population of interest to a researcher, each blue shirt worker there is an element (Sekaran, 2003).

**Table 3.1:** Summary of Grade, Categories and Specialization

| **Gred & Keupayaan Menender** | |
|---|---|
| **G1** | Tidak melebihi 200,000.00 |
| **G2** | Tidak melebihi 500,000.00 |
| **G3** | Tidak melebihi 1,000,000.00 |
| **G4** | Tidak melebihi 3,000,000.00 |
| **G5** | Tidak melebihi 5,000,000.00 |
| **G6** | Tidak melebihi 10,000,000.00 |
| **G7** | Tiada had |

Source: CIDB Malaysia (2014)

Referring to Sekaran (2003), a sample is a subset of the population. It comprises only some members selected from it. Subject is a single member of the sample. Sampling is the process of selecting a sufficient number of elements from the population, so that a study of the sample and an understanding of its characteristics would make it possible to generalize such characteristics to the population elements. It is very important to determine sample size because too large the size of sample will increase the waste of resources, money, and time and may give inaccurate results. It is vice versa if the sample size too small.

There are two types of sampling designs which are probability and non probability sampling. In probability sampling, the elements in the population have some chance or

probability of being selected as sample subjects. Next, for non probability sampling, the elements do not have chance of being selected as subjects (Sekaran, 2003). Next, probability sampling design also has two types which are unrestricted and restricted. Unrestricted probability sampling design means every element in the population has a known and equal chance of being selected as a subject. Unrestricted probability sampling designs also known as a simple random sampling.

From the information updated from Ministry of Housing and Local Government which is the total of housing developer company that categorized in G2 in Negeri Sembilan state was 25. In this research, all the population is being selected as a subject because the number of housing developer company in Negeri Sembilan not very huge. In this research, there are 1 subjects of the population. The subjects of this research are the project manager or project team who are employed in housing developer company that categorized in G2 in Negeri Sembilan. Assume that, at 1 respondent from every company and 25 respondents with 25 questionnaires are needed to generate the outcomes of this research.

## 3.3 DATA COLLECTION

In this research, two major data collection method are used which are consist of primary data and secondary data. Primary data is the data of information that collected for the first time, while secondary data is those data which have already been collected and analyzed by someone else. Referring to Kumar (2005), primary sources provide first-hand information and for secondary sources provide second-hand data. In Figure 3.1 shows the various methods of data collection.

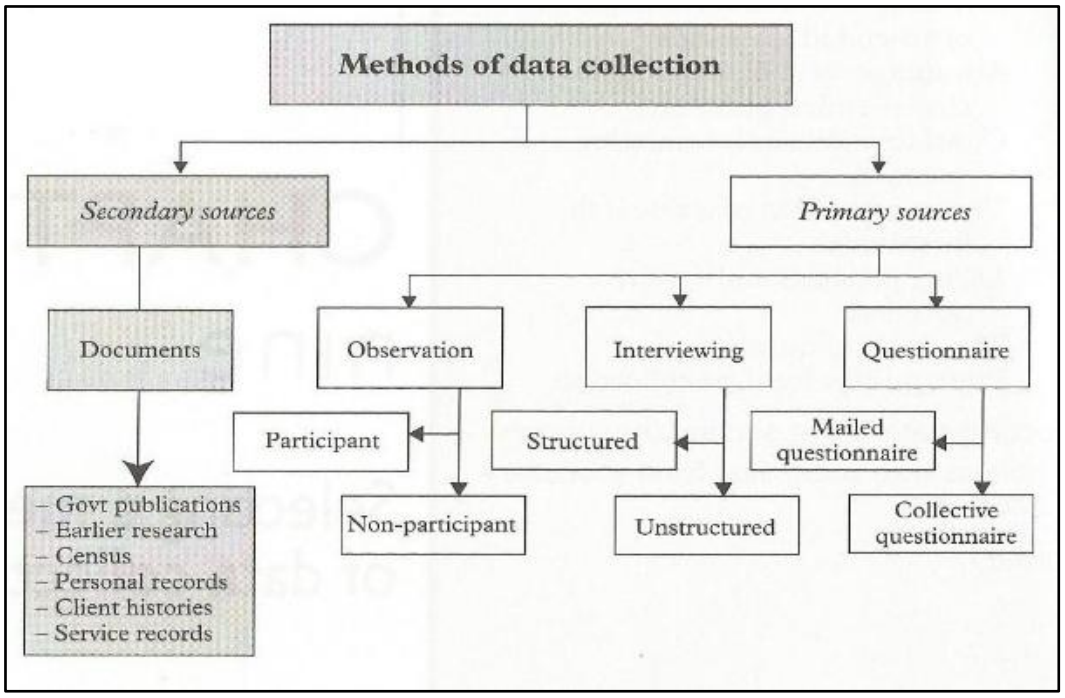


**Figure 3.1:** Methods of data collection

Source: Kumar (2005)

There are three primary methods for obtaining survey research which are observation, interviewing and questionnaire (Kumar, 2005). In this research, the method for obtaining survey research was questionnaire for collecting the response from the project managers and project team who are employed in housing developer company. According to Kumar (2005), questionnaire is a written list of questions. In a questionnaire, respondents will read the questions, interpret the questions and then write the answer or choose the option that match to their opinion. All the answer from respondent will record as data.

In this research, the respondents are asked to answer a set of questions based on their perspective. The set of questionnaire will distribute to the project managers and project team in order to determine the most effective strategy in managing resistance during project implementation. Several potential strategies are provided in questionnaire and respondents are giving chances to state their opinion about the degree of effective of those strategies used in managing resistance during project implementation.

In the same time, according to Kumar (2005) there are four types of secondary methods for obtaining survey research which are government or semi-government publications, earlier research, personal records and mass media. This research also used secondary data collection method such as articles from internet, journals, and documents from website, e-book and books. For example, the total amount of population for this research is collected from the Ministry of Housing and Local Government.

Data collection is an important stage in the planning and implementation of a research. Inaccurate data collection will lead to invalid result of a research. The techniques that used in distribution of the questionnaire are personally administer and by email. That is 40% number of housing developer company will receive the questionnaire by personally administer and 60% by email. Personally administer technique in distribution of the questionnaire will make the probability to get inaccurate result small. This is because we can directly guide and explain to them if they unclear with the questions in the questionnaire. Besides that, email questionnaire also widely use by the researchers to distribute and collect the data because of the benefit that without boundary for any location and all geographical area can be covered in the survey.

In this research was assume each company housing developer have their project managers or project team as a respondent, thus a set of questionnaire will give by personally administer or email to the housing developer company. However, for the companies who receive the questionnaire by email will be given two weeks to send back the questionnaire.

## 3.4 DESIGN OF QUESTIONNAIRE

The questionnaire design for this research was closed ended question. In a closed ended question, the respondent needs to answer the questions by choose the answer among certain answer that provided. Referring to Kumar (2005), he defined about the closed ended question which is the possible answer are set out in the questionnaire and the respondent ticks will ticks the category that best describes the respondent's answer.

The questionnaire design for this research was comprised of two sections to accomplish the objectives of this research, as follow:

I. Section One: General information about the respondents (project manager and project team). Also known as demographical data.
II. Section Two: The strategy used in managing resistance during project implementation. This section aimed to achieve the both objectives for this research that intend to determine the strategy used in managing resistance during project implementation in order to rank these strategies to produce the most effective strategy in managing resistance during project implementation.

