

ADDIS ABABA UNIVERSITY

COLLEGE OF BUSINESS AND ECONOMICS

SCHOOL OF COMMERCE

PROJECT MANAGEMENT PRACTICES (PMP) OF FEDERAL HOUSING CORPORATION HOUSING CONSTRUCTION PROJECTS

BY

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A Thesis Submitted to Addis Ababa University College of Business and Economics School of Commerce, As Partial Fulfillment to The Requirements for The Award of The Degree of Master of Art in Project Management (MAPM)

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STATEMENT OF DECLARATION

I hereby declare that the project work titled “Project management practices (PMP) of federal housing corporation construction projects″ is a study conducted with my own efforts, and that all sources of materials used in the study have been appropriately accredited. I have developed this research paper entirely on my own, with advice and suggestions from my advisor. This research is provided as a partial fulfilment of a Master of Art degree in Project Management and has not been submitted for any degree at any university or institution.

Zerihun Balcha

Signature _____

Date _____

STATEMENT OF CERTIFICATION

This is to certify that Zerihun Balcha has carried out his project work on the topic entitled "Project management practices (PMP) of federal housing corporation construction projects". This work is authentic, and eligible for submission as partial fulfillment for the requirements of the award of Master of Arts in project management.

Prof. Worku Mekonnen

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Date _____

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"PROJECT MANAGEMENT PRACTICE (PMP) OF FEDERAL HOUSING CORPORATION CONSTRUCTION PROJECTS"

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List of Acronyms

PM	Project Management
PMBOK	Project Management Body of Knowledge
PMI	Project Management Institute
PM	Planning Management
SM	Schedule Management
CM	Cost Management
QM	Quality Management
RM	Risk Management
MC	Monitoring and controlling
PMP	Project Management Practice
FHC	Federal Housing Corporation

ABSTRACT

This abstract presents the findings from a survey conducted on the project management practices of federal housing corporation current housing construction projects. The research aims to investigate how standard project management practices are adopted in the FHC's housing construction projects, to identify the main processes, the strengths and weakness in implementing these processes, to identify the main factors that are mostly affecting the project performance and to assess strategies applied to improve the project management performance of federal housing corporation housing construction project. The study used quantitative research with descriptive research design. Data was collected through a questionnaire which included both open and closed ended type of questions. A purposive sampling technique was employed to select respondents from the federal housing corporation staffs, the contractor and consultant employees. ***71*** *questionnaires were distributed and out of which* ***58*** *(****81.6****%) was collected and the respondents include project managers, resident engineers and site engineers, office engineers and architects and technical team members. SPSS and Microsoft excel software was used to analyze the descriptive statistics. The research findings show that the corporation is weak in practicing important process of project management. i.e., The Corporation's projects are being affected by prolonged duration (delay) and cost overrun. Finally, the researcher recommended: flexible organizational structure, good working environments and systems in place, qualified skilled and professional staffs on the job, skilled leadership, committed management and dedicated staffs.*

Key words: Federal Housing Corporation, project management practice, project cost, project schedule Project quality and project performance

CHAPTER ONE

1. Introduction

1.1 Background of the study

According to the Guide to the Project Management Body of Knowledge (PMBOK), PM is "the application of knowledge, skills, tools, and techniques to project activities to meet the project requirements" (PMI, 2017). In general, PM follows the following set of phases (set of ordered activities); Initiate, Plan, Execute, Monitor-Control and Close (PMI, 2017). These phases, with some variations, may apply to different types of projects which are (i) individual projects, (ii) programs and (iii) portfolios (Andersen & Jessen, 2003). Accordingly, project management practices encompass a set of principles, methodologies, and tools that guide the planning, execution, monitoring, and completion of projects which are essential for ensuring that projects are delivered on time, within scope, and on budget while meeting or exceeding stakeholder expectations outcomes (PMI, 2021)

Even though many housing projects in developing nations like Ethiopia suffer from problems like delays, cost overruns, and poor implementation, which can keep them from achieving their objectives, successful housing projects enhance living conditions and promote community development. According to Ogunbiyi and Abdulkareem (2023), the successful housing construction project management (CPM) saves cost and time and does not compromise the quality. Planning errors, contractor inefficiency, and material and equipment delays are common causes. Also, payment delays, especially for government projects, hinder contractors' cash flow and project progress (Ogunlana & Aluko, 2021)

However, companies rarely have formal risk management frameworks for material cost fluctuations, labor strikes, and environmental issues. Thus, firms react rather than solve problems, causing delays, cost overruns, and project failures (Ogunlana & Aluko, 2021). Furthermore, construction risk assessment identifies, analyses, and mitigates threats that could delay, cost more, or lower quality. Poor risk management can cause delays, cost overruns, and substandard housing, especially in regions with weak institutional frameworks (Rajendran et. al., 2019).

Few housing projects in developing countries have formal risk assessment frameworks, leaving them vulnerable to price fluctuations, regulatory changes, and environmental hazards (Ogunlana & Aluko, 2021; Adeleke & Nawi, 2022). Poor materials resource management is also another obstacle i.e., unreliable transportation, inventory management, Just in Time (JIT) and power distribution disrupt material and equipment delivery (Olaleye et. al., 2022). Also, imported

materials can be delayed by customs and exchange rate fluctuations, slowing project progress (Olaleye et. al., 2022).

Comprehensive use of project management best practices is essential for organizations to deliver projects successfully. However, implementing these practices requires significant investments from the company. Hence, organizations must select and manage the best practices carefully to improve the efficiency and effectiveness of the organization (Alias, Baharum, & Idris, 2012). By doing so, they can ensure that their projects are completed on time, within budget, and meet the intended objectives.

In order to solve the challenges that Federal Housing Corporation encounters in the project management practices of ongoing housing projects and to satisfy the demands of the two cities' rapidly urbanizing populations, this study attempts to address these systemic concerns of projects specific to Addis Ababa. By analyzing these practices and their impact on project outcomes, the research provides evidence-based recommendations to strengthen organizational performance and support the successful delivery of future housing projects

1.2 Background of the company

Until March 2017, the Federal Housing Corporation (FHC), a state-owned business reorganized in accordance with Council of Ministers Regulation No. 398/2017, has been in operation for over 40 years under various corporate names. The Corporation is mandated to build, contract, lease, sell, or acquire unique decision homes that could be utilized for various purposes. Federal Housing Corporation Driving Transformation in Ethiopia’s construction sector. FHC’ mission is to provide and manage standard housing at reasonable prices, and its vision is to become one of the most competent integrated real estate and construction enterprises in East Africa by 2040.

The Federal Housing Corporation (FHC) has evolved as a major actor in the construction industry of the country by implementing different strategic actions to expand housing supply, ensure affordability, modernize building methods, and introduced latest construction technologies. One of these achievements is the construction of a large building materials manufacturing factory, which contributes to the domestic supply chain reliability and minimizes imported materials and saves hard currencies. Besides, it devises modern management systems that promote the efficient management of federal government buildings and woks to bridge the gap between housing supply and demand in Ethiopia.

Being an institution of fifty years of experience, FHC has become a major player in the nation's housing and construction sector by supplying sustainable and quality housing at reasonable cost for both residential and commercial purposes. The Corporation is organized under five different sectors: Which are run by the CEO and four deputy CEO's

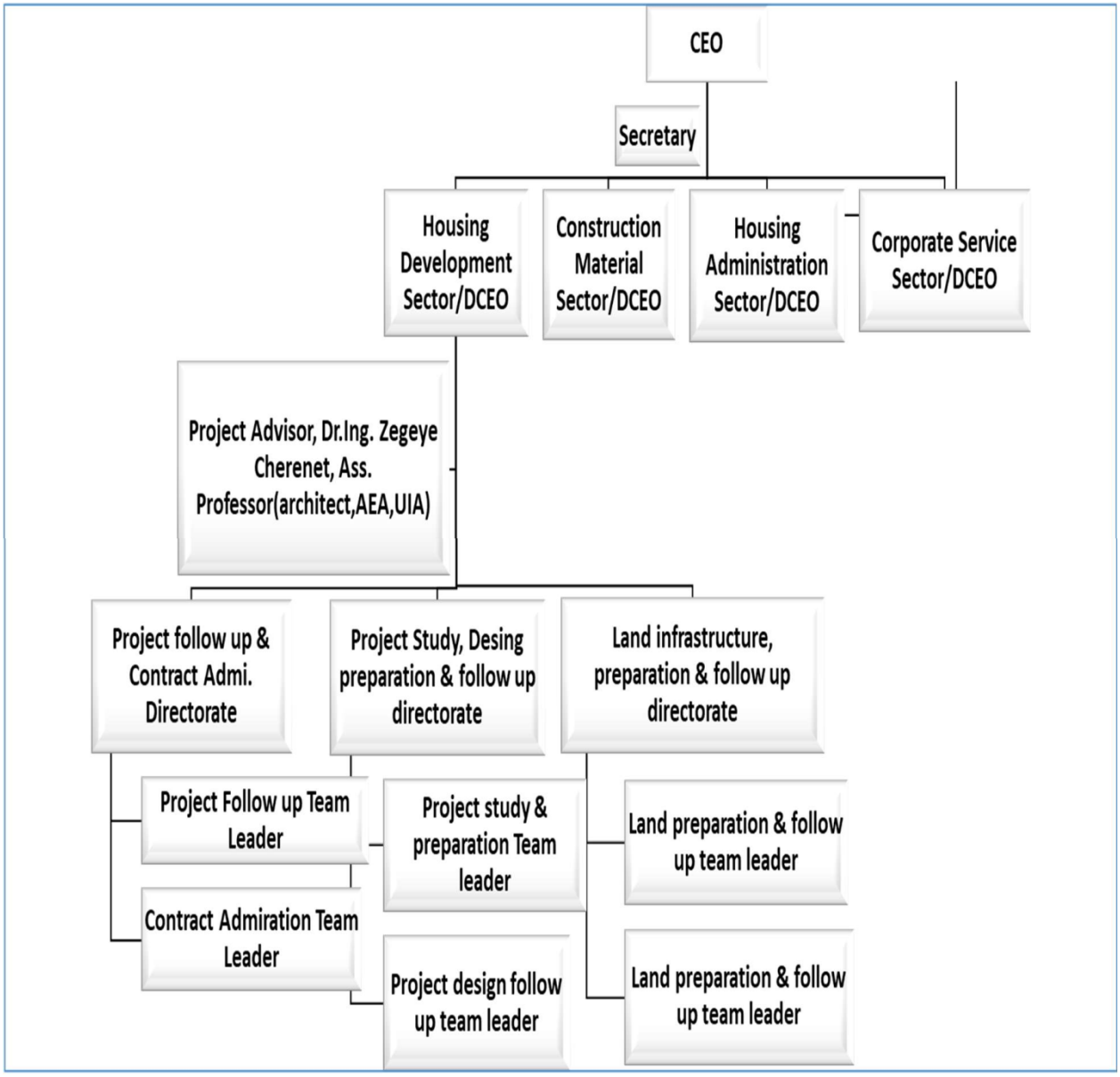


Fig1.1 Organizational structure of the corporation

Federal Housing Corporation is undertaking multiple projects simultaneously with different levels of complexity and nature. This practice demands modern project management processes to ensure that projects are performed efficiently along with meeting the regulatory requirements and building standards. However, the Corporation is facing challenges related to resource allocation like budget, human and material, contract administration, monitoring and controlling, evaluation and close out tasks. Risk mitigation and stakeholder communication strategies. These problems cause difficulty to consistently deliver successful housing projects.

After almost thirty years, Federal Housing Corporation (FHC) has started constructing new housing projects again. Around eighteen projects have been started and out of which eight projects are completed to deliver to the end users while five projects are under construction. Most of the projects are financed by the corporation's own revenue and only few are partially funded by the bank loan. The corporation uses both traditional and modern construction techniques. Hence, for the first time FHC introduced aluminum formwork technology and recently is trying to introduce 3D Technology construction which is one of its kinds to the country.

