Assessing the Competence Level of Project Managers in Ghana A Case Study of the 2018/2019 MSc Project Management Class

by

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DECLARATION

Being conscious about the University	's policy on plagiarism, I he	ereby declare that
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ABSTRACT

Project management has become one of the most studied professional courses in Ghana and the world at large. This is because most of the things done in the working environment are projects; meaning, projects have start and finish dates. Therefore, project managers in their respective industries are required by their organizations to help execute projects successfully right from the initiation phase through to closure. Executing this activity requires project managers to possess knowledge and skills needed to successfully complete projects to stakeholder satisfaction; hence, the need for acquisition of competencies by the project manager. The aim of this work is to explore project management competencies of project managers. This work employed a survey research strategy to assess the competence of project managers with a selected sample size of 150 from the MSc project management class of the Kwame Nkrumah University of Science and Technology Institute of Distance Learning. The findings indicated that, the students have gained countless number of project management competencies especially the technical skills. The study advocates a conscientious development and harnessing of project manager competence to enhance project success in Ghana. Again, it was realized that, most of the research works that have been conducted on the competence of the Ghanaian Project manager were based in the construction industry. More research needs to be conducted in other aspects of the Ghanaian working industry not only in the construction industry. Data generated from literature throws light on the fact that, project managers need to build strong competencies in knowledge, technical and people skills in other to excel as project managers in Ghana. In conclusion, it is suggested that, the study will educate project managers and project stakeholders of the

importance of project manager's competence that he or she brings on board in helping to execute projects to a successful completion.

Keywords: Competence level, Project Management, Project Manager.

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LIST OF ABBREVIATIONS

ICTInformation and Communication Technology
IPMAInternational Project Management Association
PMIProject Management Institute
PMProject Management
PPMPProfessional Project Management Practices
SPSSStatistical Package for the Social Sciences
SSNITSocial Security and National Insurance Trust
WBSWork Breakdown Structure
IQIntellectual Competencies
GCIGhanaian Construction Industry

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DEDICATION

I dedicate this research work to the Almighty God, my parents and to all who have contributed to the successful completion of the programme.

CHAPTER ONE

INTRODUCTION

1.1 Background of The Study

Project management has developed as a subject of practice that is getting used more and more by companies to achieve their commercial enterprise desires (Crawford, 2005). As organizations identify more of their events as projects, there is a growing demand for project executives and a growing interest in project management skills (Crawford, 2005). Project managers' abilities are critical because they have a significant effect on project performance and company performance (Crawford, 2005). Choosing the right project manager is the key to project success. Project management competence has resulted to the development of standards that are used for evaluation, development and certification (Crawford, 2005). The failure or triumph depends upon the competency of the project manager and the role that he plays on the project (Ehsan et al., 2010). Concern about project managers 'expertise in effectively delivering projects is demonstrated not only by studies into project success and multiple aspects of project management expertise, but also by developing norms that can be used to guide the creation and evaluation of project staff (Crawford, 2000). Ghana faces a multitude of deficiencies in development (Ofori, 2014). Large projects have flooded the country, especially when oil was discovered in 2009 (Ofori, 2014). Although some organizations contest these activities are of a low level of project management practices, others are well organized (Ofori, 2014). The human resources capabilities involved in these projects are crucial because they can have a significant effect on the overall outcomes of these ventures and especially about the business (Ofori, 2014). In this case, the project manager's efficiency is essential to the survival of the project (Jiang and Margulis, 1998). In the same manner, Margulis (1998), also declared that, "the project manager is the most critical component for successful delivery of projects". According to literature, project leadership has become a top priority in the field of project management (Krahn and Hartment, 2006). As noted, Kotter (2001) stated that while management is about effectively handling complexity, leadership involves coping with change (Krahn and Hartment, 2006). The nature of the projects is becoming much bigger, more complicated, more heterogeneous and more uncertain as they increase in prevalence (Krahn and Hartment, 2006). In this sense, it is increasingly critical to have a clear knowledge of the work needed to deliver projects successfully and knowledge of the best combination of skills and competence for the project manager to be the most effective (Krahn and Hartment, 2006)