In Section Two, there are four types of strategies used in managing resistance during project implementation:

1. Communication plan
2. Employees' involvement
3. Link the change to relevant issues
4. Adapt to employees' expectation beliefs, desires, or feelings

Measurement of the scale used for this research is used nominal scale in section one and interval scale in section two. Nominal scales are used for labeling variables, without any quantitative value. Nominal scale has no numerical significance and nominal scales are like 'names' or labels. For example if the question ask their gender, age, current position in workplace and etc. Besides, interval scale is used to measure the degree of effectiveness of the strategies used in managing resistance in project implementation. Interval scales are numeric scales in which we know not only the order, but also the accurate differences between the values. Rating scale that used to designs question in section two is Likert Scale. According to Kumar (2005), Likert Scale is based upon the assumption that each statement on the scale has equal important or weight in terms of reflecting an attitude towards the issue in question. Table 3.3 show the likert scale used in Section Two. This research used a five-point scale to all sections on questionnaire with ranging 1 (not effective) to 5 (very effective) which the anchors show below:

**Table 3.2:** Likert Scale

| Degree of effectiveness | | | | |
|---|---|---|---|---|
| (1) | (2) | (3) | (4) | (5) |
| Not effective | Little effective | Somewhat effective | Effective | Very effective |

## 3.5 STATISTICAL TECHNIQUE

The scales developed could often be imperfect, and errors are prone to occur in the measurement of attitudinal variables. The use of better instruments will ensure more accuracy in results. Hence, testing goodness of the data is the best technique to get the accurate result and high quality of the research (Sekaran, 2003).

The analysis of the survey results was used Statistical Package for the Social Sciences (SPSS). According to Sekaran (2003), measure the reliability need researcher establish by both consistency and stability. Cronbach's alpha is a reliability coefficient that indicates how well the items in a set are positively connected to one another. Besides that, Cronbach's alpha also computed in terms of the common among the items measuring the concept. The closer Cronbach's alpha is to 1, the higher the internal consistency reliability Sekaran, 2003.

The data is analyzed by using descriptive statistic. Descriptive statistic enables to present the data in a more meaningful way, which allows simpler interpretation of the data. Descriptive statistics are available with SPSS which are provided by frequencies, mean, median, mode, range, variance and standard deviation. Initial analysis of a data set is commonly used for frequencies. The median is the number at which half your measurements are more than that number and half are less than that number. Next, mean is just average. It is the sum of all value, divided by the number of measurements. Mode is the

value that has greatest frequency. Standard deviation is the positive square root of variance. Variance is form from the mean, square each one, and add them all up.

Descriptive analysis is the way to obtain the respondent's basic information in section one and the frequency and percentage of each items being clarified. In addition, descriptive analysis is conducted to obtain the result of the degree of the most effective strategy in managing resistance during project implementation stage. The mean of the result is used to rank the most effective strategy.

## 3.6 PILOT TEST

Cronbach's Alpha coefficient of reliability is used in this research measure the variable reliability to determine its consistency. In this research, 15 set of questionnaire has been distributed among project manager and project team who employed by housing developer company that categorized in G2 in Negeri Sembilan to test for reliability of questionnaire. Questionnaire has been collected and SPSS 16 system is used to test the result. If Cronbach's Alpha coefficient value is within 0.5 to 0.7 is represented an acceptable level of internal consistency ( Bahri Yusoff, 2012). Sekaran et.al (2003) stated, the closer Cronbach's alpha is to 1, the higher the internal consistency reliability.

The analysis of the pilot test in this research declared that the Cronbach's Alpha coefficient value range from 0.815 to 0.856. The Cronbach's Alpha coefficients of that four main type of strategies were under acceptable level. Due to the four main types of strategies are more than 0.7, so the element would continue to analysis without any variable is deleted. Analysis was showed the Cronbach's Alpha value of strategy related to communication plan is 0.827, strategy related to employees' involvement is 0.815, strategy related to link the change to relevant issues is 0.856, and Cronbach's Alpha of strategy that adapt to employees' expectation beliefs, desires, or feelings is 0.843.

**Table 3.3**: Cronbach's Alpha for pilot test

| Variable | No of items | Cronbach's Alpha |
|---|---|---|
| Communication Plan | 7 | 0.827 |
| Employees' Involvement | 5 | 0.815 |
| Link the change to relevant issues | 5 | 0.856 |
| Adapt to employees' ecpectation beliefs, desires, or feelings | 4 | 0.843 |

## 3.7 CONCLUSION

The strategy used in managing resistance during project implementation is target of this research. Project manager and project team are the main respondents for this research to be focused on. Survey questionnaire and literature review are the instruments used in gathering information and helping in data collection. Next, SPSS is used in doing the data analysis as well as measuring the results. SPSS is suitable for survey questionnaire. Overall, this chapter is deals with research design process to collect data and finally has useful data, the result can be understood, and that the procedures can be carried out by others in the future.

# CHAPTER 4

# RESEARCH FINDINGS AND ANALYSIS

## 4.0 INTRODUCTION

This chapter presents the quantitative findings of this research. The purposes of this research are to identify the strategy used in managing resistance during project implementation and to rank the most effective strategy for project manager or project team to improve their strategy or contingency plan if there is any unpredictable things happen during their project progress.

Besides that, this research is designed to answer the two section research questions by performing descriptive analysis to measure the background information of the respondents followed by the reliability of the variables in this research. The mean is used to analyze the degree of effectiveness of the strategy used in managing resistance during project implementation. Not only that, the mean also used to rank these strategies in order to generate the most effective strategy.

## 4.1 QUESTIONNAIRE DISTRIBUTION

The close ended questionnaires were distributed to the targeted respondents in order to collect data for analysis. The targeted respondents of this study are project manager or

project team who are employed by housing developer company categorized in G2 in Negeri Sembilan. The questionnaire consists of two sections which are Section One and Section Two. Section One is conducted to collect general information of respondents. Meanwhile, Section Two is designed to examine the degree effectiveness of the strategies in managing the resistance during project implementation.

As stated in chapter 3, the population of this research is 25 but only 23 companies available to be respondents in this research because the other 2, currently they have no projects. The respondents consist of project manager or project team who are employed in housing developer company. 23 questionnaires were distributed to the company but only 19 companies answer and response the questionnaire. According to Cavana et al. (2001), return rate of questionnaire that exceeds 30 percent and above will be receives and acceptable. Table 4.1 showed that 15 questionnaires were distributed using email and only 11 responded, which indicates a return rate of 73.33% which is considered as acceptable. Meanwhile, 8 questionnaires are personally administered and all responded which indicates a return rate of 100%.

**Table 4.1**: Distribution of questionnaire

| **Data collection method** | **Total distributed** | **Total responded** | **Return rate (%)** |
|---|---|---|---|
| Email | 15 | 11 | 73.33 |
| Personally administer | 8 | 8 | 100.00 |
| **Total** | **23** | **19** | **82.61** |

Table 4.1 showed the distribution of questionnaire according to the distributing methods which are by email and personally administered. Referring to the Table 4.1, the total collected questionnaires are 19 and the return rate of total data collected was 82.61 % which is appropriate for statistical analysis in this research.

## 4.2 RESPONDENT'S PROFILE

Information on respondent's profile is obtained from Section One of the questionnaire which contained demographic questions. This section consists of four questions to determine the profile of the respondents. However, the demographic questions are not significant to the research questions, but it is important to know the background of the respondents. In order to identify the respondent's background, demographic analysis was carried out through descriptive statistics.