1.3 Statement of the problem

Project management gives the benefit of a structured way to **plan**, **execute**, **monitor**, and **complete projects successfully**. Some of the main benefits are providing projects with Clear Goals and Direction, Better Planning, Efficient Resource Utilization, Improved Risk Management. Enhanced Communication, Better Quality Control, Time Management, Cost Control and Increased Customer Satisfaction. Although properly managed projects have the above-mentioned benefits, numerous projects in developing nations such as Ethiopia, strive with implementation issues, delays, cost overruns, and poor implementation. Planning errors, contractor inefficiency, and material and equipment delays are some of the common causes of the problems encountered on these kinds of projects. Also, payment delays, especially for government projects, hinder contractors' cash flow and project progress (Ogunlana & Aluko, 2021).

According to Ogunbiyi and Abdulkareem (2023), the successful housing construction project management (CPM) saves cost and time and does not compromise the quality. In many developing countries like Ethiopia, construction firms face persistent challenges such as cost overruns, schedule delays, poor quality delivery, safety issues, and inefficient resource utilization often resulted from inadequate or inconsistent project management processes. Belay, S. M., Tilahun, S., Yehualaw, M., Matos, J. C., Sousa, H. S., & Workneh, E. T. (2021).

The performance of housing construction projects is closely linked to the effectiveness of project management practices employed throughout the project lifecycle. Project management practices, when applied properly, lead to an increase in the probability of project success (Thomas & Mullaly, 2008). Performance of projects is quantified and appraised using many performance metrics that could be linked to several aspects to include time, client endorsement and changes, the performance of the firm, cost, health and safety, along with quality (Cheung et al. 2014).

Federal Housing Corporation (FHC) is one of the major players in the housing development sector of the country; yet, the company has encountered delays, cost overruns and budget shortages in many of its projects. As a newly emerging organization to the construction industry after 28 years, the corporation is trying to employ standard project planning and execution procedures but considerably implementation problems have been revealed on many of its projects. These problems are the results of improper project management practices like weak planning practices, lack of strong project monitoring and controlling, weak coordination among project departments and weak communication channels, and less or no risk management approaches. These weaknesses and gaps should be corrected according to the standard practices otherwise it will damage the project delivery of current projects and in the long run it will also undermine the company's competitiveness, profitability, and capacity to fulfill the increasing housing demands.

Comprehensive research is needed to analyze current project management practices of Federal Housing Corporation's (FHC) whether the practice support timely, cost-effective, and high-quality delivery housing projects. Hence, a systematic investigation into the strengths, weaknesses, and overall effectiveness of the project management practices of Federal Housing Corporation (FHC) is necessary. Such kind of studies would help solve the company's problem but if it is not investigated given a solution, it may continue to experience inefficiencies that hinder its strategic objectives.

Therefore, this study aims to close the gap by analyzing Federal Housing Corporation's (FHC) current project management practices, sorting out significant problems, and provides practical solutions to improve its service delivery.

1.4 Research Questions

1. How successful are the project management practices of Federal Housing Corporation (FHC) at completing housing projects according to the planned schedule, budget, and quality standards?
2. What are the major strengths and weaknesses of the current project management practices of Federal Housing Corporation (FHC)?
3. What improvement can be applied to enhance the corporations project performance?

1.5 Research Objectives

1.5.1 General Objective

The General objective of this study is to assess the current project management practices (PMP) of federal housing corporation construction projects.

1.5.2 Specific Objective

The specific objectives of this study are:

1. Evaluating the corporation project performance according to the time, budget, and quality expectations;
2. Identifying the major strengths and weaknesses of FHC's project management practices.
3. Improving the project performance of FHC's project management practices.

1.6 Scope of the Study

This research paper studied FHC's project management practices based on the analysis made on important project practices like project planning, scheduling, cost, quality, communication, risk, monitoring and controlling, and overall performance management. The three project constraints i.e., time, cost, quality are given more emphasis in the study.

Methodologically, this study employed a quantitative research approach using a descriptive case study research design to assess the project management practices of the Federal Housing Corporation. Primary data were collected through structured questionnaires given to project managers, resident engineers, office engineers, architects, supervisors and technical staff of the corporation, contractors, and consultants involved in housing construction projects. Secondary data were obtained from project reports, schedules, company documents, and journals. Purposive sampling was employed to select respondents with adequate project management experience. The collected data were analyzed using IBM SPSS and Microsoft Excel through descriptive statistics, correlation and regression analysis.

Conceptually, the study focuses on project management practices as the independent variable and project performance as the dependent variable. The project management practices examined include project planning, risk management, communication and coordination, monitoring and control, and resource management. Project performance is measured using four indicators: timely project completion, completion within the approved budget, achievement of the required quality standards, and client or stakeholder satisfaction.

The study included only recent housing development projects which are completed and still under construction by the Corporation over the last eight years. Project managers, site engineers, office engineers and architects, supervisors, and other staffs who have related job natures to the projects are assumed as the primary source of data and the means of data collection were through questionnaires and interviews. Geographically, the study area was focused specific to projects which have been built and under construction in Addis Ababa region only.

1.7 Significance of the Study

The significance of this study will be helping the corporation to identify the effectiveness of project management practices and to give recommendations to the weaknesses in project delivery which slows down the Corporation's capacity to meet housing demands. In addition to that the study would fill a research gap by giving empirical data to the project management practices of the country's major housing supplier in context to have a clear view for practitioners and professionals, decision-makers, and policymakers. The findings would have the potential to improve housing quality and availability, increase organizational competitiveness, and inform best practices suitable for similar developing contexts.

Finally, the study will be valuable for practitioners and students who can use it as a reference material and provides a base for further research. By identifying the research gaps, it may help to researcher's future studies.

1.8 Organization of the study

The research paper's first chapter examines the issue that needs to be resolved and poses pertinent questions regarding the study and the goals that will be attained at the conclusion of the investigation. Additionally, the study's limitations and scope are explained. The literature review in Chapter 2 includes pertinent studies and publications related to the subject matter of this investigation. The methods and processes for gathering and analyzing data are demonstrated in Chapter 3. In Chapter 4, the data analysis is demonstrated and the findings are thoroughly discussed. Chapter 5 concludes with suggestions for additional research after discussing the results' implications from the perspective of the research questions posed.

1.9 Limitations of the study

It is important to recognize the limitations of this study. First, the study is restricted to a particular organization and region, which can limit how broadly the results can be applied to other institutions or regions. Second, because the study mainly uses self-reported data gathered

from questionnaires bias, incomplete replies, or misinterpretations of specific questions may have an impact on the findings. Third, the study's thoroughness might have been impacted by time constraints that restricted the scope of data gathering and analysis. Additionally, limited access to secondary data and relevant documents may have constrained the scope of the analysis. Finally, financial constraints may influence the sample size and the methods used for data collection.

CHAPTER TWO

2 Literature Review

2.1 Introduction

The literature on project management practices in construction projects, particularly in the housing industry, is reviewed in this section of the study. It attempts to examine the results and conclusions of related studies and papers. The main premise of this study has been demonstrated using recent research and articles. The empirical literature review section describes the many contexts in the research papers that are reviewed, while the theoretical section covers the fundamentals of project management, knowledge domains, and its applications in building projects. The chapter concludes by identifying gaps in the existing literature that justify the need for the present study on Federal Housing Corporation project management practices.

2.2 Theoretical Literature Review

2.2.1 Project Management

A project is defined as a temporary endeavor undertaken to create a unique product, service, or result (PMI, 2021). Project management is fundamentally the application of knowledge, skills, tools, and techniques to project activities to meet project requirements. Standard frameworks such as the Project Management Body of Knowledge (PMBOK) describe core processes including project integration, scope, time, cost, quality, risk, human resources, communications, procurement, and stakeholder management. These frameworks provide a structured basis for planning, executing, and controlling projects within the construction sector. Wikipedia). The process groups include initiating, planning, executing, monitoring and controlling, and closing. The process groups can overlap in the case of complex projects or used iteratively for uncertain and changing project environments (Wysocki, 2019; PMI, 2021).

2.2.2 Project Management Practices

This theoretical review explains the basic theories and conceptual models that drive project management practices within the housing construction sector. Project management practices are crucial for successful construction projects, encompassing aspects like time, budget, quality, and resources. They prevent cost overrun issues through goal setting, feasibility studies, and realistic schedules Govindaras, B.; Wern, T.S.; Kaur, S.; Haslin, I.A.; Ramasamy, R.K. Sustainability 2023, 15, 2364. [Google Scholar]

Project management methodologies play a crucial role in enhancing project performance, ensuring that an organization's strategic goals are met. Both public and private organizations invest heavily in developing and adopting project management methodologies (Wells, 2012). According to Murch (2001), any methodology comprises four key components: techniques, tools, guidelines, and templates.

Effective project management is a well-structured approach that aims to deliver the expected business value using the right tools, knowledge, techniques, processes, and skills to meet the needs of the sponsor (PMI, 2021; Wysocki, 2019). Effective project management practices are vital for successful construction projects and Key practices include well-defined objectives, scope, and deliverables, as well as effective communication with stakeholders [2] Lin, L.; Xu, F.; Ge, X.; Li, Y Renew. Sustain. Energy Rev. 2018, 89, 151–167. Effective communication is also crucial for project success, managing triple constraints, and sustainable practices. This involves environmental responsibility, social equity, and economic viability [1] Borthakur, A.; Govind, M Resour. Conserv. Recycl. 2017, 117, 102–113. [Google Scholar]

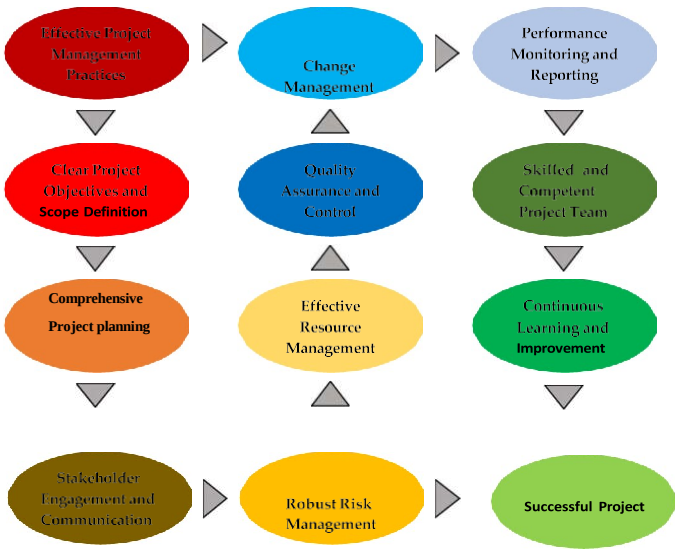


Figure 2.1 Effective project management practices to avoid cost overrun in construction project

Effective project management requires the implementation of competent feedback mechanisms. Feedback and reviews, which are part of internal communication, are essential for understanding the flaws in project conditions. Feedback mechanisms can initiate preventive and corrective actions, which are important for the success of the project (Pinto & Slevin, 1987; Loo, 2003). It is crucial that feedback and reviews should be an ongoing and continuous process, and not just a one-time event after the project is completed. Identifying issues at an early stage reduces risks and initiates organizational learning and training needs (Kotnour, 2000)

Project management best practices are crucial for organizations to achieve their objectives and goals efficiently. Implementing appropriate best practices can help improve organizational effectiveness, enhance consistency and uniformity across all departments, and ensure that the organization is running smoothly (Kerzner, 2023). Organizations must select and manage the best practices carefully to improve the efficiency and effectiveness of the organization (Alias, Baharum, & Idris, 2012). By doing so, they can ensure that their projects are completed on time, within budget, and meet the intended objectives.

