



**DEPARTMENT OF BUILDING  
UNIVERSITI TEKNOLOGI MARA  
(PERAK )**

**A RENOVATION WORKS FOR SPACE  
EXPANSION OF AN OFFICE ROOM**

**Prepared by;**

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JASMANI**

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**SEPTEMBER 2021**

It is recommended that the report of this practical training provided

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OFFICE ROOM**

Be accepted in partial fulfillment of requirement has for obtaining Diploma in  
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**SEPTEMBER 2021**

**STUDENT'S DECLARATION**

I hereby declare that this report is my own work, except for extract and summaries for which the original references stated herein, prepared during a practical training session that I underwent at IIA BUILDER for a duration of 15 weeks starting from 27 September 2021 and ending on 7 January 2022. It is submitted as one of the prerequisite requirements of BGN310 and accepted as partial fulfilment of the requirements for obtaining the Diploma in Building.

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## **ACKNOWLEDGEMENT**

The odyssey began as a student towards the Professional Life with the goal of learning the Industrial Training of a Construction and finished as a great experience that also helped me pass with flying colours. No work can be performed without the assistance or contributions of others. I'd want to express my heartfelt gratitude to the following great esteem firm of Koh Lek Construction & Renovations Sdn. Bhd. for the guidance, counsel, and assistance provided throughout the training session. I'd want to thank En Ibrahim for the opportunity to conduct my training in his company. My particular gratitude to En Argus – Manpower, En Rudy – Manpower, and En Oriza – Manpower for allowing me to study and expand my practise, knowledge, and feel of realtime projects of building and civil works at the construction site and office work while being extremely busy with their obligations. It would be an honour for me to be given the opportunity to 'work' with all of you.

Furthermore, I would want to express my heartfelt and deepest gratitude to all of the UITM lecturers who have taught and nourished me from Semester 1 to today in becoming a better student and person. I'd also like to thank the Supervisor Lecturer Dr Azamuddin Bin Husin, Evaluation Lecturer Cik Nor Azizah Binti Talkis, Practical Training Coordinator Ts Muhammad Naim Bin Mahyuddin, and Program Coordinator Dr Dzulkarnaen for their hard work, encouragement, and invaluable guidance throughout this practical training.

Last but not least, I'd want to express my heartfelt gratitude to my dear parents and everyone else who consciously and unknowingly helped me gain the necessary training and principles to make this endeavour a reality.

Thank you so much.

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## **CHAPTER 1.0**

### **INTRODUCTION**

#### **1.1 Background of study**

Renovation (also known as remodelling) is the process of repairing or replacing a broken, damaged, or out-of-date structure. Commercial and residential renovations are both common. Furthermore, refurbishment can relate to creating something new or bringing something back to life, and it can be used in social circumstances. A community, for example, can be renovated if it is fortified and revitalised. Many people modify their homes to give them a fresh look or to allow another person to live in them. Home renovations are popular among builders because they provide a steady source of revenue. Homeowners frequently modify their properties in order to boost their resale value and profit when they sell. Additionally, homeowners may choose to make their home more energy efficient, environmentally friendly, or sustainable, which may necessitate some renovation work. Alternatively, for aesthetic or comfort reasons, a homeowner own preferences and demands may change over time, necessitating a makeover.

The importance and power of the planning stage had grown as a result of technological advancements in the refurbishment process. Free online design tools have made it easier to visualise the changes for a fraction of the cost of employing a professional interior designer. The purpose of the remodelling has an impact on the decision to make adjustments. In the case of a "fix-and-flip" (repair and resale) goal, improvements to address a structural issue or design flow yield, or to employ light and colour to make rooms appear more spacious, might result in a ROI (return on investment). There are 5 major types of renovation for example is kitchen renovation, the most common significant renovation in a home is a kitchen renovation. It's also the most effective strategy to raise the value of a home before selling it.