**Table 4.2**: Respondent's profile

| **Variables** | | **Frequency** | **Percentages (%)** |
|---|---|---|---|
| **Gender** | | | |
| i) | Male | 16 | 84.2 |
| ii) | Female | 3 | 15.8 |
| **Age** | | | |
| i) | Less than 25 years | 2 | 10.5 |
| ii) | 26-35 years | 9 | 47.4 |
| iii) | 36- 45 years | 6 | 31.6 |
| iv) | More than 46 years | 2 | 10.5 |
| **Current Position** | | | |
| i) | Project Manager | 7 | 36.8 |
| ii) | Project Team | 12 | 63.2 |
| **Number of Years in Current Position** | | | |
| i) | Less than 5 years | 7 | 36.8 |
| ii) | 5- 10 years | 10 | 52.6 |
| iii) | 10- 15 years | 1 | 5.3 |
| iv) | More than 15 years | 1 | 5.3 |

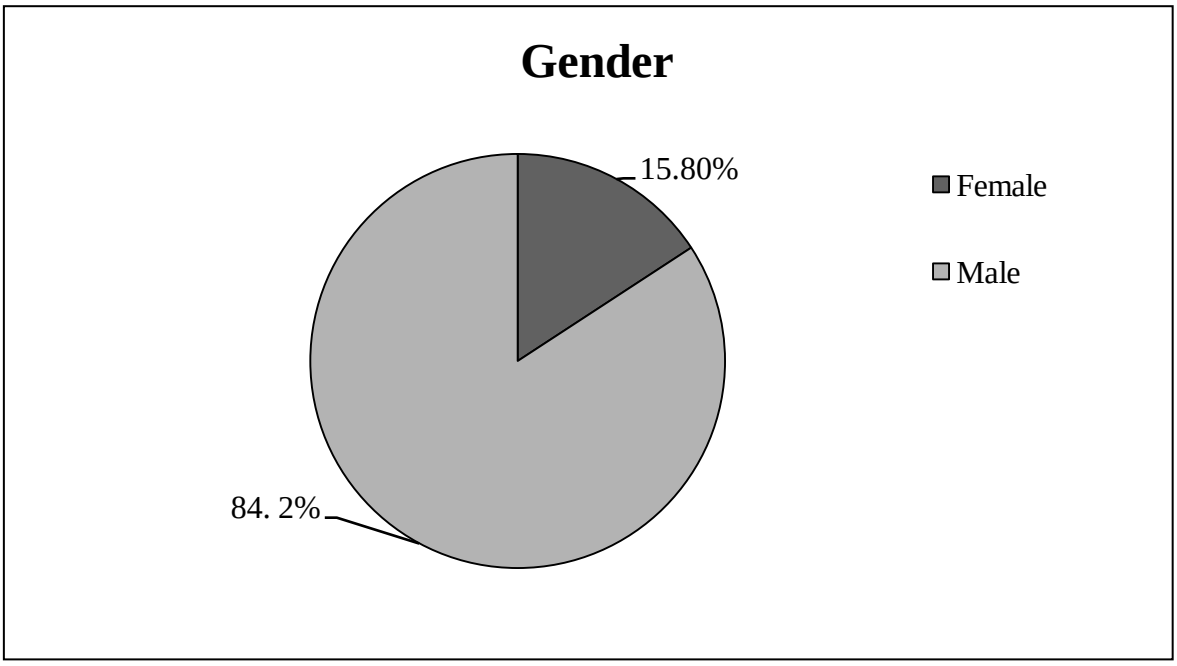


**Figure 4.1**: Gender

According to Figure 4.1 above, the percentage for male more than female which are male is about 16 persons and only 3 are female from all the respondents.

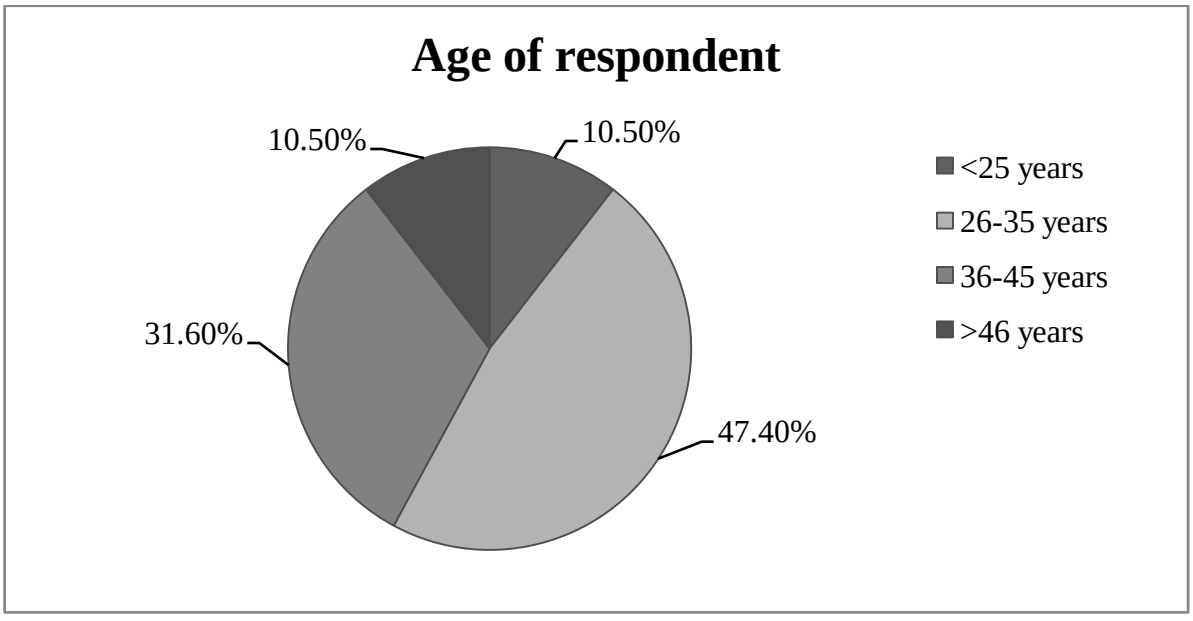


**Figure 4.2:** Age of Respondent

According to Figure 4.2, the highest percentage of respondent's age is between 26 and 35 which are 47.40 with frequency number of 9. Next, there is having 6 respondents who are age between 36 and 45 with percent about 31.60% Last but not least, there are only 2 for every group of age for less than 25 and more than 46 years old with only 10.50% percent.

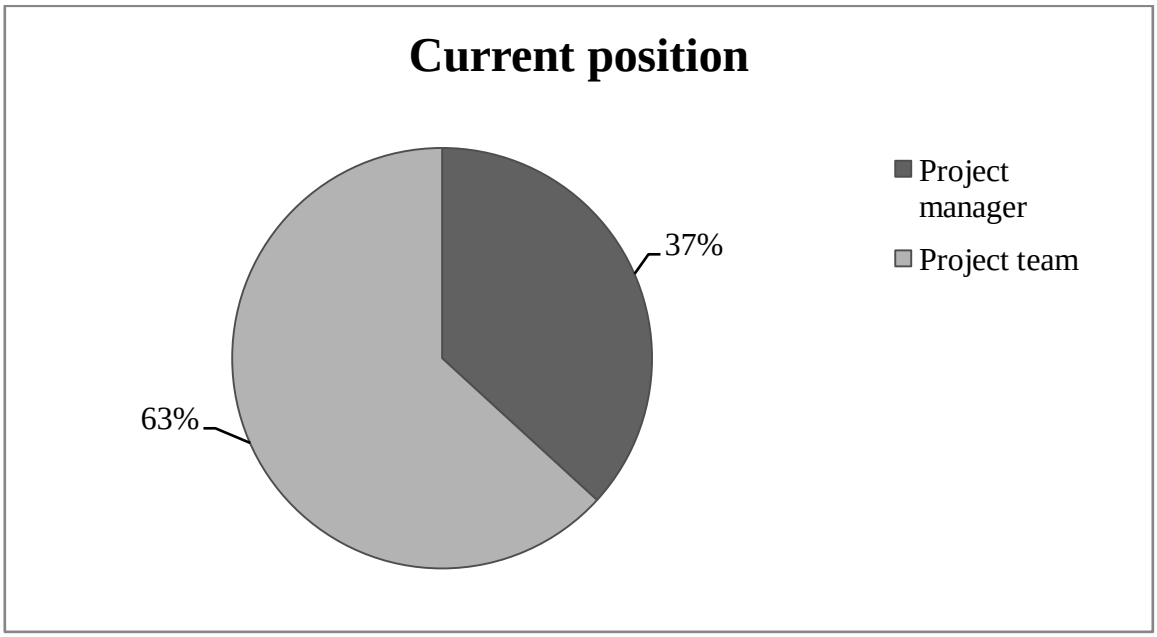


**Figure 4.3**: Current Position

Figure 4.3 showed that project manager is less than project team which are project manager percentage is 37% while project team 63%.