According to Kerzner (2017), poor project management practices in construction often lead to schedule delays, budget overruns, quality defects, and disputes among stakeholders. Therefor it is important to have effective project management to ensure that housing projects are completed within the planned scope, time, cost, and quality standards. Another important aspect is that the Project Management Triangle (also known as the triple constraint) illustrates that quality in project outcomes is constrained by cost, time, and scope, and that adjustments in one constraint affect the others. Wikipedia

Top management support, people factors, communication, project planning, change management, stakeholder management are some of the critical success factors that have shown statistical significance to project success (Finney & Corbett, 2007; Menon, 2020; Nah et al., 2001; Pinto & Slevin, 1987; Shaul & Tauber, 2013). Stakeholders are people or organizations, sponsors, and customers with genuine interests in the project outcome. According to Nelson (2007), the second biggest cause of project failure is the result of ineffective stakeholder management. Identifying stakeholders who need attention from project teams and assessing their levels of influence is critical for project success (Shaul & Tauber, 2013). Challenges occur due to conflicting and differing viewpoints from stakeholders. The project manager must be responsible for managing stakeholder expectations (PMI, 2021).

A successful housing project will enhance living circumstances and promote community development. However, home building projects are characterized by significant capital investment, usually complex, involving several stakeholders, limited resources, and stringent schedule and financial limits. The successful completion of housing projects depends on the efficient management of a number of tasks that are integrated into project management in the home construction industry, such as planning and scheduling, resource allocation, risk management, quality control, and stakeholder coordination. Common practices in housing construction include: Use of project schedules and budgets, regular site meetings and progress reports, monitoring and evaluation systems and application of safety and quality standards. Project management methods control construction costs through precise estimation and cost

control. Engaging stakeholders with effective communication ensure project success and quality assurance [2]. Lin, L.; Xu, F.; Ge, X.; Li, Y Renew. Sustain. Energy Rev. 2018, 89, 151–167.

Housing construction projects are characterized by high capital investment, typically complex, involving multiple stakeholders, limited resources and strict time and cost constraints but if successful housing projects improve living conditions and support community development. According to Kerzner (2017), poor project management practices in construction often lead to schedule delays, budget overruns, quality defects, and disputes among stakeholders. Therefor it is important to have effective project management to ensure that housing projects are completed within the planned scope, time, cost, and quality standards.

Several studies identify common challenges affecting project management practices in housing construction, including: inadequate planning and scheduling, limited skilled project management professionals, poor coordination among stakeholders, financial constraints and delayed payments and weak risk management practices.These challenges are more pronounced in developing countries, where institutional and capacity limitations affect project execution. Studies indicate that organizations with formalized project management practices tend to achieve better project performance compared to those using informal approaches. A detailed project plan and efficient communication with stakeholders prevent misunderstandings [1]. Borthakur, A.; Govind, M Resour. Conserv. Recycl. 2017, 117, 102–113. [Google Scholar] Implement risk management to maintain timelines and budgets [2]. Risk assessment and cost-control measures ensure staying within the budget Lin, L.; Xu, F.; Ge, X.; Li, Y Renew. Sustain. Energy Rev. 2018, 89, 151–167. [2].

2.2.2.1 Initiation

Project initiation is the first process to start in the Project life cycle where projects get formal approval for implementation and the main direction is defined. According to the Project Management Institute (PMI), project initiation involves the processes performed to define a new project or a new phase of an existing project by obtaining authorization to start the project (PMI, 2021). The project's viability, adherence to organizational goals, and soundness to investment is decided based on the outcome of this process.

Project Charter is a document which is produced during the initiation phase to approve the project and gives the project manager the mandate to use the company's resources. The document briefly states about the project objectives, scope, deliverables, risks, constraints, and stakeholder identification. Another Important process in this phase is the Identification and analysis of stakeholder who could affect or be affected by the project. It would be beneficial for the project

managers to perform this task earlier so that they can get a clear view of their expectations, aspirations, and possible impact on the project. This will help to have a good stakeholder relationship, minimize conflicts, and promotes the success of the project.

Feasibility study is also another important process in this phase which investigates whether the project is viable from technical, financial and economic perspectives. Feasibility studies which are undertaken for construction projects should focus on issues like how to acquire land, design standards, regulatory compliance, cost, and the expected benefits. If not properly undertaken feasibility studies might contribute to the failure of projects.

2.2.2.2 Planning

Project planning is the fundamental phase of project life cycle and it is the core process which defines the clear path of the project execution, monitoring, and controlling. According to the Project Management Institute (PMI), project planning involves establishing the scope, objectives, schedule, budget, resources, risk responses, and communication mechanisms necessary to achieve project goals effectively (PMI, 2021).

A. Concept of Project Planning

Project planning refers the methodical procedure of identifying project requirements and defining the actions needed to achieve project objectives. Kerzner (2017) describes project planning as the process of deciding in advance what should be done, how it should be done, when it should be done, and who should do it. Effective planning reduces uncertainty, improves coordination among stakeholders, and ensures efficient utilization of resources.

B. Importance of Project Planning

Project planning is essential for achieving project efficiency and effectiveness. Proper planning helps in minimizing risks, controlling costs, and ensuring timely completion of projects. According to Meredith and Mantel (2018), projects with comprehensive planning frameworks are more likely to meet scope, time, and cost requirements. Project planning is used as a base to perform tasks like decision makings, performance evaluation, and accountability during the life cycle of a project.

C. Project Planning and Project Performance

Project planning and project performance are very important concepts in project management. Therefore it is demanding to know the basic relationship between effective planning and project performance. Hence, Turner (2014) argues that thorough planning enhances control and coordination, leading to improved project outcomes. Poor planning, on the other hand, often

results in cost overruns, delays, and quality issues. Thus, in project management practice, project planning is seen as a crucial success component.

2.2.2.3 Execution

Project execution is serious of activities performed one after another or simultaneously to achieve an outcome which is envisaged during the planning process. According to the Project Management Institute (PMI), project execution involves coordinating people and resources, managing stakeholder expectations, and integrating activities in line with the project management plan. Theoretically, project execution is the transformation of managerial intent to organizational reality, which makes it very complicated and resource-intensive phase of a project. To evaluate the Performance of a project execution standard must be set and continuous measurements should be taken against them.

Scholars argue that execution requires proactive risk response strategies, including risk mitigation, transfer, acceptance, or avoidance. The dynamic nature of execution means new risks may emerge, requiring continuous reassessment. Stakeholder theory asserts that project success depends on satisfying the expectations of key stakeholders. During execution, stakeholder engagement becomes more intensive, as deliverables, changes, and issues directly affect stakeholder interests. Effective execution balances competing stakeholder demands while maintaining project objectives. Success is increasingly viewed not only in accordance with scope, time, and cost, but also stakeholder satisfaction and long-term value creation.

Understanding the common challenges of implementing project management and ensuring that you have solutions to them or ways around them will help increase the success factor of your project management practices (Choudhuri, 2015). PMO is a structured organization that can provide strong support and service to the organization while implementing and managing best practices and projects (Andersen et al., 2007). Ineffective PMO can damage the implementation efforts of the project organization. Invariably, a strong and competent project manager capable of providing expert opinion and guidance to other project managers often heads PMO.

Some of the common challenges that arise during the implementation phase are unsupportive top management, ineffective stakeholders, inefficient PMO, insufficient project planning, and people factors. By leveraging best practices and proactively managing success factors, project managers can improve project performance and increase business value. Project managers must adapt to changing situations, at the same time displaying creativity and courageousness when dealing with project conditions (Wysocki, 2019). The personal traits or attitudes of a project manager demonstrate the ability to complete a project successfully (PMI, 2007).

Project execution is a multifaceted process that is impacted by organizational, management, and environmental aspects, according to the theoretical review. Theories such as systems theory, contingency theory, leadership theory, and stakeholder theory provide a comprehensive framework for understanding how execution contributes to project success or failure. Effective project execution requires integration of resources, people, processes, and controls within a dynamic and uncertain environment.

2.2.2.4 Monitoring and controlling

A. Monitoring in Project Management

Monitoring as a core component to control function, it involves tracking project operations to make sure if a project is carried out according to the plan. As to Project Management Institute (PMI), monitoring enables project managers to identify deviations early and take corrective actions. Several academicians and experts define the term "Monitoring" from different angles. Even though there is a common ground for all, for different disciplines, the focus of the definition's changes. OECD, (2002) defines Monitoring as a continuing function that uses systematic collection of data on specified indicators to provide management and the main stakeholders of an ongoing project with indications of the extent of progress and achievement of objectives and progress in the use of allocated budget. (Ruskin.A.M.,1985) in his journal has explained the importance of an early monitoring as "if a mistake is not detected in a timely way, the remedial work required when it is actually spotted may use so much of the contingency allowance that the allowance remaining afterwards will be inadequate to accommodate following mistakes.

In construction projects, monitoring is critical due to the complexity of activities, involvement of multiple stakeholders, and high financial investment. Effective monitoring ensures compliance with project plans, technical specifications, and contractual requirements. Regardless of its size and type, any small or complex project shall be monitored according to the plan documents.

In short, the monitoring system can be generalized as follows.

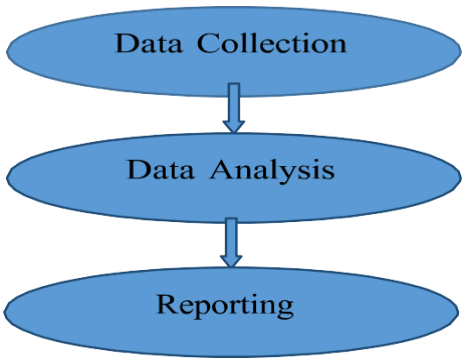


Fig. 2.2 Overall Monitoring system

Key elements of monitoring include:

- Tracking project schedule and time performance
- Monitoring cost and budget utilization
- Assessing quality of work outputs
- Monitoring resource utilization
- Tracking risks and issues

B. Controlling in Project Management

According to Project Management Institute (PMI), Controlling is the process of tracking, reviewing, and regulating the progress and performance of a project, identifying areas where changes to the plan are required, and initiating the corresponding corrective actions. Controlling belongs to all the life cycles of project processes. It involves using the data obtained through monitoring to bring actual performance into correspondence with the plan (Meredith and Mantel, 1989). In order to achieve a successful project, the controlling mechanisms should be performed at the detailed level for each aspect of project performance. A collaborative working relationship should be maintained between the project owner and the project manager. The project manager should possess the flexibility to deal with uncertainty, and the owner should take an interest in the project performance (Rozenes, S. et.al. 2006).

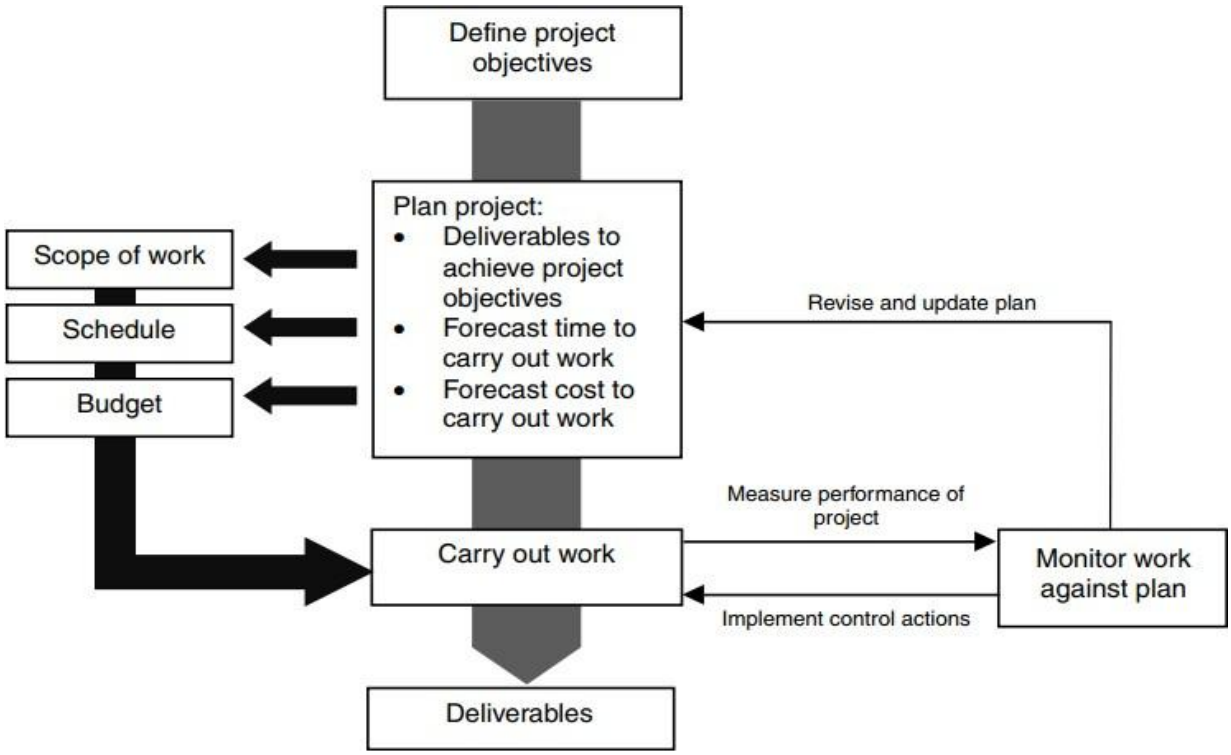


Fig. 2.3 The Project controlling process

2.2.2.5 Evaluation in Project Management

Evaluation focuses on assessing the overall performance and outcomes of a project. It assesses whether the project has met its goals and provided stakeholders with the desired advantages.