1.2 Statement of The Problem

Corporate performance relies heavily on the success of projects (PMI, 2019). So, executives are beginning to focus more closely on hiring project managers who have the needed competencies and personal attributes that will make them successful (PMI, 2019). As a project manager, your value is categorized according to what you know, what you can do and how you are (PMI, 2019). Crawford points out that project staff's expertise is crucial because it has a significant effect on project performance and hence on company performance (Crawford, 2005). Pellegrinelli and Bowman (1994), Hastings (1996) and Adenfelt (2010) as cited in (Kwofie et al., 2015) indicates that, the identification and development of critical project management skills that are crucial for improving organizational employees and improving efficiency has been recognized as a fundamental assumption for team inclusion, cooperation, coordination and team achievement (Kwofie et al., 2015). Thus, in modern project management practice, it has become essential to combine other general knowledge of management with abilities that go beyond technical elements (Ofori, 2014). In traditional project management, executives have concentrated on monitoring (Ofori, 2014). As organizations however, identify more of their tasks as investments, there is a growing demand for project executives; leading to enhanced significance in project management abilities (Ofori, 2014). PM has become much more prominent as an impressive management idea used to drive developing country's economic growth agenda, including Ghana, not only business objectives (Ofori, 2014). Ahmad (2009) as specified by (Ofori, 2014); orated that, the growing pressure on executive success hence the need for more effective methods of implementing organizational policies has led to increasing interest in project executives and project staff globally (Ofori, 2014). Likewise, the changing patterns in project management and the belief that projects are gradually becoming increasingly complicated and highly technical require the PM role to adjust to these changing situations in the industry in order to preserve its importance for project delivery in the future (Ofori, 2014). In some years to come, the Project Manager role will require countless competence in communications, relationship building, complex decision making, business insight, risk management, diverse thinking, involvement with others, coaching and mentoring (Wiezel et al, 2011). From this, you can infer three categories of skills which are knowledge-based (PMI, 2017), performance-based (PMI, 2017), and personal competency (PMI, 2017). Project management knowledge competence includes knowing project management techniques, processes, and standards (PMI, 2017). The knowledge regions are linked to project integration, leadership, scope, schedule, price, quality, resources, communications, risk, procurement and stakeholders. In terms of performancebased competencies, managers need to factor the type of things a project manager can accomplish and who you are affects how you perform. Who you are brings us to personal competencies (PMI, 2019). This area of expertise is about stuff such as your motives, attitude, values and self-concept (PMI, 2019). Each individual competency relates to aspects of your character that affect how you apply your knowledge and skills (PMI, 2019).

1.3 Aim and Objectives

The aim of this research is to explore project management competencies of project managers; and the objectives are -:

- To identify the level of project management technical competency of project managers
- To identify the level of project management behavioral competency of project managers

1.4 Research Questions

- i. What is the level of project management technical competency of project managers?
- ii. What is the level of project management behavioral competency of project managers?

1.5 Significance of Study

The study will stipulate information on the competence of project managers in Ghana. It will help to comprehend the various issues and increase people's awareness about project management competencies. Through this work, project managers will be able to identify relevant competences that are needed on the job in order to excel as a project manager. With this, managers and junior project managers will be able to equip themselves so they can function efficiently and effectively in their profession. The study will also serve as a reference point for students and other researchers as well as corporate entities by helping to assess the competence level of project managers considering these key competency elements. Over all, the competency level of project managers will increase as a significance of this study.

1.6 Methodology/ Research Design

The research used a quantitative approach to obtain numerical data with a structured questionnaire from a sampled population from the 2018/2019 MSc Project

Management class precisely in Accra. It should the noted that, the source of data collection was through primary source. Primary data was via questionnaires. The questionnaire was close- ended questions. The questionnaires were self-administered by the respondents to prevent any form of influence from the researcher. The researcher used a survey design because it deals with present events and is quantitative in nature (Prabhat and Pandey, 2015).

A census survey was adopted to gather data from all the members of the class. This is because, the researcher desired to adequately obtain data from respondents from the project management class who represent managers from different working industries.

Data analysis generally involves lowering accumulated data to a manageable size, developing summaries, looking for patterns and applying statistical techniques (Cooper and Schindler, 2014). Scaled responses on questionnaires and experimental instruments often require the analyst to derive various functions, as well as to explore relationships among variables (Cooper and Schindler, 2014). Based on this, the descriptive analysis tool in the Statistical Package for the Social Sciences (SPSS) was used to analyze the data solicited via questionnaires.

1.7 Scope of The Study

The choice of topic is influenced by the researcher's desires to know more about project management competency and to gain adequate skills through the study. It should be stated that, the scope of the study was sectioned into two. This comprised of the contextual and geographical scope. The contextual scope explored two dimensions of project management competency; the technical and the behavioral. The reason for this was to assess students who have acquired the technical skills of project

management and uncover their behavioral skills with regards to management of projects. The geographical scope was based exclusively on the students undertaking MSc project management course in KNUST within the Accra campus. This thesis is limited in the sense that it does not represent the entire population of project managers in Ghana; it rather focuses on the Kwame Nkrumah University of Science and Technology Institute of Distance Learning (KNUST IDL) 2018/2019 class.