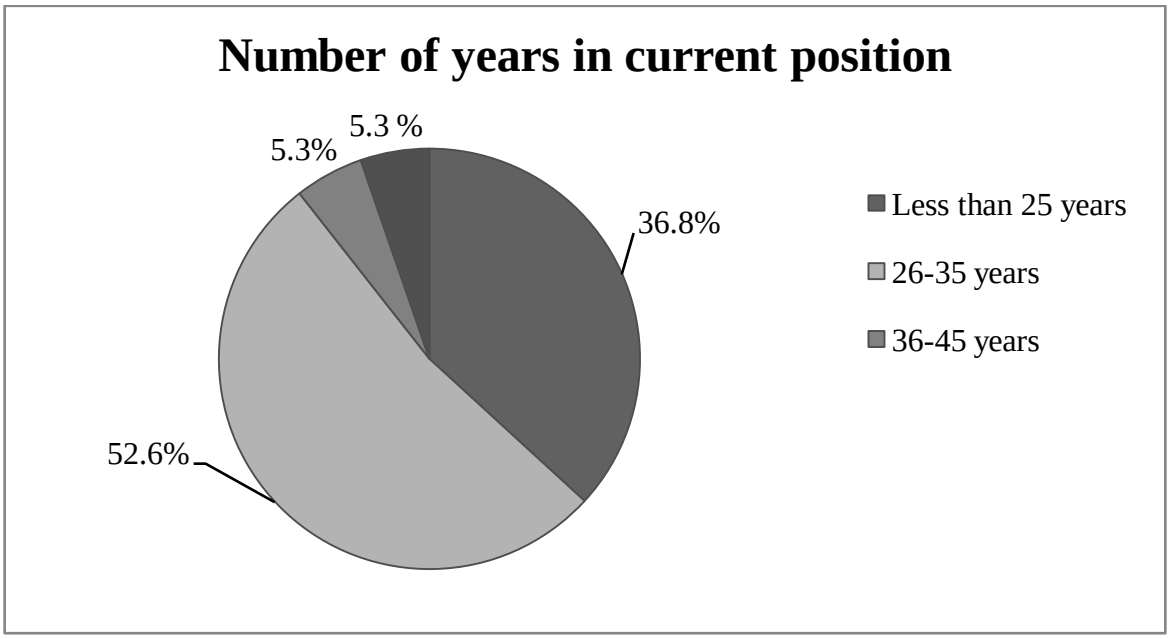


**Figure 4.4**: Number of Years in Current Position

Referring to Figure 4.4, number of years in current position has the highest respondents with a number of 10 or 52.6%. Next, there are having 7 respondents that have less than 5 years experiences in their current position. Last but not least, respondents who have 10 to 15 years and more than 15 years experiences in current position are only 1 with 5.3%.

## 4.3 RELIABILITY ANALYSIS

To ensure the reliability of the items used to measure the variables, reliability test was conducted using the Cronbach's Alpha Model. This model measures the inter-item consistency reliability of the items, which indicates the homogeneity of the items (Cavana et al. 2001). Internal consistency concerns the scope to which items on the test or instrument are measuring the same thing. For example, if researchers are developing a test to measure organizational commitment they should determine the reliability of each item. According to Cronbach (1951), if the individual items are highly interrelated with each other they can be highly confident in the reliability of the entire scale. Next, according to

Yusoff (2012), the value of Cronbach's Alpha coefficient value is within 0.5 and 0.7 is represented an acceptable value or level of internal consistency of the variables. While, if the value is below 0.5, the value considered to be unacceptable. The closer the Cronbach's Alpha coefficient to 1, the greater the internal consistency reliability (Sekaran at.al, 2003).

The Cronbach's Alpha values of the variables in this research are shown in Table 4.3 below. The analysis in this research stated that the Cronbach's Alpha values are between 0.840 and 0.777 and all the four main strategies group were under acceptance level.

**Table 4.3**: Reliability test

| No. | Variables | Cronbach's Alpha | Number of Items (N) | Item Deleted | Cronbach's Alpha if item deleted |
|---|---|---|---|---|---|
| 1 | Effectiveness of strategy used in communication plan | 0.777 | 7 | - | - |
| 2 | Effectiveness of the strategy used in employees' involvement | 0.804 | 5 | - | - |
| 3 | Effectiveness of the strategy used in link the change to relevant issues | 0.840 | 5 | - | - |
| 4 | Effectiveness of the strategy used in adapt to employees' beliefs, desires, or feelings | 0.829 | 4 | - | - |

According to Sekaran (2003), the acceptable range for Cronbach's Alpha is above than 0.6 and if it less than 0.6 it considered to be poor. From the table above, the variables used in this research are acceptable as the Cronbach's Alpha because the value declared more than 0.7. In this research, there is no item deleted because it already in a range of acceptable value of Cronbach's Alpha.

## 4.4 STRATEGY USED IN MANAGING THE RESISTANCE

The second objective of this research is to rank the most effective strategy used in managing resistance during project implementation. This is to help project manager and project team to always be prepared with contingency plan and effective strategy in order to face any unpredictable things. This section contains four main groups of strategies which included 21 strategies that used in managing resistance during project implementation. There are four main strategies used, which are:

I. Effectiveness of the strategy used in communication plan,
II. Effectiveness of the strategy used in Employees' involvement,
III. Effectiveness of the strategy used in link the change to relevant issues,
IV. Effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings.

In this research, the value of mean in descriptive analysis was used to obtain the result of the degree of the most effective strategy in managing resistance during project implementation stage.

### 4.4.1 Effectiveness of the Strategy Used In Communication Plan

The Table 4.5 shown the mean and ranks of the effectiveness of the strategy used in communication plan. This strategy consists of 7 sub strategies. In this part, only the strategy ranked the highest will be discussed that is the strategy which has the high value of mean.

According to Table 4.4 and Figure 4.5, it shown the highest mean of sub strategies in communication plan was a formal announcement about the change which is 4.21 and was rank in the first place by the project manager and project team as the most effective strategy in communication plan in order to managing resistance during project implementation. Have a formal meeting was one of the effective way to announce the change. According to Laframboise et al. (2002), in having a meeting, they can directly inform to all employees or stakeholders about the change such as when, where or how. So

that, employees can hears straightforwardly from their senior management about the need or importance to implement a change.

At the same time, senior management also can took more responsibility when communicating directly with employees and make sure they clear about the change plan (Schmitz, 2012). Not only that, changes without proper announcement or consulting will make employees confused about the change's main objective. This can also result in denial, conflict and even rising sickness absence (Yazdanifard R. and Malek R., 2012).