Evaluations can be conducted at different stages:

- **Mid-term evaluation** – assesses progress and allows adjustments
- **Final evaluation** – examines overall project performance at completion
- **Post-project evaluation** – assesses long-term impacts and sustainability

In housing construction projects evaluation primarily focuses on investigating issues like cost efficiency, quality standards, stakeholder satisfaction, and sustainability of project outcomes. Besides, organizations can use project evaluation as a means to get lessons from ongoing and completed project experiences, improve future projects, and check on the appropriate utilization of resources.

2.2.2.6 Close Out

According to the Project Management Institute (PMI), project close-out involves finalizing all activities across all project management process groups to formally complete the project or a project phase (PMI, 2021). Hence project close-out is the last phase of the project life cycle, which means when a project gets completed, closing out should be done to make sure that activities like project objectives, contractual obligations, deliverables, and organizational leanings are met.

Close-out activities include final inspections, defect rectification, occupancy certification, and handover of operation and maintenance manuals. Therefore, in addition to safeguarding the interests of the client and contractor, proper close-out guarantees that the built facility is secure, operational, and ready for use.

As to Kerzner (2018) effective close-out confirms client acceptance, ensures contractual obligations are fulfilled, and prevents unresolved issues from affecting organizational operations. But if proper close-out is not under taken as Turner (2016) notes that improper close-out may result in unresolved defects, legal disputes, and loss of organizational knowledge.

A. There are different types of project close-out activities. Some of them are:

Formal acceptance of deliverables: Verification that all project outputs meet the specified requirements and are approved by stakeholders.
Administrative closure: Completion of documentation, updating records, and archiving project files.

Financial closure: Finalizing payments, settling claims, and closing contracts.

Contract closure: Ensuring all contractual terms are satisfied and formally closing agreements with suppliers and contractors.
Resource release: Reassigning project team members, equipment, and facilities.
Lessons learned documentation: Capturing successes, challenges, and best practices for future reference. These activities help ensure accountability, transparency, and organizational learning.

2.3 Empirical Literature review

Organizations with project management best practices uses techniques, tools, methods, or approaches which are very important for the successes of the organization in achieving their objectives and goals efficiently. Implementing appropriate best practices can help improve organizational effectiveness, enhance consistency and uniformity across all departments, and ensure that the organization is running smoothly (Kerzner, 2023).

Therefore, the importance of project management best practices is evident from the Chaos report published by the Standish group in 2015. The report shows that the percentage of successful projects has increased from 29% in 2004 to 36% in 2015. Furthermore, the number of challenged projects decreased from 53% in 2004 to 45% in 2012, whereas 19% of the total projects failed in 2015 (Standish Group, 2015). But empirical studies on project management practices in construction reveal mixed levels of implementation and effectiveness. Researches undertaken in different countries show that:

- Effective project planning and control positively influence project success.
- Poor communication and coordination are major causes of delays.
- Risk management practices are often weak or informal in housing projects.
- Adoption of standardized project management frameworks improves project outcomes.

Based on critical factors studies, some of the key challenges that can influence best practice implementation include top management support, Effective PMO, effective stakeholder management, insufficient project planning and human or people factors (Menon, 2020). According to (Nelson, 2007; Shaul & Tauber, 2013), Maintaining relationships with the top management during the entire project life cycle can overcome the challenges in implementing best practices. Nelson (2007), is also stated that the second biggest cause of project failure is the result of ineffective stakeholder management. Therefore, as to (Shaul & Tauber, 2013) it is clear that identifying stakeholders who need attention from project teams and assessing their levels of influence is critical for project success. Besides, defining project objectives and discussing the project management plan with the project stakeholders is also necessary for project success.

Effective project planning and risk management are crucial for project. According to a PMI study, 37% of the respondents reported that conducting frequent project reviews on risk assessment reduced risks and improved success rates (PMI, 2010) and the study conducted by Nelson (2007) in 74 organizations to determine project mistakes and challenges has revealed the importance of project planning.

Quality, as one of the three constraints in construction projects, is important for success. If not properly controlled it would have a serious impact on the planned budget. Due to a failure to prevent defects and wastage during construction work, the construction sector is faced with the critical issue of cost of poor quality (COPQ). Poor quality costs the construction industry up to 40% of its income and goes unaccounted for. (Mashwama, Aigbovboa, & Thwala, 2017).

Major people factor that may directly affect project success are use of balanced team, consultant selection, dedicated resources, utilization of right people, and team competence (Finney & Corbett, 2007; Menon, 2020; Pinto & Slevin, 1987; Somers & Nelson, 2004;). The study conducted by Nelson (2007) accentuates the significance of people dimension. According to the study, 37% experienced weak personal or team issues, which was the cause of project failures. Discussing about the project management practices of our country, specifically, the Public Housing projects in Addis Ababa: An assessment shows that significant contributions of planning, time, quality, human resource, and stakeholder management to overall project success, while delays and cost escalation persisted due to inadequate practices. Habtamu Solomon Mengistu (2023)

In conclusion, project management best practices are very important for the success of construction projects, which in turn have significant impact on global and national economies by driving development and infrastructure projects across both developed and developing countries. For instance, (Shoemaker, 2023), show that construction activities account for more than 40% of the world's electricity usage and approximately 30% of global greenhouse gas emissions (Min et al., 2022). In Europe and the United States, the construction industry accounts for approximately 40% of the total energy used.

2.4 Summary of Literature Review

From project management practice, the literatures reviewed so far revealed that it is crucial for organizations like the Federal Housing Corporations should adopt the best practices that can provide them the capacity to compete with in the construction industry by delivering quality, cost efficient, and timely project delivery. Both the theoretical frameworks and empirical studies discussed so far gives a clear view of the gap about how project management practices are implemented in specific housing construction companies particularly in developing countries. Therefore, this initiates an in-depth study of the project management practices of FHC

2.5 Conceptual Framework

The conceptual framework of this study has tried to show the relationship between the project performance and project management processes of the corporation. It gives the methods and ways of breaking down different project management techniques and how they affect the timely, within the cost and according to the quality standard completion of housing development projects. Therefore, the dependent variable in this study is the project performance; the independent factors will be the project management techniques. Hence, the framework assumes effective application of project management practices will result in achieving improved project outcomes in terms of cost, time, quality, and client satisfaction.

2.5.1 Independent Variables: Project Management Practices

The study assumed the following core project management practices as Independent
Variables:

1. **Project Planning**

   This is the process of defining project schedule, budget, scope, and resource and if properly planned it will assure to achieve project objectives.

2. **Project risk management**

   This is the process of identifying, analyzing, and responding to potential risks such as cost overruns, material shortages, and delays. Effective risk management reduces uncertainties during project execution.

3. **Communication and Coordination**

   This refers to the day-to-day activities and relationships between project managers, contractors, suppliers, Proper communication and coordination helps to minimize wrong doings and misunderstandings which promotes smooth project implementation.

4. **Monitoring and Control**

   This refers to the checking and balance of project execution so that the project undergoes according to the schedule, budget, and fulfills the required outcomes. These procedures include performance appraisal, quality control, and progress tracking.

5. **Resource Management**

   This refers to the overall resource management i.e. human, material and financial management. Specific to human resource management it focuses on the recruitment, supervision, motivation, and coordination of workers involved in the housing construction project.

2.5.2 Dependent Variable: Project Performance

Project performance is measured by the extent to which housing construction projects meet their intended objectives, including:

- Finishing on time
- Finishing within the budgeted amount
- Reaching the necessary quality standards
- Client or stakeholder satisfaction

2.5.3 Moderating/Intervening Factors

The connection between project performance and project management practices may be influenced by factors such as:

- Availability of resources
- Government regulations
- Organizational structure of Federal Housing Corporation.
- External environmental conditions

2.5.4 Framework Summary

The ideal framework assumes that efficient project management practices positively influence project performance in Federal Housing Corporation. Weak or inadequate practices may result in delays, cost overruns, and poor-quality housing projects, while strong practices enhance efficiency and project success.

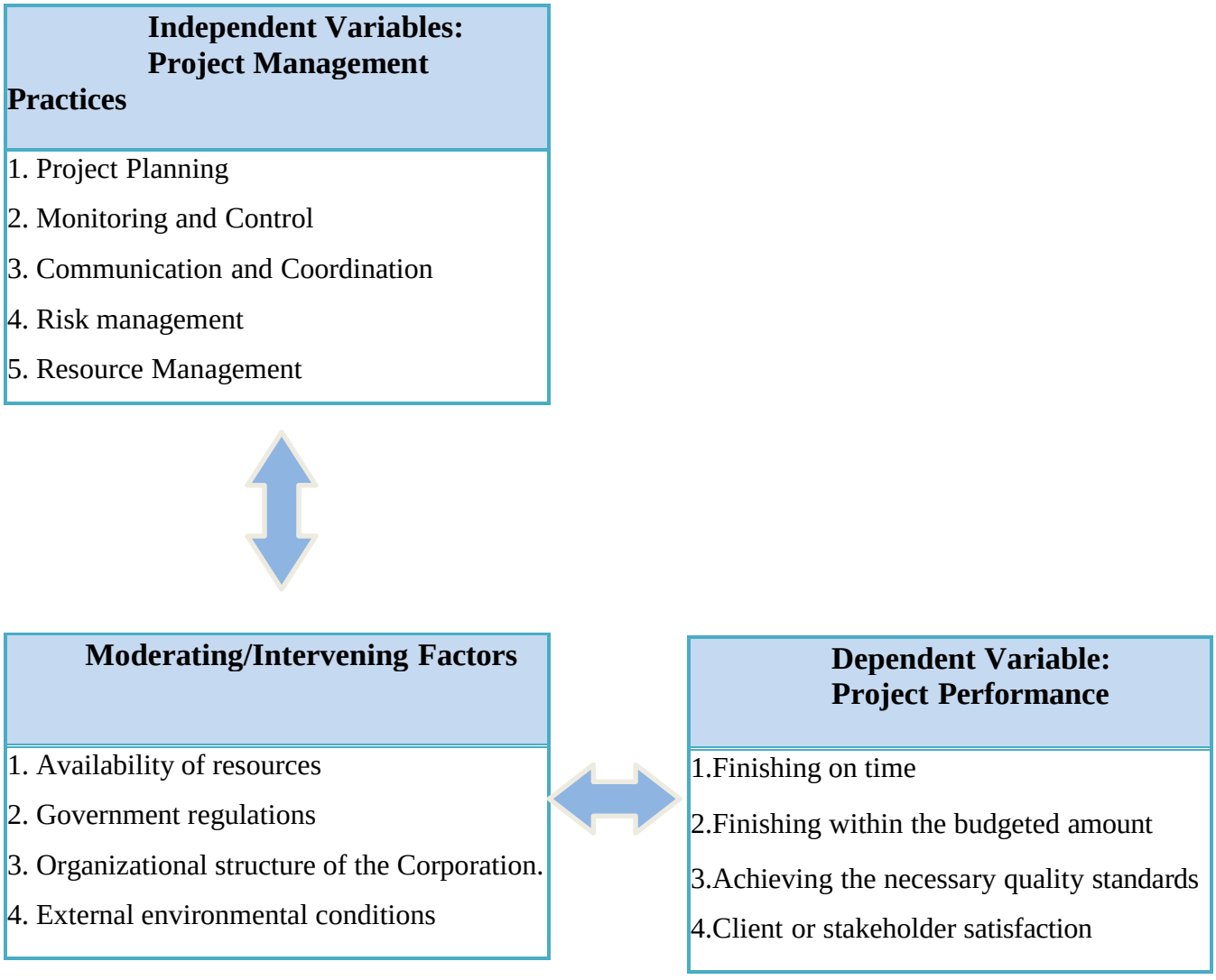


Figure 2.4 Conceptual Frame Work Source (Author 2026)