Kitchen renovations can be done for a variety of purposes, including increasing usable space, replacing equipment and cabinetry, and combining projects. Next, bathroom renovations are often not on the same scale as kitchen renovations, but they are important concerns because they can entail plumbing and render a bathroom unusable throughout the process. Bathroom renovations are a great way to add luxury to a home, and they're also becoming more popular as a way to help a family conserve water and electricity by using green fixtures. Furthermore, basement renovation also the major types of renovation, finishing a basement is one of the most cost-effective ways to expand a home's usable space. Depending on the needs, basements can be converted into complete bedroom suites, cinema rooms, game rooms, in-law suites, or whole apartments. These significant improvements can take a lot of time and effort, as well as a lot of design. Additionally, adding a bathroom to a property with less than optimal bathrooms is a popular option. This could be done to give a separate bathroom for youngsters or a guest bathroom not used by the entire household. These are, however, big projects due to plumbing (and general building) constraints. In the same way, it's also highly popular to add a room (or more than one).

These five types of house renovations are best completed with the assistance of a qualified general contractor who can oversee and manage the entire process. During the remodelling process, a contractor can also provide assistance and advise. However, the aim of this report is to discover the process of room space expansion in renovation construction.

## **1.2 Objectives**

The following are some of the aims that have been formed as a result of this construction:

- i) To understanding the process and procedure for expending room space through renovation process.
- ii) To look into the issues that the workers ran into throughout the process of renovation.
- iii) To identify the cost and completion time of the renovation project.

## **1.3 Scope of Study**

The construction project is about to expand a room space at Balai Polis Alor Akar Kuantan Pahang Darul Makmur, which is located between Kuantan city centre and Port Kuantan, about 5-6 kilometres away (Industries). The project is managed by the IIA BUILDER firm, which is also the major contractor. The project is worth RM 10,000, with a construction time of one month from October 27 to November 27, 2021. As a result, the study's primary goal is to determine how the reconstruction of a previously occupied room space is carried out. As a result, the study will be discussed, including the benefits of renovating the room design to make better use of available space and resources. This study also includes a discussion of the difficulties and remedies. Nonetheless, the study does not focus on the number of workers or manpower, but rather on the expenses and time. There were three procedures that needed to be carried out in order to complete the data, which were observation, interviews, and document reviews. Finally, all additional explanations relevant to the aforesaid procedure are provided below.

## **1.4 Methods of Study**

### **1. Observation**

Observation is a method of gathering facts through observing. The observation is about how the remodelling procedure of a expand room space progresses from the removal of the old structure to the construction of the proposed one until it is completed. The average time it takes to reconstruct a new structure is around 6 hours per day, depending on weather conditions and disturbance during installation. The process of reconstructing the structure took two weeks in total. The structure construction process was documented and photographs were taken over the course of six days.

### **2. Interview**

The interview is one of the ways for gathering construction data by conducting a structured interview with a project's trusted person. At the construction site, the interview was performed with the manpower in charge of managing the project. During the installation, this interview was also conducted with the permit holder who was operating at a high level.

## **CHAPTER 2.0**

### **COMPANY BACKGROUND**

#### **2.1 Introduction of Company**

IJA BUILDER is a reputable builder with extensive civil work experience. IJA BUILDER is a multi-faceted construction organisation that can meet the needs of its clients through general contracting, self - development and self-construction management, and design-build agreements. The company's top aim in each case is to assist its clients in achieving their building and development goals. IJA BUILDER's passion for construction and commitment to the future has attracted the most knowledgeable management and field workers in the area. Furthermore, the organisation is a leader in the sector when it comes to implementing innovative techniques in project management, scheduling, budgeting, and administration.