**Table 4.4**: Rank and mean of the effectiveness of the strategy used in communication plan

| No | Strategies | Mean | Rank |
|---|---|---|---|
| 1.1 | Have a formal announcement about the change such as meeting to all employees and stakeholders | 4.21 | 1 |
| 1.2 | Provide Continuous Follow-up | 4.16 | 3 |
| 1.3 | Spend time discussing expectations from employees towards the change | 3.84 | 7 |
| 1.4 | Open up meaningful discussion about the change such as when, where, how the change will carry out | 4.00 | 5 |
| 1.5 | Clearly communicated link between project teams and employees | 4.16 | 2 |
| 1.6 | Enhance two way communication | 4.06 | 4 |
| 1.7 | Develop communication goals designed to improve and integrate effective communication at all levels | 3.89 | 6 |

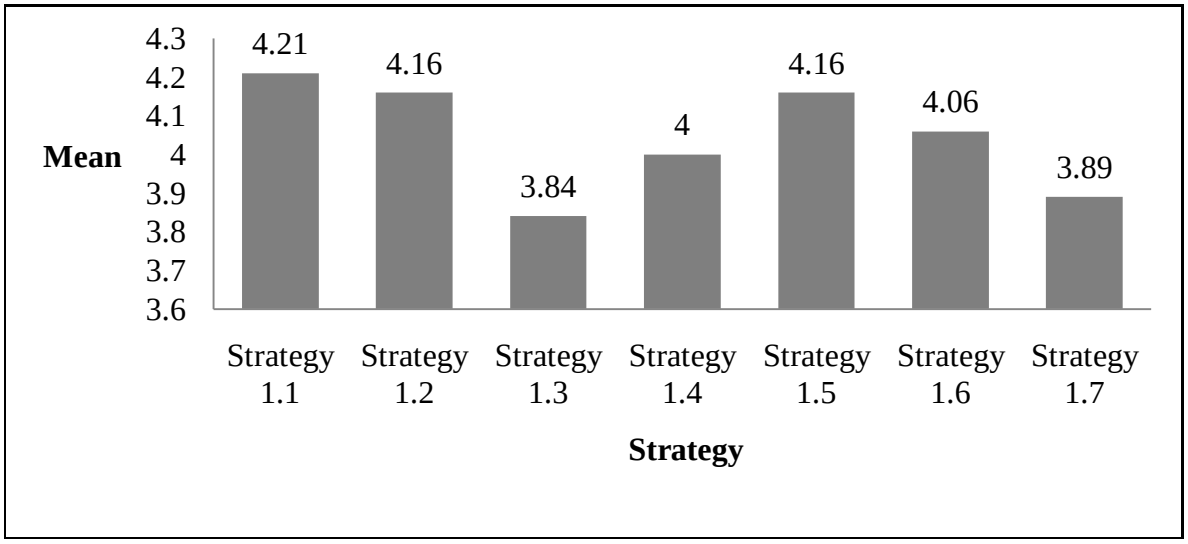


**Figure 4.5**: Effectiveness of the strategy used in communication plan

### 4.4.2 Effectiveness of the strategy used in employees' involvement

The second strategy used in managing resistance during project implementation is by involved employees during change process. This strategy consists of 5 sub strategies that will ensure employees engage in any change during project implementation. In this part, only the most essential strategy will be discussed.

Referring to Table 4.5 and Figure 4.6, it shown the highest mean of this strategy was periodic discussion with top management which is 4.05. According to Self and Schraeder (2009), utilizing the strategy of employee involvement not only enhances two-way communication between employees and top management, but indicate to employees that they are valued and top management trusts them enough to be included in the decision-making process. Besides that, according to Elbanna (2012) from Ang and Teo (1997), top management support has been extensively identified and highly ranked as a critical success factor in many project studies including change management. In addition, periodic discussion with top management can make employees more understand about the flow or process of change and directly can get explanation from top management (Chirico and Salvato, 2008).

**Table 4.5**: Rank and mean of the effectiveness of the strategy used in employees' involvement

| No | Strategies | Mean | Rank |
|---|---|---|---|
| 2.1 | Involve employees in change activities | 3.79 | 2 |
| 2.2 | Asked for suggestions from employees | 3.32 | 4 |
| 2.3 | Involvement of employees in the planning process of change | 2.74 | 5 |
| 2.4 | Involve each employees in meaningful decisions about their work unit and their work | 3.58 | 3 |
| 2.5 | Periodic discussion with top management | 4.05 | 1 |

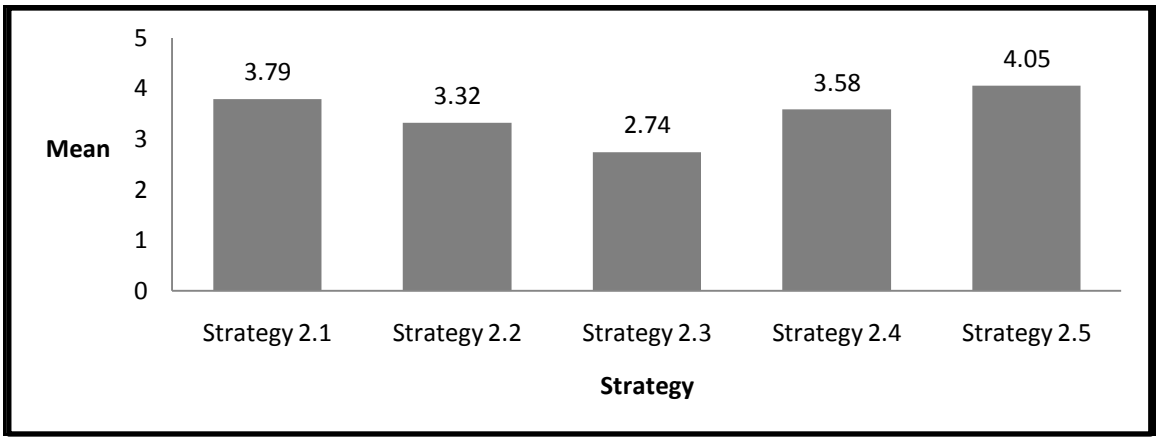


**Figure 4.6**: Effectiveness of the strategy used in employees' involvement

### 4.4.3 Effectiveness of the strategy used in link the change to relevant issues

Next strategy is link the change to relevant issues. Table 4.6 and Figure 4.7 was shown the mean and ranks among the 5 sub strategies. Considering the market conditions and growing demands during implementation of change was ranked in the first position by the project manager and project team with the mean value of 4.21. Employees will give positive response to the change if they exposed and know about current market situation. According to Ann and James H (2005), market condition or issues was very important in ensuring every company or project stable. Not only that, employees will alert with their

current competitors and willing to adhere the changes. In addition, strategic changes need in order to gain a competitive advantage in the marketplace.

**Table 4.6**: Rank and mean of the effectiveness of the strategy used in link the change to relevant issues

| No | Strategies | Mean | Rank |
|---|---|---|---|
| 3.1 | Bond the change to issues of health and job security | 4.11 | 2 |
| 3.2 | Provide some benefits or rewards to whom accept the change | 3.47 | 5 |
| 3.3 | Inform them about the current economic issues that need the organization make a change as soon as possible | 3.68 | 4 |
| 3.4 | Relate to the need of change with the current climate issues | 3.89 | 3 |
| 3.5 | Consider the market conditions and growing demands during implementation of change | 4.21 | 1 |


**Figure 4.7**: Effectiveness of the strategy used in link the change to relevant issues

### 4.4.4 Effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings

The table below shown the mean and ranks of the effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings. This is the last main

strategy that consists of 4 sub strategies. In this part, only the strategy ranked the highest will be discussed that is the strategy which has the high value of mean.

According to Table 4.7 and Figure 4.8 below, it shown the highest mean among the 4 sub strategies was by using expertise to explain the information about the change which is 4.79. This is because, expertise have more experience and knowledge in handling specific problem. In project, project manager, consultant and engineer are example expertises that are have the responsible toward any change during project implementation. According to Klein (1996) from Young and Post (1993), the first people who are responsible to communicate about the change is expertise such as project manager, unit manager and etc. According to Robert A. Paton et al. (2005), expertise must have enough knowledge and experience in order to facilitate change through every various stage. Therefore, they can delivery clear and adequate information to employees who resist the change.