Relationship between the Conceptual Framework and the Specific Objectives

Specific Objective	Independent Variable	Expected Relationship with Project Performance (Dependent Variable)
To assess the effect of project planning practices on project performance.	Project Planning	Effective planning improves timely completion, cost control, quality achievement, and stakeholder satisfaction.
To examine the effect of risk management practices on project performance.	Risk Management	Effective risk management minimizes uncertainties, reducing delays, cost overruns, and quality problems while increasing stakeholder confidence.
To evaluate the effect of communication and coordination practices on project performance.	Communication and Coordination	Efficient communication enhances teamwork, decision-making, quality, and stakeholder satisfaction, leading to better project outcomes.
To determine the effect of monitoring and control practices on project performance.	Monitoring and Control	Continuous monitoring helps detect deviations early, ensuring projects remain on schedule, within budget, and meet quality standards.
To examine the effect of resource management practices on project performance.	Resource Management	Proper management of project Resource improves productivity, teamwork, quality, and overall project success.

Table 2.1 Relationship b/n Conceptual Framework with specific objectives

Relationship of the Moderating Variables

The conceptual framework also proposes that the relationship between project management practices and project performance is **moderated** by organizational and environmental factors. These factors do not directly determine project performance but influence the strength or effectiveness of project management practices.

Moderating Variable	Relationship with the Conceptual Framework
Availability of Resources	Adequate financial, human, material, and technological resources strengthen the positive effect of project management practices on project performance, while shortages reduce their effectiveness.
Government Regulations	Regulatory requirements, procurement laws, environmental policies, and legal procedures may facilitate or constrain project implementation, thereby influencing project outcomes.
Organizational Structure of the Corporation	A clear organizational structure, defined authority, efficient decision-making, and effective coordination enhance the implementation of project management practices and improve project performance.
External Environmental Conditions	Economic conditions, inflation, political stability, weather, supply chain disruptions, and technological changes can either strengthen or weaken the relationship between project management practices and project performance.

Table 2.2 Relationship of the moderating variables

CHAPTER THREE

3. RESEARCH METHODOLOGY

3.1 Introduction

According to (Kothari, 2004:8), research methodology may be defined as a technique that indicates how research is done systematically; and it is the general principle that guides one's research practice (Dawson, 2002:14). It includes research processes, tools and procedures or steps to be taken in accomplishing the research. Thus, this chapter will be a review of data collection and analysis method implemented in conducting this study. The type of research strategy to be used, the mode of data collection and the methodology in conducting the research is briefly discussed. It includes the research approach, research design, source of data and collection method, sample size and sampling technique and data analysis

3.2 Research Design

Research design is the overall plan or blueprint that guides how a research study will be conducted. It specifies the methods and procedures for collecting, measuring, and analyzing data to answer the research question or test a hypothesis. According to (Creswell, 2009) research design is plan and procedure for research that span the decisions from broad assumptions to detailed methods of data collection and analysis. This study utilizes a quantitative case study designed to comprehensively analyze FHC's project management practices in housing construction.

In addition, analysis has been made based on project documents like **project plans**, **cost** and **schedule reports**. Participants have been selected to include those who are directly involved in the project planning, execution, monitoring and controlling to ensure the relevance of the study. Thematic analysis has been used to identify issues related to planning, resource usage, communication, and risk managements, while descriptive analysis has generalized quantitative project performance indicators.

For the purpose of investigating the Corporation's project management practices, the study adopted a descriptive case study research design. The design is considered appropriate because it allows an in-depth investigation of existing practices, processes, and procedures within a real-life organizational context.

3.3 Study Area

The study has been conducted on Federal Housing Corporation current Addis Ababa projects, a firm engaged in residential and mixed housing construction projects. The company was selected due to its active involvement in housing development projects and its relevance to the construction industry.

3.1 Target Population

Federal Housing Corporation personnel that are actively involved in project planning, execution, and control have make up the target population. These included: Project managers, Site engineers, office engineers, architects, Supervisors, technical staff involved in the project implementation within FHC and those within the contractors and consultants.

3.2 Sample Size and Sampling Techniques

To choose respondents with pertinent project management expertise and experience, a purposive sample technique has been employed. This has ensured that the information collected were directly related to the study objectives. According to Ruta, (2017), response rate of 50% is satisfactory, 60% is good and 70% and above is excellent for a study. This implies that, the response gained which is 58 were sufficient enough or excellent to conduct the analysis. Hence, based on this, i.e., The total sample size distributed were 71 where 58 (81.6%) were collected and out of which 45 questionaries were distributed for FHC staffs and 38 (84.4 %) responses obtained and 26 questionaries were distributed for the Contractors and consultant's staffs and 20 (76.9%) responses were obtained from the respondents drawn from various departments within the companies.

According to the data on respondents working position, Senior Site Engineer constitutes 14 (24.1%), project managers, office engineers/architects and technical staffs equally constitutes 10 (17.2%), resident engineers constitute 6 (10.4%), supervisors constitute 4(6.9) and 4(6.9%) of the respondents didn't mention their working position. Demographic characteristics of the respondents who participated in the housing construction projects of the FHC are analyzed in the following tables. In addition, the data indicates that male participants are larger in number than female and respondent's educational qualification which has significant impact on the findings show that most of the respondents have bachelor degree and above.

3.3 Data Collection Methods

The data collection system used is questionaries prepared for key personnel including project managers, site engineers, office engineers and architects, contractors and consultants, which provide important information about the project. Both **primary** and **secondary** sources have been used to gather data for the study.

3.3.1 Primary Data

Primary data has been collected through:

Structured questionnaires administered to selected employees to gather quantitative data on project management practices. The questionnaires used were both open ended and closed ended to explore the general and specific opinions to the issues raised as important participants of the projects such as project managers, site engineers, technical staffs and office engineers and architects.

3.3.2 Secondary Data

Secondary data has been taken from:

- Company reports and project documents
- Policy manuals and project schedules
- Relevant textbooks, journals, and previous studies related to project management in construction

3.4 Data Collection Instruments

The primary data collection mechanisms were questionnaire which has both closed-ended and open-ended questionnaires.

3.5 Research Validity and Research Reliability

Validity analysis is an important element that indicates the degree to which an instrument measures what it is supposed to measure. Content validity is used in this research to ensure that a measuring instrument provides adequate coverage of the topic under study. The study instrument for this research was constructed in reference to instruments developed by other researchers for related studies and designed to fit for this study purpose. The questionnaire has covered all relevant topics related to the objectives of the research. This was cross-checked with the reference guidelines (PMBOK 6th edition) to ensure that all variables of under the study were covered as well as consultation with the project advisor has been made.

Reliability measures the internal consistency of the items in a scale and indicates that the extent to which the items in a questionnaire are related to each other. (Middleton, 2023). Reliability analysis is conducted using SPSS software to test the internal consistency of the data. Cronbach's alpha value for individual variables is taken and the **Overall Reliability** was found to be $\boldsymbol{\alpha = 0.971}$, as shown in table 3.1 below, which indicates that the internal consistency of the data is excellent.

Variable Construct	Number of item	Cronbach's Alpha	Internal Consistency
Project Planning	4	0.788	Acceptable
Time Management	4	0.864	Good
Cost Management	4	0.770	Acceptable
Quality Management	4	0.910	Excellent
Communication and coordination	4	0.717	Acceptable
Risk Management	4	0.797	Acceptable
Monitoring and controlling	5	0.880	Good
Project Performance	5	0.752	Acceptable
Overall Reliability	**34**	**0.971**	**Excellent**

Table 3. 1 Reliability Test/ Cronbach's Alpha

3.6 Data Analysis Techniques

Statistical methods were used to analyze the acquired data. In order to characterize the phenomena of the variables, a five-point Likert scale with the values **1 = strongly disagree**, **2 = disagree**, **3 = neutral**, 4 **= agree**, and **5 = highly agree**, was used to measure the variables of the study. The link between the variables was determined using correlation and regression. Correlation was used to determine whether there exists association or correlation between the two variables. Regression was used to determine the statistical measure of bivariate population for the cause-and-effect relationship between the two variables and to what degree and in which direction would the cause directs. (Kothari,2004). With the aid of the statistical program SPSS statistics package, the quantitative component of the data was examined. Different methods of descriptive statistics analysis, including frequencies, means, percentages, and standard deviation, were employed depending on the nature of the questions raise.

The study employed regression and correlation analysis to find the link between the variable's relationships. Correlation was used to measure how strong a relationship is between two variables. Pearson's Correlation Coefficient is the most common analysis for a correlation. The sign of the correlation coefficient indicates the direction of the association. The magnitude of the correlation coefficient indicates the strength of the association. Linear correlation coefficient lies between-1 and +1. A -1 means there is a strong negative correlation and +1 means that there is a strong positive correlation. A 0 means that there is no correlation (this is also called zero correlation)

Model Description

The factors chosen to be examined were Project Planning Practices, Monitoring and Control Practices, Communication and Coordination Practices, Risk management Practices, Resource Management Practices as **Independent variables** and Project Performances (Finishing on time, Finishing within the budgeted amount, Reaching the necessary quality standards, Client or stakeholder satisfaction) were **Dependent variable**

The study employed regression and correlation analysis to find the link between the variable's relationships. Correlation was used to measure how strong a relationship is between two variables.

Regression is the determination of a statistical relationship between two or more variables. In simple regression, we have only two variables, one variable (defined as independent) is the cause of the behavior of another one (defined as dependent variable). Regression can only interpret what exists physically i.e., there must be a physical way in which independent variable X can affect dependent variable Y (Kothari, 2004).

The regression model will be

$$\mathbf{PP = \beta 0 + \beta 1\ PPl + \beta 2\ PRM + \beta 3\ PCC + \beta 4\ PMC + \beta 5\ PRM + \varepsilon}$$

Where: PP = Project Performance

$\beta 0$ = The constant term,

$\beta 1 - \beta 5$ = Coefficients of the regression,

PPl = Project Planning,

PRM = Project Risk management,

PCC = Project Communication and Coordination,

PMC = Project Monitoring and Control,

PRM = Project Resource Management,

ε = Coefficient of errors

3.7 Ethical Considerations

The study has been performed based on the compliance to the ethical norms. Before the start of data collection, permission from the Federal Housing Corporation was guaranteed. The objective of the research has been made clear to the respondents, and anonymity and confidentiality have been guaranteed. Respondents had the right to stop participating whenever they demand to do so, and it has done with full voluntary and without consequence. Sensitive and very important company data and information's have been handled with the proper caution. Data has been secured, stored properly and used only for academic purposes and it has include protecting unauthorized access to company's institutional interests

CHAPTER FOUR

4. DATA ANALYSIS AND DISCUSSION

4.1 Introduction

This chapter analyzed and discussed the quantitative data collected through the questionnaire using IBM SPSS and Microsoft Excel software. In the discussion the labels, “strongly agree” and “agree” were used to indicate how many of the participants agree with the statement on the questionnaire. The label neutral was indicated for those who do not have a stand on the matter. Whereas “do not agree” and “strongly do not agree “indicate that the participant do not agree with the statements. In addition, open-ended questions were made to reinforce the overall survey to get to conclusions for the basic questions raised by the study.