1.8 Limitations of the Study

The main limitation to the study has been the delay in receiving responses from respondents. This was so because respondents were also focusing on their project study as well as the time frame to complete the study. This impacted the total output of questionnaires for the analysis that is, the low response rate. Financial constraint was another challenge faced during the research since the researcher had to use internet facility to obtain literature (information) for the study. This work cannot to be wholly generalized since it does not represent the entire population of project managers. The work was time bound and financially constrained. Again, extra care was taken so that, data generated was not prejudiced or biased since it was adopting a non-probability sampling technique.

1.9 Structure of Thesis

The study was structured into five sections. Chapter one tackled the background of the study and statement of the research problem. It looked at the research questions and objectives of the study. The significance of the study, the scope and delimitation of the study were also part of chapter one. Chapter two handled the theoretical framework including review of relevant literature relating to the topic. Chapter three

discussed the methodology which entails the research design, the sampling unit, the sample frame, procedure for data creation. Chapter Four then focused on the data analysis which was presented using tables to show the meaning of data collected from the respondents. Chapter five gave the summary of findings, conclusion and recommendations.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

Competency originates from the Latin term 'Competentia' meaning that it is permitted to judge and has the right to talk (IPMA, 2006). Project management is an industrial field of increasing significance, gaining higher rates of interest and utilization (Pinto and Kharbanda, 1995). However, efficient project management has also become more difficult as the environment in which projects are delivered has become increasingly dangerous and complicated (Thomas, 1990). In a business environment that is changing, calling for the management of projects that are also changing, effective project management requires a broad mix of skills and competencies (Krahn and Hartment, 2006). The Business Dictionary defines competence as a cluster of associated skills, obligations, expertise and skills that allow an individual or organization to behave efficiently on the job or situation (Business Dictionary, 2019). Competence indicates adequacy of knowledge and skills that enable someone to act in a wide variety of situations (Business Dictionary, 2019). Competence means that you can do something well; you can perform a task or job effectively (Sieck, 2014). Competence can include the knowledge and skills needed to solve a quadratic equation (Sieck, 2014). Or, it can comprise much larger and more diverse clusters of skills, or competencies, needed to lead a multinational corporation (Sieck, 2014). Competence is a collection of knowledge, personal attitudes, skills and relevant experience necessary to succeed in a particular function (IPMA, 2006). Project management competence can be described as the ability to carry out the project management process professionally and project management competence requires project management-knowledge as well as project management experience (Gareis and Huemann, 2011). In all, the basic meaning of the phrase

competence is the aptitude to do something well or successfully (Morris and Pinto, 2007). From Shavelson's perspective, Competence is a physical or mental capacity, skill or both; it is an ability to do as well as to know; it is conducted under standardized conditions and is evaluated by some level or standard of performance as suitable, adequate, sufficient or competent; and can be improved; it is also based on a basic complex capacity and needs to be observed in real-life situations (Shavelson, 2010). Significantly, the prime focus is on competent people having the ability or capability which will enable the satisfactory completion of some task(s) (Hager and Gonczi, 1996). Competence is a quality or state of capacity, efficiency, sufficiency or achievement; competencies are linked to work operations expressed as minimum norms of skilled results (Ahmed, 2018). It also refers to a skill or standard of performance achieved by an employee and is measured by what the employee can do or accomplish (Strengthscape, 2018).

2.2 Importance of Competence to The Organization

In this changing working environment, the importance of project management is increasing more and more (Khamaksorn, 2016). Project management practice is a relevant subject and an important tool for implementing strategy in the construction industry (Khamaksorn, 2016). Concern for project management expertise has led to the growth of information and practice norms for project management that are used for evaluation, growth and accreditation (Crawford, 2005). The creation of these norms was mainly qualitative, based primarily on the collective view of experienced professionals on what project staff need to understand and what they need to be willing to do to be deemed competent. In the construction industry, projects are companies' source of revenue (Dziekoński, 2017). Therefore, the construction