**Table 4.7**: Rank and mean of the effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings

| No | Strategies | Mean | Rank |
|---|---|---|---|
| 4.1 | Uses of expertise to explain the information about the change (expertise have more experience in change management) | 4.79 | 1 |
| 4.2 | Make employees feel certain emotions, such as excitement towards the change | 4.16 | 3 |
| 4.3 | Make a comparison with competitors' performance who did not implement change when necessary | 4.00 | 4 |
| 4.4 | Prevent from employees feel loss of belonging or loss of meaning in an organization | 4.26 | 2 |

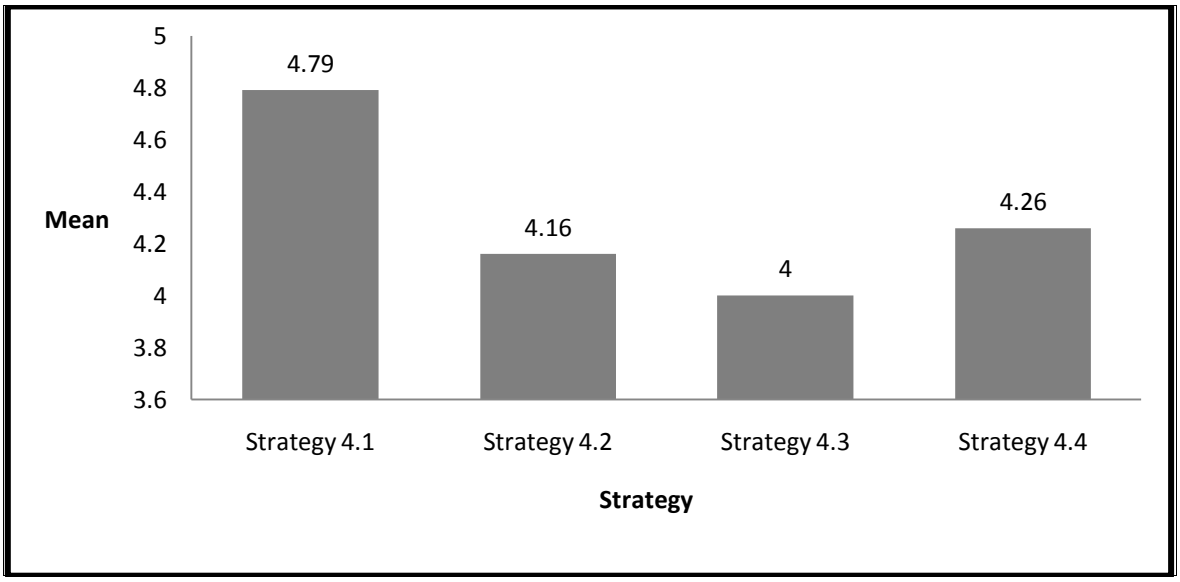


**Figure 4.8**: Effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings

### 4.4.5 Comparison between all groups of ranking of effectiveness strategies used in managing resistance

Table 4.8 shows the comparison of results of all 4 effective strategies used in managing resistance according to the mean of each strategy. In this part, only the most important strategy will be discussed

**Table 4.8**: Rank and mean of four main strategies

| Strategies | Mean | Rank |
|---|---|---|
| 4.4 1 Effectiveness of the strategy used in Communication Plan | 28.32 | 1 |
| 4.4.2 Effectiveness of the strategy used in employees' involvement | 17.48 | 3 |
| 4.4.3 Effectiveness of the strategy used in link the change to relevant issues | 19.36 | 2 |
| 4.4.4 Effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings | 17.21 | 4 |

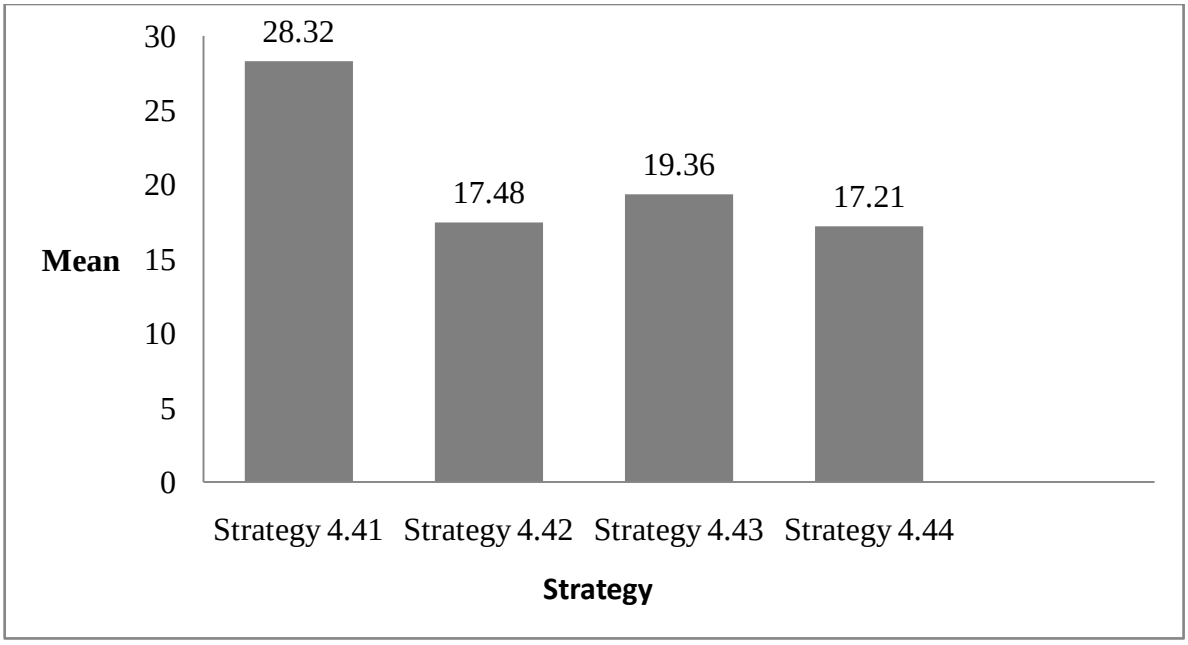


**Figure 4.9**: Four main strategy

Table 4.8 and Figure 4.9 shown the effectiveness of the strategy used in communication plan has the highest mean which is 28.32 and it was ranked in the first position by project manager and project team. 7 sub strategies consist in this strategy which can refer to Table 4.4. Referring to Schmitz (2012), 604 organizations from around the world, found that 56% of the companies that shared information in effective way will successfully achieve their change goals. Besides that, communication is the crucial step in change planning stage. This is because top management necessary to make sure their employees understand all the change background (Stuart M. Klein, 1996). Referring to Kulvisaechana (2001), communication can encourage employees to give responses toward the change. Furthermore, communication is important to overcome the fears and concerns aroused by change. Besides that, communication vital in explaining why the change is happened and what the whole thing really means in the long term. Next, effective communication also has been seen as a two-way communication that plays several functions such as information sharing, participation, compliance and feedback (Malek and Yazdnifard, 2012). According to Malek and Yazdanifard (2012) from Koivula, J (2009),

communication also regarded as a key issue in the successful accomplishment of change because it is used as a tool for announcing and preparing employees for change.

## 4.5 CONCLUSION

Based on the result of this research and past researchers, can be conclude that the most effective strategy used in managing resistance during project implementation that agreed from project manager and project team is strategy in communication plan. This is because, in having a good communication plan and skills, we can be proficient to handle any resistance during project implementation. In addition, communication also known as a main tool in making employees more understand and follows all necessities needed.