The respondents participated in the survey are design and construction professionals selected from different federal housing corporation departments especially from housing development sector. In addition, survey questionnaires were also distributed to professionals working in the contractor and consultant side whom at the time of this research period were involved in the design and construction of different projects of FHC built in Addis Ababa. The respondents are composed of functional managers, team leaders, project managers, senior site engineers, architects and office engineers, resident engineers and technical staffs.

The survey made within FHC mainly focused on housing development sector because most of the project defining and success factor processes are performed in this sector. The three directorates and their core processes performed with in the **Housing Development Sector** are

- **Land and infrastructure preparation and follow up directorate** which is responsible for land preparation, infrastructure supply, geotechnical investigation and surveying tasks.
- **Project study, design preparations and follow up directorate** which is responsible for the preparation of building design and specification, follow up and controlling of project designs.
- **Projects follow up and contract administration directorate** which is responsible for the overall constructions follow up and contractual tasks.

But other departments like quality control and payment audit directorate and maintenance directorate in the other sectors of the corporation have also participated in the survey. Therefore, a total of 71 questionnaires were distributed to all respondents and 58 were collected out of which 45 questionnaires were distributed to most of the construction professional staffs in the corporation and 38 were collected, 26 were distributed to the contractor's and consultant's professionals and 20 were collected.

4.1 Discussion and analysis of data

4.1.1 Rate of response and respondents' profile

Table 4.1Characteristics of the Respondents

Description	Variables	Frequency	Percentage (%)
Response Rate	FHC	38 0ut of 45	84.4
	Contractors and consultants	20 out of 26	76.9
	Total	58 0ut of 71	81.7
Gender	Male	39	67.2
	Female	12	20.7
	Unidentified	7	12.1
	Total	57	100
Age	18-25	4	6.9
	26-35	19	32.8
	36-40	22	37.9
	Above 40	13	22.4
	Total	58	100
Work experience	1-5 years	12	20.7
	6-10 years	12	20.7
	11-15 years	13	22.4
	+15 years	14	24.1
	Unidentified	7	12.1
	Total	58	100
Level of education	Diploma or certificate level	8	13.8
	Degree level	22	37.9
	Post graduate level	19	32.8
	Unidentified	9	15.5
	Total	58	100
Working position	Project Manager	10	17.2
	Resident Engineer	6	10.4
	Senior site Engineer	14	24.1
	Office Engineer/Architect	10	17.2
	Supervisor	4	6.9
	Technical Team	10	17,2
	Unidentified	4	6.9
	Total	58	100

Data source: researcher's own questionnaire 2026

Rate of response

As described in the above table the questionnaire was distributed for a total of **71** personnel directly related to the construction projects of the organization. Out of which **58** (**81.7%**) responses were collected and analyzed using the IBM SPSS and Microsoft Excel software package. According to Ruta, (2017), response rate of 50% is satisfactory, 60% is good and 70% and above is excellent for a study. This implies that, the response gained which is 58 were sufficient enough to conduct the analysis. Hence, based on this, i.e., The total sample size distributed were 71 where 58 (81.7%) were collected and out of which 45 questionaries were distributed for FHC staffs and 38 (84.4 %) responses obtained and 26 questionaries were distributed for the Contractors and consultant's staffs and 20 (76.9%) responses were obtained from the respondents.

Respondents' profile

Respondent's gender

As the table above indicates **39** (**67.2 %**) of respondents were males, and **12 (20.7 %)** of the respondents were females and **7(12.1)** of the respondents didn't mention their gender. This indicates that majority of respondents that were addressed in this study are males.

Respondents' Age

As the table above indicates **4**(**6.9%**) of respondents were age between 18-25, **19** (**32.8%**) of respondents were 26-35, **22** (**37.9%**) of respondents were 36-40, and the rest **13** (**22.4%**) of respondents were above 40 years of age. This indicates that large numbers of respondents were between working age of 36-40 and 18-25.

Respondents Educational Background

As the table above indicates that majority of the respondents have an educational level of a bachelor's degree which is **22** (**37.9%**) and **19** (**32.8%**) personnel have a post graduate degree which shows that majority of the respondents have qualified educational preparation for the jobs.

Respondents Work Experience

As the table above indicates that the number of years of experience of the personnel as summarized in the above table shows that staffs with experience between 1-5 years were **20.7%,** 6-10 years were **20.7%** and 11-15 years were **22.4%**, and +15 years were **24.1%** with the majority of the respondents having experiences of more than 5 years which is a total of (**67.2%**), which means it was an opportunity for the researcher to gather data from highly experienced respondent.

Respondents Working Position

As the table above shows that all types of professionals are participated in the study. Among these Participants **10** (**17.2%**) are project managers, **6** (**10.4%**) are resident engineers, **14** (**24.1%**) are senior site engineers, 10 (**17.2%**) are office engineers/architects, **4** (**6.9%**) are supervisors and **10** (**17.2%**) are other technical teams which means that it was helpful to have the general view of the overall project activities. Besides that, large number of active participants in this study were highly professional personnel's, which was helpful to have knowledgeable information.

4.1.2 Descriptive Statistics on effectiveness of Project management practices (PMP) in federal housing corporation current housing construction projects.

Descriptive analysis was used to obtain existing facts regarding the level of agreement on the project management practices (PMP) of federal housing corporation current housing construction projects. This section presents the respondents' perception on the independent variable mainly on Project Planning, schedule Mgt, Cost Mgt, Quality Mgt, Communication Mgt, Risk Mgt and Monitoring & Controlling practices. The respondents were asked to indicate the extent to which they agreed and disagreed to statements related to the variables under study on a five-point Likert scale

Range for interpreting five-point Likert scale data based on (Upgade and Shende, 2012)

- ✓ **1.49 or less Strongly disagree**
- ✓ **1.50-2.49 Disagree**
- ✓ **2.50-3.49 Neutral**
- ✓ **3.50-4.49 Agree**
- ✓ **4.5 or greater Strongly agree**

It is taken to identify the differences among the variables and the square root of standard deviation shows the variance. The standard deviation is therefore a measure of how well the mean represents the data. Where, small standard deviation means (relative to the value of the mean itself) indicates that the data points are close to the mean. In another case, larger standard deviation (relative to the mean) indicates that the data points are distant from the mean (i.e., the mean is not an accurate representative of the data) (Andy, 2010).

Part 1 Close Ended Questions

4.2.3. Descriptive Statistics on Project Planning Management

Four questionnaires were given to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of agreement on project planning management practices in federal housing corporation current housing construction projects. The table below gives the respondent's level of agreement on project planning management practices.

Table 4.2 Project Planning Management

Factors	Scale					N	Mean	Standard deviation
	1	2	3	4	5			
The company clearly defined project objectives before implementation.	5	40	8	5	0	58	2.22	0.727
Detailed project plans are prepared before implementation.	6	38	10	4	0	58	2.21	0.720
Work schedules are properly developed.	9	36	7	6	0	58	2.17	0.819
Resources (labor, materials, equipment's) are well planned.	0	22	24	12	0	58	2.83	0.752
Total	20	136	49	27	0	232	**2.357**	**0.754**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e. The company clearly defined project objectives before implementation, Detailed project plans are prepared before implementation and Work schedules are properly developed are among the questions given to the respondents to identify their level of agreement on project schedule management practices which have a **Mean** of **2.22**, **2.21** & **2.17** respectively on a five-point scale, which falls under disagree. The rest one question i.e**.** Resources (labor, materials, equipment's) are well planned which we can see from the analysis has a **Mean** of **2.83** on a five-point scale, which falls under neutral. Looking at the average of all **Mean** that is **2.357** falls under disagree. Therefor it is possible to conclude that the Project schedule management practices of the corporation is not in a good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.720 - 0.819**, and the average of all which is **SD=0.754** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

4.2.4 Descriptive Statistics on Project Schedule Management

Four questionnaires were given to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of agreement on project schedule management practices. The table below gives the respondent's level of agreement on project schedule management practices.

Table 4.3 Project schedule Management

Factors	Level of Intensity					N	Mean	S.D.
	1	2	3	4	5			
Construction activities are completed according to the planned schedule.	18	33	7	0	0	58	1.81	0.634
Project managers monitor project progress regularly.	0	3	7	30	18	58	4.09	0.801
Delays are properly identified and managed.	13	36	6	3	0	58	1.98	0.737
Effective coordination is being practiced among project team members.	12	35	7	4	0	58	2.05	0.782
Total	43	107	28	37	18	232	**2.48**	**0.738**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e. Construction activities are completed according to the planned schedule, Delays are properly identified and managed and Effective coordination is being practiced among project team members are among the questions given to the respondents to identify their level of agreement on project schedule management practices which have a **Mean** of **1.81**, **1.98** & **2.05** respectively on a five-point scale, which falls under disagree. The rest one question i.e**.** Project managers monitor project progress regularly which we can see from the analysis has a **Mean** of **4.09** on a five-point scale, which falls under agree. Looking at the average of all **Mean** that is **2.48** falls under disagree. Therefore, it is possible to conclude that the Project schedule management practices of the corporation is not in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.634-0.801**, and the average of all which is **SD=0.738** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

Table 4.4 Contract Time versus Completion Time Analysis

No	Project Name	Project Volume	Contract Time in Days	Time Extended in Days	Time Extended in %
1	Tzena Mixed use building	2 blocks/2B+G+10	602	617	103 %
2	Mekanissa Mixed use building	2 blocks/B+G+10	719	545	76 %
3	Bole Mixed-use building	1 block/2B+G+9	719	545	76 %
4	Aware Mixed-use building	1 block/2B+G+10	539	724	134 %
5	Kebena Mixed use building	1 block/2B+G+10	540	766	142 %
6	Kokebe T. Mixed-use building	2 blocks/2B+G+10	540	1266	234 %
7	Meserak A.Mixed-use building	2 blocks/2B+G+9	721	1074	149 %
8	Gerji Modern House	16 blocks with Amenities	524	438	84 %
9	British Mixed-use building	2 blocks/2B+G+8	600	911	152 %
10	Somaletera Mixed-use building	2 blocks/3B+G+23	865	1018	118 %

4.2.5 Descriptive Statistics on Project Cost Management

Four questionnaires were given to respondents to rate their level of agreement with each statement. The questions are designed to examine the level of agreement on project cost management practices. The table displays the respondent's level of agreement on project cost management practices.