#### **2.2 Company Profile**

IJA BUILDER is a new company that was founded in 2018. Despite the fact that IJA BUILDER is a young firm, they have already renovated over 20 properties and built a few residences since 2018. The company's primary goal is to renovate and expand the building, as well as to engage in construction based on talent and technology. The address of IJA BUILDER is NO 9 Tingkat 1, Lorong TMJ 1, Taman Mentiga Jaya, Pekan, Pahang 26600. Puan Nur Syafiqah Syahirah binti Indra Gunawan has registered IJA BUILDER with the Companies Commission of Malaysia (SSM) with the registration number CA0310348-U. By registering his company with the Malaysian Construction Industry Development Board (CIDB) under SYARIKAT BINAAN GRED G2, the company's owner took the initiative to delve into the area of construction at a higher level and subsequently become a respected contractor company. IJA BUILDER's aim is to deliver high-quality

residential house repair and building services while focusing on efficiency to ensure customer satisfaction. IIA BUILDER is thought to be able to grow farther in this field as well as become a proactive and viable entrepreneur in the current period of modernization, based on the philosophy of "We Construct Dreams."

### 2.3 Company Organisation Chart

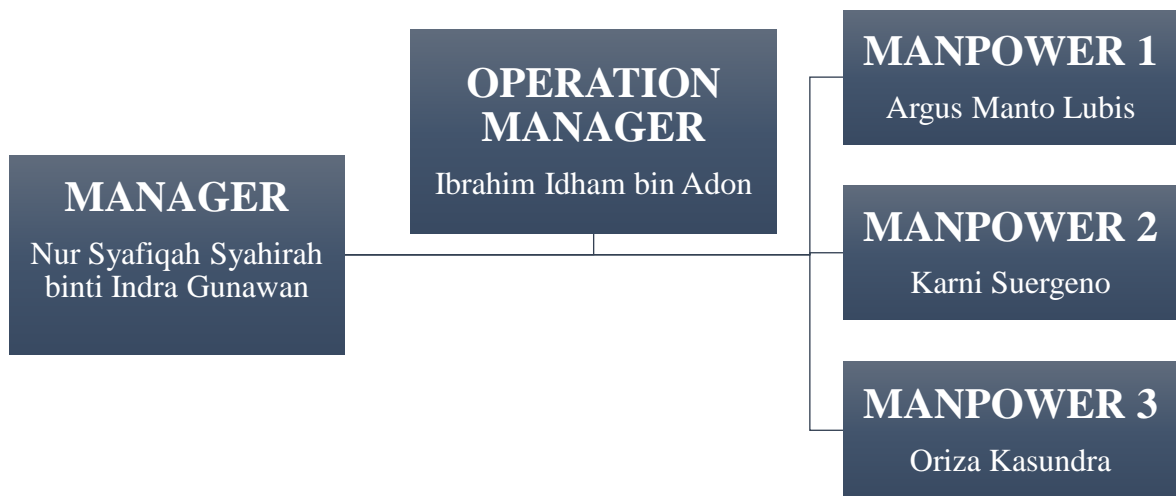


Figure 2.1: Organization chart of IIA BUILDER

### 2.4 List of Project

#### 2.4.1 Completed Project

NO.	Project Title	Project Value	Start Date	Complete Date	Client
1.	Projek membina tempat letak kereta dan atap  NO 1, Lorong Taman Beserah 28, Taman	RM 38 000	1/9/2021	5/10/2021	EN. AZMI BIN TALIB

	Beserah, Kuantan Pahang				
2.	Projek menambah ruang dapur. (15 X 12)  NO 19, Lorong BDK 1/23, Jeram Estate, Kuantan, Pahang.	RM 28 800	14/9/2021 1	7/10/2021	EN. WAN SHAHRIN

#### 2.4.2 Project in Progress

No.	Project Title	Project Value	Start Date	Client
1.	Projek menambah ruang dapur dan membina tempat letak kereta.  NO 6 Lorong Cempaka 6/16 Kiara Bay Lot 177 Kampung Cempaka, Sepat 26060 Kuantan, Pahang.	RM 45 000	23 /9/2021	PN ISMAYUDIN
2.	CSR (community service response) projek menambah ruang bilik.  Kwarters balai polis Alor Akar, Kuantan, Pahang.	RM 10 000	28/10/2021	PEJABAT POLIS DAERAH KUANTAN