# CHAPTER 5

# CONCLUSION AND RECOMMENDATION

## 5.0 INTRODUCTION

The purpose of this research was first to determine the strategy used in managing resistance during project implementation for construction project from the perspective of project manager and project team. Apart from that, the second objective for this research is to rank the most effective strategy used in managing resistance during project implementation. Hence, project manager and project team will be well prepared if their employees resist changes during project implementation.

In addition, the limitation of this research will be addresses in this chapter and followed by the conclusion on the quantitative analysis result of this research. Last but not least, recommendation section also included in this chapter for further studies soon.

## 5.1 RESEARCH SUMMARIZATION

Resistance was an action of opposing something that people object to or disagree with. Every activity will immediately delay if resistance occurs especially in implementation stage of project. This research focused on resistance came from employees.

That is employees resist to change during project implementation stage. Poorly managed resistance can ruin a project or an organization. According to Smith (2005) from Senaratne and Kuruwita (2010), the resistance to change is one of the most complicated problems top management face. Not only that, resistance is often presented and perceived as irrational and complex, something that needs to be deal with in any change management initiative and strategies. Hence, this research aimed to determine the strategy used in managing resistance during project implementation. Next, the second objective for this research is to rank the most effective strategy used in managing resistance during project implementation. Therefore, it can help project manager and project team to always be prepared with contingency plan in managing employees who are resist to change during project implementation.

Firstly, in order to identify the most effective strategy use to manage the resistance, the researcher needs to compute the average of mean for the strategy that contained in every main strategy. Then, the highest value of average mean in every main strategy will be rank with other three main strategies. This findings show that among of the four main strategies used in this research, communication plans strategy is the most effective strategy because it have the highest ranking value of mean. This is because communication was regarded as a key issue in the successful accomplishment of change. This research finding clearly stated that, most project manager and project team choose and agreed that communication plan as the most effective strategy in managing resistance during project implementation.

## 5.2 LIMITATION

In this research, there are some limitations which need to know in which these can be improve in future research. During the course of research, some potential limitations of this research in terms of methodology and data collection were expected. The first limitation of this research is the population of housing developer company which categorized in G2 and the population area was focus on Negeri Sembilan. Furthermore, the number of housing developer company only based on the website of Ministry of Housing

and Local Government. At the same time, not all housing developer company currently have project. So, it will effect on the population size.

Besides that, the challenges in making an appointment with project manager and project team. Many of project manager and project team have a time constraint to have an appointment especially to involve in this research as a respondent. Most of project manager and project team, answered this research questionnaire by email. Due to the process of data collection was time consume, therefore the period of time given to collect the data still insufficient. This is because, not all the respondents answer the questionnaire immediately.

## 5.3 RECOMMENDATION

There are some recommendations for the future research in this area of research. Future researchers are suggested to study the large number of respondents or participants by include project team from different categories of contractors for more accurate outcome and represent a more realistic population in Malaysia. In addition, the selected number of respondent not enough to be generalized the project manager and project team who are employed in housing developer company in G2 only. They can expand the categories of housing developer company in G3 until G7. Not only that, they also can enlarge their respondent population to east coast, north or south area.

Next, the future research should use various methods to collect data. For example, they can use interview session. They can do face to face interview session or phone interview. Face to face interview will make the respondents more understand and clear about our research without have to answering the closed ended question. Some of the respondents tend to select the average answer if they not clearly understand about the certain questions. While, for time, cost or transportation constraints can be settled by conducting a phone interview.

## 5.4 CONCLUSION

Resistance known as a complex phenomenon, which can caused unanticipated delays, costs and instabilities into the process of a strategic change. In addition, uniqueness and complexity are common example of characteristic of project. Project also involved a probability to have uncertainty. Potential causes of uncertainty include inadequate or inaccurate data, variations in the performance of resources and many more. Not only that, project also passes through a life cycle which is has a several stages. Therefore, between the duration to finish all the project stages, it will have probability to face a change towards the internal or external factors. This research focused on resistance to change from the employees. There are four main effective strategies that project manager and project team can apply to control or solve the resistance from their employees which are Communication Plan, Employees' Involvement, Link the Change to Relevant Issues and Adapt to Employees' Expectation Beliefs, Desires, or Feelings. After carry out a data analysis, this research finding is Communication Plan was the most effective strategy in managing resistance during project implementation. Besides communication is the crucial step in change planning stage, it also necessary to project manager and project team to make sure their employees understand all the change background. In order to ensure the problem of employees resist to change can be smoothly handle, project manager and project team need to implement a very well and strategic communication plan.

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**APPENDIX A1**


FACULTY OF TECHNOLOGY

Questionnaire

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Dear Participant,

First of all, I would like to present my appreciation and thanks to you for taking part in this survey. This questionnaire is designed to study the strategy used in managing resistance to change, among employee during project implementation in construction project.

The objectives of my research are to determine the strategy used in managing resistance during project implementation and to rank the most effective strategy used in managing the resistance. I would be most grateful if you would respond to the questions frankly and honestly.

For your information, this study is conducted in fulfillment of Final Year Project for Bachelor degree in Project Management at University Malaysia Pahang. Your response will be kept strictly confidential and will be used as academic purpose only.

Your involvement in this study would be very much appreciated. If you have any further questions, please do not hesitate to contact me.

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Project Management
Faculty of Industrial Management
University Malaysia Pahang

**Instruction : Please read and tick (✓) an answer from the options.**
*Arahan : Sila baca dan tandakan (✓) pada pilihan jawapan.*

**Section One : Respondent's general information**
*Bahagian Satu : Maklumat umum responden*

1. Gender
   *Jantina*

   Male ☐ Female ☐

   *Lelaki* *Wanita*

2. Age
   *Umur*

   < 25 ☐ 26-35 ☐ 36-45 ☐ > 46 ☐

3. Current Position
   *Jawatan semasa*

   Project manager ☐ Project team ☐

   *Pengurus projek* *Kumpulan Projek*

4. Number of years in current position
   *Tempoh memegang jawatan semasa*

   < 5years ☐ 5-10 years ☐ 10- 15 years ☐ >15 years ☐
   *<5 tahun* *5-10 tahun* *10-15 tahun* *>15 tahun*

**Section Two : Effective strategy used in managing resistance during project implementation**

*Bahagian Dua: Keberkesanan strategi yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek*

**Instruction : Please express your opinion on how the degree of effectiveness of these strategy in managing resistance during project implementation.**

*Arahan: Sila nyatakan pendapat anda bagaimana tahap keberkesanan strategi ini dalam menguruskan rintangan semasa pelaksanaan projek.*