Table 4.5 Project Cost Management Practices

Practices	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
Does the company prepare accurate project cost estimates?	0	17	33	8	0	58	2.84	0.644
Project costs are regularly monitored and controlled	33	18	6	1	0	58	1.57	0.752
Budget overruns are minimized through proper cost management.	34	20	3	1	0	58	1.50	0.682
Financial resources are allocated efficiently.	10	31	12	5	0	58	2.21	0.833
Total	77	86	54	15	0		**2.03**	**0.727**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e., Project costs are regularly monitored and controlled, Budget overruns are minimized through proper cost management and financial resources are allocated efficiently are among the questions given to the respondents to identify their level of agreement on project cost management practices which have a **Mean** of **1.57**, **1.50** & **2.21** respectively on a five-point scale, falls under disagree. The rest one question i.e**.** Does the company prepare accurate project cost estimates which we can see from the analysis has a **Mean** of **2.84** on a five-point scale, falls under neutral. Looking at the average of all **Mean** that is **2.03** falls under disagree. Therefor it is possible to conclude that the Project cost management practices of the corporation is not in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.644 - 0.833**, and the average of all which is **SD=0.727** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

Table 4.6 Contract Amount Versus Variation Cost Analysis

No	Project Name	Project Volume	Contract Amount Cost in birr	Final Cost in birr	Variation Amount in Birr	Variation in %
1	Tezena Mixed use building	2 blocks/2B+G+10	353,723,090.66	624,298,516.74	270,575,426.08	76.5 %
2	Mekanissa Mixed use building	2 blocks/B+G+10	351,082,658.58	494,808,751.53	143,726,092.95	40.9 %
3	Bole Mixed-use building	1 block/2B+G+9	217,733,344.00	288,091,498.71	70,358,154.71	32.3 %
4	Aware Mixed-use building	1 block/2B+G+10	169,914,387.78	242,968,232.65	73,053,844.87	43 %
5	Kebena Mixed use building	1 block/2B+G+10	251,214,192.00	364,192,683.73	112,978,491.73	45 %
6	K.Tsibha Mixed-use building	2 blocks/2B+G+10	217,733,344.00	413,519,879.21	195,786,535.21	90 %
7	M.Atekaly Mixed-use building	2 blocks/2B+G+9	359,464,744.33	562,640,521.356	203,175,777.03	56.5 %
8	Gerji Modern House	16 blocks with Amenities	3,066,405,712.50	4,699,483,893.83	1,633,078,181.33	53.3%
9	British Mixed-use building	2 blocks/2B+G+8	483,261,569.55	869,870,825.19	386,609,255.64	80 %
10	Somaletera Mixed-use building	2 blocks/3B+G+23	2,142,613,137.26	3,856,703,647.07	1,714,090,509.81	80 %

4.2.6 Descriptive Statistics on Project Quality Management

Four questionnaires were given to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of Project Quality Management Practices. The table below displays the respondent's level of agreement on Project Quality Management Practices.

Table 4.7 Project Quality Management

Practices	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
Quality standards are clearly defined in the projects.	0	2	13	31	12	58	3.91	0.756
Construction works are regularly inspected.	0	1	11	38	8	58	3.91	0.629
The company follow proper quality control procedures	0	3	13	27	15	58	3.93	0.835
Construction materials used meet the required quality standards.	0	1	16	31	10	58	3.86	0.712
Total	0	7	53	127	45	232	**3.902**	**0.733**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e., Quality standards are clearly defined in the projects, Construction works are regularly inspected, the company follow proper quality control procedures and Construction materials used meet the required quality standards are the questionaries' given to the respondents to identify their level of agreement on project risk management practices which have a **Mean** of **3.91**, **3.91**, **3.93** & **3.86** respectively on a five-point scale, falls under agree. Looking at the average of all **Mean** that is **3.902** which means the respondents agree that Project quality Management Practices of the corporation is in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.629 - 0.835**, and the average of all which is **SD=0.733** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

4.2.7 Descriptive Statistics on Project Communication Management

Four questionnaires were given to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of agreement on Project Communication Management Practices. The table displays the respondent's level of agreement on Project Communication Management Practices of the corporation.

Table 4.8 Project Communication Management Practices

Practices	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
Communication between project managers and workers is effective.	0	14	29	15	0	58	3.02	0.713
Information is shared clearly among project team members.	12	36	6	4	0	58	2.03	0.772
Meetings are regularly conducted to discuss project progress.	0	3	9	27	19	58	4.07	0.835
Problems are quickly communicated to management	0	12	34	12	0	58	3.00	0.649
Total	12	65	78	58	19	232	**3.03**	**0.742**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e., Communication between project managers and workers is effective and Problems are quickly communicated to management are among the questionnaires given to the respondents to identify their level of agreement on project risk management practices which have a **Mean** of **3.02** & **3.00** respectively on a five-point scale, falls under neutral. The rest two questionaries' i.e**.** Meetings are regularly conducted to discuss project progress and Information is shared clearly among project team members, which we can see from the analysis have a **Mean** of **4.07** & **2.03** respectively on a five-point scale, falls under agree and disagree. Looking at the average of all **Mean** that is **3.03** falls under neutral. The responses are neutral on some of the activities, agree and disagree on others.

Therefor it is not possible to conclude that Project Communication Management Practices of the corporation is in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.649 - 0.835**, and the average of all which is **SD=0.742** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

4.2.8 Descriptive Statistics on Project Risk Management

Four questionnaires were presented to respondents to rate their level of agreement with each statement. The questions are designed to examine the level of project risk management practices. The table displays the respondent's level of agreement on project risk management practices of the corporation.

Table 4.9 Project Risk Management Practices

Practices	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
Potential project risks are identified early.	6	33	11	8	0	58	2.36	0.852
The company have strategies to manage construction risks	4	34	13	7	0	58	2.40	0.793
Safety measures are being implemented on construction sites.	2	2	17	30	7	58	3.66	0.870
Project managers respond quickly to unexpected problems.	0	8	35	15	0	58	3.12	0.623
Total	12	77	76	60	7	232	**2.885**	**0.784**

Data source: researcher's own questionnaire 2026

Based on the above result, the questionaries' i.e., Potential project risks are identified early and The company have strategies to manage construction risks are among the questionaries' given to the respondents to identify their level of agreement on project risk management practices which have a **Mean** of **2.36** & **2.40** respectively on a five-point scale, falls under disagree. The rest two questionaries' i.e. Safety measures are being implemented on construction sites and Project managers respond quickly to unexpected problems which we can see from the analysis have a **Mean** of **3.66**, & **3.12** respectively on a five-point scale, falls under agree and neutral. Looking at the average of all **Mean** that is **2.885** which falls under neutral that means the respondents disagree on some of the activities, agree and neutral on others. Therefor it is not possible to conclude that the risk management practice of the corporation is in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.623- 0.870**, and the average of all which is **SD=0.784** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

4.2.8 Descriptive Statistics on Project Monitoring & Controlling Management

Five questionnaires were presented to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of agreement on Project Monitoring and Controlling Management Practices. The table displays the respondent's level of agreement on Project Monitoring and Controlling Management Practices of the corporation.

Table 4.10 Project Monitoring and Controlling Management

Strategies	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
The monitoring tools and systems are user-friendly.	0	3	12	29	14	58	3.93	0.814
There is a flexibility to report whenever change occurs instead of scheduled reports.	0	3	11	28	16	58	3.98	0.827
Reports are tailored according to the management level or the audience they are being reviewed by	0	2	11	27	18	58	4.05	0.804
If the project is not progressing as planned, a timely corrective action is taken as per the findings of the monitoring	14	30	10	4	0	58	2.07	0.835
Scarce materials are/were planned ahead of time.	13	29	13	3	0	58	2.10	0.810
Total	27	67	57	91	48	290	**3.226**	**0.818**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e., The monitoring tools and systems are user-friendly, There is a flexibility to report whenever change occurs instead of scheduled reports and Reports are tailored according to the management level or the audience they are being reviewed by are among the questionaries' given to the respondents to identify their level of agreement on Project Monitoring and Controlling Management Practices which have a **Mean** of **3.93, 3.98** & **4.05** respectively on a five-point scale, falls under agree. The rest two questionaries' i.e. If the project is not progressing as planned, a timely corrective action is taken as per the findings of the monitoring and Scarce materials are/were planned ahead of time which we can see from the analysis have a Mean of **2.07** & **2.10** respectively on a five-point scale, which falls under disagree. Looking at the average of all **Mean** that is **3.226** which falls under neutral which means the respondents agree on some of the activities and not agree on others. Therefor it is not possible to conclude that the Project

Monitoring and Controlling Management Practices of the corporation is in good condition. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.804 - 0.835**, and the average of all which is **SD=0.818** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

4.2.9 Descriptive Statistics on Project Performance (Effectiveness)

Series of questionnaires were presented to respondents to rate their level of agreement with each statement. The questionnaires are designed to examine the level of Project Performance (Effectiveness of project Management Practices**)**. The table displays the respondent's level of agreement against the level of Project **Performance**.

Table 4.11 Project Performance (Effectiveness)

Strategies	Level of intensity					N	Mean	S.D.
	1	2	3	4	5			
Most projects are completed on time.	38	16	3	1	0	58	1.43	0.678
Most projects are completed within budget.	43	11	3	1	0	58	1.34	0.664
Projects meet the required quality standards.	0	5	17	33	3	58	3.59	0.726
Clients are satisfied with project outcomes.	0	1	11	30	16	58	4.05	0.736
Overall project management practices of the company are effective	41	15	1	1	0	58	1.34	0.608
Total	122	48	35	66	19	290	**2.35**	**0.682**

Data source: own Survey, 2026

Based on the above result, the questionaries' i.e., Projects meet the required quality standards and Clients are satisfied with project outcomes are among the questions given to the respondents to identify their level of agreement on project performance (Effectiveness) which have a **Mean** of **3.59** & **4.05** respectively on a five-point scale, falls under agree. The rest three question i.e. Most projects are completed on time, most projects are completed within budget and overall project management practices of the company are effective which we can see from the analysis have a **Mean** of **1.43**, **1.34** & **1.34** respectively on a five-point scale, falls under disagree. Looking at the average of all **Mean** that is **2.35** which falls under disagree. Therefor the respondents disagree that the corporation project

performance is weak or not effective. When we see the overall deviation of responses for each factor, they have scored a standard deviation in the range between **0.608- 0.736**, and the average of all which is **SD=0.682** is below 1. This indicates that the respondents' responses are closely grouped around the mean. This suggests that there is low variability in the responses and that the respondents have relatively consistent opinion.

If there is additional factor not included in this part of the questionnaire respondents were given the chance to add other factors in the open-ended part.

Table 4.12 Correlations b/n the variables

Correlations

		Most projects are completed on time	Most projects are completed within budget	Projects meet the required quality standards	Clients are satisfied with project outcomes	Overall project management practices of the company are effective
Most projects are completed on time	Pearson Correlation	1	.366**	.440**	.447**	.441**
	Sig. (2-tailed)		.005	.001	.000	.001
	N	58	58	58	58	58
Most projects are completed within budget	Pearson Correlation	.366**	1	.192	.286*	.352**
	Sig. (2-tailed)	.005		.149	.029	.007
	N	58	58	58	58	58
Projects meet the required quality standards	Pearson Correlation	.440**	.192	1	.665**	.249
	Sig. (2-tailed)	.001	.149		.000	.059
	N	58	58	58	58	58
Clients are satisfied with project outcomes	Pearson Correlation	.447**	.286*	.665**	1	.312*
	Sig. (2-tailed)	.000	.029	.000		.017
	N	58	58	58	58	58
Overall project management practices of the company are effective	Pearson Correlation	.441**	.352**	.249	.312*	1
	Sig. (2-tailed)	.001	.007	.059	.017	
	N	58	58	58	58	58

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Therefor according to the results of the correlation, there is positive and enough correlation between the two variables (the independent and dependent variables).

CHAPTER FIVE

5. SUMMARY, CONCLUSION AND RECOMMENDATION

5.1 SUMMARY

This study was made with the general objective of assessing the current project management practices (PMP) of federal housing corporation construction projects. As part of the discussion on the literature review and the discussion of the major findings of the study, a project is said to have effectively or successfully managed if it is completed within time, scope, cost, meeting the required quality standards and client satisfaction. Therefore, this study tried to investigate the companies project management practice against the above standard success factors.

5.2 CONCLUSION

The following conclusion is made depending on the specific objectives of this research.

1. **Evaluating the corporation project performance according to the time, budget, and quality expectations.**

To evaluate the corporation's project management performances, this study used two approaches of investigation mechanisms. The first one is based on the results of the analysis which was made on the survey questionaries' and the second one is based on the secondary data on projects which was obtained from corporation's contract and company profile documents. Hence, based on the study made on 10 housing construction projects, it is clearly shown that the project management practices of the corporation were weak and not effective or possible to say not well managed.