## CHAPTER 3.0

### PROCESS OF EXPANDING ROOM SPACE (RENOVATION)

#### 3.1 Introduction to Case Study

The process of expanding a room space is the subject of this case study. The project began construction on October 27, 2021 and was completed and handed over to the client on November 27, 2021. Construction costs are estimated to be around RM 10,000, depending on the issues that arise throughout the construction process. As a result, the study will be discussed not only in terms of the method, but also in terms of the tools used, the amount of time spent on the project, and the construction problem and solution. Nonetheless, the study does not focus on cost and manpower issues. The site was located between Kuantan City and Kuantan Port, approximately 5-6 kilometres away.



Figure 3.1 Location of site based on the satellite map

Source: <https://www.google.com/maps>

Kwarters Balai Polis Alor Akar, Daerah Kuantan, Negeri Pahang is where the project is being built. The high school (SMK Alor Akar) and the restaurant are the closest buildings near the construction area. The construction site is also close to the beach, which results in a strong breeze. The site's efforts included tearing down an old wall and reconstructing the room's structure. This is one of the difficult jobs that must be handled by expert workers because it is not a simple task that could harm safety. The tools used in this project include a wall hacking machine, a large hammer, a glove, a safety boot, and a safety helmet.








Figure 3.2 Room structure plan

Next, time is critical to the construction project's success. According to the room structure's design plan (figure 3.2), the room is 9 feet broad and 10 feet long, with an 8-foot height.

Before starting to rebuild the room structure, the existing wall must be demolished first so that a new structure may be built precisely. This process will take some time to complete because it demands precision and avoids mistakes. Last but not least, one of the issues with the process of expanding the room space is the minimum amount of space required to complete the task. The problems can be solved by reducing the number of workers to only those who are skilled in order to speed up the construction process.

**3.2 To have a better understanding of the processes required in expanding room space during the renovation process.**

STEP	DIAGRAM	EXPLANATION
1.		<p>First, the client, consulting engineers, and contractor will meet for a site visit. Meetings were held to discuss the state of the room structure and the new structure of the room.</p>
2.		<p>After the discussion have make, before build a new structure precisely, the existing wall must be demolished first by using a right tool and must be handle by skilled worker to avoid any mistakes from happening.</p>
3.		<p>After the demolish work have finish, building a new wall will begin to make a new structure of the room.</p>

4.		<p>After building a new wall have done, plastering work will begin to make the wall looks neater.</p>
5.		<p>Then, finishes work will begin after all the construction work have finish such repaint the wall and the ceiling, tiles installment.</p>

### 3.3 To investigate the problems that the workers encountered during the renovation process.

#### **Problem: Limited Space to The Renovation Work**

The room space is narrow to do a renovation work so the process will take long time.

#### **Solution: Limited the Workers to The Skilled One**

Because of a limited space to do the work so the solution is limited a worker to a skilled one to avoid a crowded situation

### **3.4 To identify how much the renovation will cost and how long it would take to complete.**

The time for the project to complete is about one month starting from 27 October till 27 November 2021 and the overall cost of the project is about RM 10,000.

## **CHAPTER 4.0**

### **CONCLUSION**

To sum up, based on what has been previously mentioned about the renovation of an office area over the course of approximately 5 months of practical experience, I can conclude that remodelling is one of the most significant elements to consider when increasing the efficiency of a home. There are several advantages to renovating a structure; for example, it will increase the value of your home and improve its usefulness. With wall finishing works, the process took about a month, commencing on October 27th and ending on November 27th, 2021. Due to a shortage of workers and a lack of available space, the renovation work was postponed for a few days. As a result, it takes longer than expected.

Finally, the method of remodelling works for space extension is a frequent way for small buildings such as offices and other similar structures. Nothing is done in a different way throughout the renovations to make room for more people.

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