**1** **Not effective**
*Tidak Berkesan*

**2** **Little effective**
*Sedikit Berkesan*

**3** **Somewhat effective**
*Agak Berkesan*

**4** **Effective**
*Berkesan*

**5** **Very effective**
*Sangat Berkesan*

| No | Strategy used in managing resistance during project implementation<br>*Strategi yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek* | Degree of effectiveness<br>*Tahap Keberkesanan* | | | | |
|---|---|---|---|---|---|---|
| **1** | **Effectiveness of the strategy used in Communication Plan**<br>***Keberkesanan strategi yang digunakan dalam Pelan Komunikasi*** | **1** | **2** | **3** | **4** | **5** |
| 1.1 | Have a formal announcement about the change such as meeting to all employees and stakeholders<br>*Mengadakan satu pengumuman rasmi mengenai perubahan seperti mesyuarat kepada semua pekerja dan pihak-pihak yang terlibat* | | | | | |
| 1.2 | Provide Continuous Follow-up<br>*Mengadakan susulan berkala* | | | | | |
| 1.3 | Spend time discussing expectations from employees towards the change<br>*Meluangkan masa membincangkan harapan para kakitangan terhadap perubahan* | | | | | |
| 1.4 | Open up meaningful discussion about the change such as when, where, how the change will carry out<br>*Membuka perbincangan mengenai perubahan seperti bila, di mana, dan bagaimana perubahan yang akan menjalankan* | | | | | |
| 1.5 | Clearly communicated link between project teams and employees<br>*Komunikasi dan penyampaian yang jelas antara pasukan projek dan pekerja* | | | | | |
| 1.6 | Enhance two way communication<br>*Meningkatkan komunikasi dua hala* | | | | | |
| 1.7 | Develop communication goals designed to improve and integrate effective communication at all levels<br>*Membangunkan matlamat komunikasi yang direka untuk memperbaiki dan mengintegrasikan komunikasi yang berkesan di semua peringkat* | | | | | |

| No | Strategy used in managing resistance during project implementation<br>*Strategi yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek* | Degree of effectiveness<br>*Tahap Keberkesanan* | | | | |
|---|---|---|---|---|---|---|
| **2** | **Effectiveness of the strategy used in Employees' involvement**<br>***Keberkesanan strategi yang digunakan dalam penglibatan Pekerja*** | **1** | **2** | **3** | **4** | **5** |
| 2.1 | Involve employees in change activities<br>*Melibatkan pekerja dalam melaksanakan perubahan* | | | | | |
| 2.2 | Asked for suggestions from employees<br>*Membuka cadangan daripada pekerja* | | | | | |
| 2.3 | Involvement of employees in the planning process of change<br>*Penglibatan pekerja dalam proses perancangan perubahan* | | | | | |
| 2.4 | Involve each employees in meaningful decisions about their work unit and their work<br>*Melibatkan setiap pekerja dalam membuat keputusan yang melibatkan pekerjaan mereka* | | | | | |
| 2.5 | Periodic discussion with top management<br>*Perbincangan berkala dengan pengurusan atasan* | | | | | |

| No | Strategy used in managing resistance during project implementation<br>*Strategi yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek* | Degree of effectiveness<br>*Tahap Keberkesanan* | | | | |
|---|---|---|---|---|---|---|
| **3** | **Effectiveness of the strategy used in link the change to relevant issues**<br>***Keberkesanan strategi yang digunakan dalam menghubungkan perubahan kepada isu-isu yang berkaitan*** | **1** | **2** | **3** | **4** | **5** |
| 3.1 | Bond the change to issues of health and job security<br>*Menghubungkan perubahan kepada isu-isu kesihatan dan keselamatan pekerjaan* | | | | | |
| 3.2 | Provide some benefits or rewards to whom accept the change<br>*Memberikan faedah atau ganjaran kepada individu yang menerima perubahan* | | | | | |
| 3.3 | Inform them about the current economic issues that need the organization make a change as soon as possible<br>*Maklumkan kepada mereka mengenai isu-isu ekonomi semasa yang memerlukan organisasi membuat perubahan secepat mungkin* | | | | | |
| 3.4 | Relate to the need of change with the current climate issues<br>*Kaitkan keperluan perubahan dengan isu-isu iklim semasa* | | | | | |
| 3.5 | Consider the market conditions and growing demands during implementation of change<br>*Pertimbangkan keadaan pasaran dan permintaan yang semakin meningkat dalam pelaksanaan perubahan* | | | | | |

| No | Strategy used in managing resistance during project implementation<br>*Strategi yang digunakan dalam menguruskan rintangan semasa pelaksanaan projek* | Degree of effectiveness<br>*Tahap Keberkesanan* | | | | |
|---|---|---|---|---|---|---|
| **4** | **Effectiveness of the strategy used in adapt to employees' expectation beliefs, desires, or feelings**<br>***Keberkesanan strategi yang digunakan dalam menyesuaikan diri dengan kepercayaan jangkaan pekerja, keinginan, atau perasaan*** | **1** | **2** | **3** | **4** | **5** |
| 4.1 | Uses of expertise to explain the information about the change (expertise have more experience in change management)<br>*Menggunakan kepakaran untuk menerangkan maklumat tentang perubahan (kepakaran mempunyai lebih banyak pengalaman dalam pengurusan perubahan)* | | | | | |
| 4.2 | Make employees feel certain emotions, such as excitement towards the change<br>*Melahirkan rasa yang positif ke arah perubahan ke dalam diri setiap pekerja* | | | | | |
| 4.3 | Make a comparison with competitors' performance who did not implement change when necessary<br>Membuat perbandingan terhadap prestasi pesaing yang tidak melaksanakan perubahan apabila perlu | | | | | |
| 4.4 | Prevent from employees feel loss of belonging or loss of meaning in an organization<br>*Mengelakkan pekerja berasa hilang kepentingan atau kehilangan makna dalam sesebuah organisasi* | | | | | |

# APPENDIX A2

| No | Activity | PSM 1 (Weekly) | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | SEM 5 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 |
| 1 | Identify research title & research objective | | | | | | | | | | | | | | | |
| 2 | Deciding the topic & objective of research | | | | | | | | | | | | | | | |
| 3 | Approval of the title & research objective | | | | | | | | | | | | | | | |
| | **Chapter 1 Introduction** | | | | | | | | | | | | | | | |
| 4 | 1.0 | | | | | | | | | | | | | | | |
| 5 | 1.1- 1.7 | | | | | | | | | | | | | | | |
| | **Chapter 2 Literature Review** | | | | | | | | | | | | | | | |
| 6 | 2.0 – 2.3 | | | | | | | | | | | | | | | |
| 7 | 2.4- 2.5 | | | | | | | | | | | | | | | |
| | **Chapter 3 Research Methodology** | | | | | | | | | | | | | | | |
| 8 | 3.0-3.1 | | | | | | | | | | | | | | | |
| 9 | 3.2 -3.7 | | | | | | | | | | | | | | | |
| 10 | Submitting Draft Chapter 1,2,3 | | | | | | | | | | | | | | | |
| 11 | Correcting and Editing Chapter 1,2,3 | | | | | | | | | | | | | | | |
| 12 | Submit Chapter 1,2,3 | | | | | | | | | | | | | | | |
| 13 | Proposal Presentation Preparation | | | | | | | | | | | | | | | |
| 14 | Proposal Presentation | | | | | | | | | | | | | | | |
| 15 | Pilot Test and Distributed questionnaire (data collection) | | During semester break | | | | | | | | | | | | | |

| No | Activity | PSM 2 (Weekly) | | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15-17 | 18 |
| 1 | Summit Pilot Test | | | | | | | | | | | | | | | | |
| 2 | Literature Review | | | | | | | | | | | | | | | | |
| | **Chapter 4 Research Findings And Analysis** | | | | | | | | | | | | | | | | |
| 3 | 4.0 - 4.4 | | | | | | | | | | | | | | | | |
| | **Chapter 5 Conclusion And Recommendation** | | | | | | | | | | | | | | | | |
| 4 | 5.0 – 5.3 | | | | | | | | | | | | | | | | |
| 7 | Submit C4 & C5 | | | | | | | | | | | | | | | | |
| 8 | Submit draft of Fyp report and poster | | | | | | | | | | | | | | | | |
| 9 | Correction on Fyp report and poster | | | | | | | | | | | | | | | | |
| 10 | Submit full report (2 copies) | | | | | | | | | | | | | | | | |
| 11 | Report presentation preparation | | | | | | | | | | | | | | | | |
| 12 | Report presentation | | | | | | | | | | | | | | | | |
| 13 | Submit corrected report | | | | | | | | | | | | | | | | |
| 14 | Submit 2 Hard Bind and 1 CD | | | | | | | | | | | | | | | | |
| 15 | Approval for Binding Form | | | | | | | | | | | | | | | | |