The first approach or investigation mechanisms used to get to a conclusion were the results of the analysis made on the survey questionaries' which showed how important project management processes were being practiced in the corporation. Majority of the results of the analysis made on the project process revealed a response of disagree, besides the last analysis made on the project performance explained in table 4.7 reflects a disagree too. This means major activites which decide the success of a project like schedule and cost are analyzed to have encountered a serious scedule delay and a serious cost overrun. Besides, the analysis result on the overall project performance of the corporation is also a disagree which means the project management performance of the corporation was not effective. But the results of the analysis on the projects quality and client's

satisfaction on the project outcome is an agree. Referring to the average of all the analysis, the effectiveness of the project management practices of the corporation has a total mean of **2.35** and **SD= 0.682** which means it is within the range of disagree. Therefore, it is clear from the analysis result that the corporation project management practices of current housing construction projects were weak or not successful. The second mechanism was to use the contractual document of the 10 selected projects as a base line to compare the planned project schedule and cost against the final cost incurred and time elapsed at the end of the project completion. Here it is clearly shown that almost all projects encounter a major schedule delay and cost overrun.

2. **What are the major strengths and weaknesses of FHC's project management practices?**

Major strengths of the corporation project management practices are

1. Teams composed of the top management, Project managers, respective site and resident engineers from both the client, the contractor and the consultant are working together cooperatively to monitor project progress regularly which tried to change the common tradition of monitoring and controlling based on contradictory relationships than cooperation.

2. The corporation's one wing which is the building material supplies sector supplied the contractors with the required construction materials like cement and reinforcement bars consistently which during market shortages and price inflation periods helped projects to keep their pace or protects not to slow down the progress.

3. The corporation also provides loans as an advance payment for the contractors when they are facing financial problems and foreign currency to facilitate importing important building items and assemblies like lifts from abroad.

Major weaknesses of the corporation project management practices are

1. Major project management processes like project initiating are not made based on technical views like feasibility studies rather by top management personal opinions.

2. According to the organizational structure of the corporation, the **housing development sector** was given the mandates and responsibilities of managing the different project activities but committees which were formed by the top management to take over some important technical decisions which undermine the technical efforts of professional personnel of the sector.

3. The corporation started executing its current projects against its original structure which is given by the establishing regulation. i.e. According to the establishing regulation of the corporation, the

procurement process should have been carried out with a team of professionals under the housing development sector but the activities and mandates of this very important process of a project is taken to be under the CEO sector where there is no professional check and balance with other technical processes of the housing sector like of design, bill of quantities and specification and contract administration. Besides, the mandates and responsibilities of the planning and execution of some selected projects (billions birr projects like Gerji and somale tera projects) were given to single personnel (the deputy CEO) and his informal teams where the formal respective structures of the corporation which are the design preparation and contract administration directorates are set aside not to involve on the projects. These are informal project teams which are not established under a formal project office with their own project manager but they are formed as a informal establishment made to be led by the functional manager (the deputy CEO of the sector). It is obvious that this kind of practice causes check and balance and accountability problems which probably would have caused the problems of contractual issues like cost overrun and delay. (see table 4.9). In addition to these, yet there was not a single project went through formal close out and auditing procedures which would help as a lesion for next projects and accountability to take place.

4. Most of the site inspectors of the corporation who are assigned as a counter to the resident engineer and site engineers of the consultant and the contractor respectively are not qualified or well experienced for the job.

3. **What improvement can be applied to enhance project performance?**

Having discussed about the two conclusions made based on the two specific objectives of this research which are

1. Evaluating the corporation project performance according to the time, budget, and quality expectations and

2. What are the major strengths and weaknesses of FHC's project management practice**.**

The conclusion to the last specific objective of this research which is

3. What improvement can be applied to enhance project performance?

Will be Making or giving solutions to the root causes of the weaknesses or inefficiencies of the project performance or suggesting important ideas to improve/enhance the current project management practices. Therefor it is very important to follow and strengthen standard project management procedures which should be led according to the formal organizational structure of the corporation but if the company wants to run projects through a project office, then it should be managed by its own assigned project manager under the leadership or follow up of the functional

manager. Besides, coordination and team work activities among different departments under the housing development sector should be improved which would result in the success of the different projects of the corporation. Qualified counter site supervisors should be assigned on each project that should also have an integrity and higher responsibility for the success of the project because these focal persons should work as a counter and as the same time as a partner with site engineers, resident engineer and project manager of the consultant and the contractor.

5.3 RECOMMENDATION

Based on the findings of the study, the corporation has showed weakness in implementing important project management practices like **Project Planning; schedule Mgt, Cost Mgt, Communication Mgt, Risk Mgt** and **Monitoring & Controlling** processes. Therefor the following recommendations are suggested to improve the current project management practices of the corporation.

Project planning should be carefully prepared by experienced professionals and project managers should discuss the details among all parties and stakeholders before implementation so that unexpected change orders will be minimized or avoided which in turn prevent cost overruns and time delays.

Monitoring and controlling should be carried out based on clear project documents and guide lines according to the contract document to consistently track project progress, keeping works within the scope, identify potential delays or overspending and proactive measures, maintaining quality standards and make informed decisions about how to allocate resources.

Schedule Management proper work schedules should be made during planning period and all construction activities should be tracked against the schedule and if a potential delay is seemed to happen crashed schedules should be made and performed accordingly.

Cost Management cost controlling mechanisms like tracking cash flows against physical progress should be seriously monitored so that cost incurring causes like change orders, price escalation due to inflation and shortage of hard currency be minimized or avoided by proper financial planning and procurement methods (procuring scarce materials earlier).

Communication Management fast and smooth communication should be made within the project teams and across all the stakeholders. Project managers should communicate and engage all stakeholders in a cooperative way so as to satisfy the interests of the different stakeholders. Conflicts should be managed amicably so that it wouldn’t hinder or damage project outcomes.

Risk Management Since the corporation is working within the unstable macroeconomic condition of the country, its projects have suffered higher price escalation by the inflation and hard currency problems for those imported items therefor procurement unit needs to build strong relationships with key suppliers to benefit from good quality and on-time supply of materials. Generally, potential risk areas should be identified and mitigation measures should be made in place during all project life cycles.

Besides the corporation should have strategies to implement new construction technologies and new methodologies to improve project performance. Therefor the corporation should strengthen its current efforts in introducing and applying the modern building parts assembly manufacturing factory and the 3D building technology and consistent training must be given for the operators whom are working on those new technologies.

Equally important, it is every construction companies' aspiration to have best performance, maximum profit and qualified outcomes; therefore, in order to achieve these results, it is important for the company to have

- Flexible organizational structure which can fit with contemporary business environment in the industry.
- Good working environments and systems in place.
- Qualified skilled and professional staffs on the job which based on performances should be given rewards and acknowledgments.
- All these combined with strong vision and leadership skill of the top management, commitment of the management and dedication of all staff members which would realize the goals and objectives of the company.

By implementing these recommendations, I believe the corporation could better perform the project management practices, increase efficiency, and improve outcomes for all stakeholders involved in the project.

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Questionnaire



Dear respondents!

The purpose of this Questionnaire is to make a research paper in partial fulfillment of requirements of Master of Arts in Project Management at Addis Ababa University. This questionnaire intends to study the effectiveness of project management practices in current federal housing corporation construction projects, built in Addis Ababa.

You are kindly requested to complete this questionnaire. In each question you are requested to give genuine response and fill in the blank space or to put mark √ on your possible answer to the corresponding question. Your response will be treated confidentially and only be used for academic purpose.

Finally, I would like to thank for your cooperation and if you have any issues about the questioner, you can contact me.

1. Zerihun Balcha 0911-641993
2. Email- Zerihunbalcha7@gmail.com

Part one: Closed Ended questions

Section A: Respondent Information (Demographic Data)

1. Age

18 – 25 ☐

26 – 35 ☐

36 – 40 ☐

Above 40 ☐

2. Sex

Male ☐

Female ☐

3. Experience

1 - 5 years ☐

6 – 10 years ☐

11– 15 years ☐

+15 years ☐

4. Educational Qualification

Certificate level ☐

Diploma level ☐

Degree level ☐

Post graduate level ☐

5. Position

Senior Site Engineer ☐

Supervisor ☐

Office Engineer/Architect ☐

Project manager ☐

Resident Engineer ☐

Technical team ☐

6. Have you been trained in project management?

Yes ☐ No ☐

7. If your answer is yes, what was the level of training you received on Project management?

Masters ☐

Bachelors ☐

Project Management certificated ☐

Short term training ☐

Section B. General closed ended questions

This section of the questionnaire examines general project management practices of the company.

1. Has feasibility study been conducted?

Yes ☐ No ☐

2. If your answer is yes, how has it been conducted?

In house professional ☐
Out sourced for external legal firm ☐
Informally conducted ☐

3. Key stakeholders such as Addis Ababa city administration, AWSSA, ELPA, Consultants, Contractors and financial institutions are involved in initiating project ideas and their feedback is integrated in to project proposals.

Yes ☐ No ☐

4. The company has good relationship with financial institutions.

Yes ☐ No ☐

5. Who monitors this Project?

Project manager ☐
Development team ☐
A project management office ☐
External Consultants ☐

6.How often is measurement taken and data collected on the performance indicators?

Daily ☐
Weekly ☐
Every other week ☐
Monthly ☐
Inconsistent ☐

7. Which of the following monitoring technologies are used in this project?

Digitalizing Construction Monitoring (DCM) Such as BIM ☐

Hi-Resolution Automated Cameras ☐

Drones ☐

8. Which of the following tools are in use in your project?

Primavera Microsoft Pr. ☐

Project.net ☐

Excel Sheet ☐

Others ☐

Part two: Scale for Sections A–H

Please indicate or put mark √ the extent to which you agree with each of the following choices Rate your response on scale of five units where by:

1.Strongly Disagree 2. Disagree 3. Neutral 4. Agree 5. Strongly Agree

Section A. Project Planning - This section of the questionnaire examines the project planning management practices of the company

Scale	1	2	3	4	5
The company clearly defined project objectives before implementation.					
Detailed project plans are prepared before implementation.					
Work schedules are properly developed.					
Resources (labor, materials, equipment's) are well planned.					

Section B. Time Management - This section of the questionnaire examines the project time Management practices of the company.

Scale	1	2	3	4	5
Construction activities are completed according to the planned schedule.					
Project managers monitor project progress regularly.					
Delays are properly identified and managed.					
Effective coordination is being practiced among project team members.					

Section C. Cost Management - This section of the questionnaire examines the project cost management practices of the company

Scale	1	2	3	4	5
Does the company prepare accurate project cost estimates?					
Project costs are regularly monitored and controlled					
Budget overruns are minimized through proper cost management.					
Financial resources are allocated efficiently.					

Section D. Quality Management - This section of the questionnaire examines the project Quality management practices of the company

Scale	1	2	3	4	5
Quality standards are clearly defined in the projects.					
Construction works are regularly inspected.					
The company follow proper quality control procedures					
Construction materials used meet the required quality standards.					

Section E. Communication and coordination - This section of the questionnaire examines the project communication management practices of the company.

Scale	1	2	3	4	5
Communication between project managers and workers is effective.					
Information is shared clearly among project team members.					
Meetings are regularly conducted to discuss project progress.					
Problems are quickly communicated to management.					

Section F. Risk Management - This section of the questionnaire examines the project risk management practices of the company

Scale	1	2	3	4	5
Potential project risks are identified early.					
The company have strategies to manage construction risks.					
Safety measures are being implemented on construction sites.					
Project managers respond quickly to unexpected problems.					

Section G. Monitoring and controlling - This section is intended to find out how the Monitoring and controlling practices of the project with in the company.

Scale	1	2	3	4	5
The monitoring tools and systems are user-friendly.					
There is a flexibility to report whenever change occurs instead of scheduled reports.					
Reports are tailored according to the management level or the audience they are being reviewed by					
If the project is not progressing as planned, a timely corrective action is taken as per the findings of the monitoring					
Scarce materials are/were planned ahead of time.					

Section H. Project Performance (Effectiveness) - These questions are specially generated to assess the overall project performance with in the company.

Scale	1	2	3	4	5
Most projects are completed on time.					
Most projects are completed within budget.					
Projects meet the required quality standards.					
Clients are satisfied with project outcomes.					
Overall project management practices of the company are effective.					

Part Three: Open-Ended Questions

These questions are specially generated to assess the controlling mechanisms practiced with in the company.

50. What are the major challenges affecting project management practices in the company?

51. What improvements would you suggest to enhance project management practices?