industry is probably the largest project-based sector (Dziekoński, 2017). Many organizations in the sector are interested in developing their managers' skills as the achievement of the project depends heavily on their manager's skills (Dziekoński, 2017). It is claimed that PM competencies are essential for predicting performance outcomes and supplying the entire project team with a performance management scheme that results in project success (Ahadzie et al, 2009). A project manager applies knowledge, skills, tools, and techniques to project activities to meet the project requirements (Barna, 2013). Because the future project manager will communicate with twice as many stakeholders as the present PMs, he or she will need considerably enhanced leadership, individuals and thinking abilities as previously required or even today (Wiezel and Badger, 2015). Because project management is a discipline that includes so many areas of human interaction with distinct kinds of individuals in distinct fields, project management needs us to create a variety of private abilities or soft skills to complement our difficult abilities (Naybour, 2016). Therefore, it is a combination of this variety of skills from hard to soft and all that encompasses between that makes a project manager effective; by which we mean a consistently successful project manager (Naybour, 2016). Project management can be perceived as a core competence of a POC (Project Oriented Company), as it creates a competitive advantage (Gareis and Huemann, 2011). If a business has pm knowledge and experience, projects can be carried out more efficiently and efficiently than undertakings without pm expertise (Gareis and Huemann, 2011). Project management adds value to the customer and to ensure this competitiveness, permanent further development of the pm-competence is highly necessary (Gareis and Huemann, 2011). Project managers should have different skills and abilities to make them more competitive and prominent, as traditional organizational skills are not enough for efficient functional or matrix-based companies (Ahmed, 2018). These requisite skills and competencies are vital for project managers to execute tasks efficiently and effectively because the work of a project manager is more challenging and tends to cope with uncertain conditions (Ahmed, 2018). If the individuals who run the project are properly skilled, they will perform efficiently, resulting in the overall achievement of the project and organization (Khamaksorn, 2016). Successful project executives are managers with powerful management abilities as well as efficient leadership abilities (Kumar, 2009). Skills in leadership are not the same as abilities in leadership (Kumar, 2009). Experience and exercise can enhance leadership abilities (Kumar, 2009). It is possible to learn leadership abilities and develop leadership characteristics (Kumar, 2009). Effective management abilities are developed to complement those that have made them successful as executives (Kumar, 2009). In the same manner, the expanding developments in project management and the principle that activities are eventually becoming challenging and integrative necessitate the PM structure to conform to these changing conditions in order to maintain its relevance for big project delivery (Ofori, 2014). To guarantee the success of projects, the project director must have the necessary understanding of project leadership, defined as the planning, organization, monitoring and tracking of all elements of the project and the motivation of all stakeholders to attain project goals in a safe and timely manner (Dahie, et al., 2017). In addition, project success is the satisfaction of the requirements of stakeholders and is assessed by the performance criteria defined and agreed at the project beginning (Khamaksorn, 2016). Identifying and developing project managers competencies are becoming more and more important in today's competitive market (Khamaksorn, 2016).

2.3 Project Management Practice in Ghana Before and Now

Most of the Project Management studies carried out focused mainly on Europe, North America and Asia (Venter, 2005). Very few of the studies concentrated on PM problems in Africa and none of the papers reviewed included Ghana-based PM research (Venter, 2005). In Ghana, the early acceptance of Professional Project Management Practices (PPMP) dates to the late 1980s when it was productively applied on a number of mass housing building projects initiated by the Social Security and National Insurance Trust (SSNIT) (Ahadzie, et al., 2012). The development issue was therefore not simply about finding technically ideal alternatives (Venter, 2005). In the long term, Ghana's challenge has been to make more efficient and effective use of its scarce resources by managing companies, programs and initiatives in both the government and private industries (Venter, 2005). Since the late 1980s, the need to manage the development process has led in Ghana embracing countless programs and duties or projects as a vehicle for social and economic initiatives (Venter, 2005). Project management theory has received enough attention and popularity in many developing countries such as Ghana as a helpful means to achieve project success (Ahadzie, et al., 2012). To this extent, Ghana has recently added impetus to this popularity by for the first time specifically mentioning and recognizing the title project manager (PM) to the procurement Act (Act 663 of 2003) (Ahadzie, et al., 2012). To date, study on project management (PM) has concentrated on problems of project management in the private sector, problems of project management in the public sector, company-specific PM problems and overall PM problems (Venter, 2005). Nearly a century later however, it is not quite evident how this important recognition has helped to fully integrate professional project management practices (PPMP) as a key management function in the Ghanaian construction industry (GCI) (Ahadzie, et al., 2012). Project management is now developing into a strongly accepted scientific manner of handling programs, projects and entities differing from traditional management but meeting its practitioners goals (Venter, 2005). It has become a prime and relevant tool for delivering Ghana's economic development ambitions (Venter, 2005). Though, the attempt to use projects as a tool for realizing development objectives has not been as successful as desired (Venter, 2005). Countless issues have afflicted project management in Ghana (Venter, 2005). In theory, an attempt at introducing the "Ghana Chapter of Project Management Institute" is an indication of the membership's growth potential (Ahadzie, et al., 2012). The mention of the PM in the procurement act (Act 663, 2003) is perhaps the biggest sign of all stakeholder's dedication to the growth of Ghana's discipline (Ahadzie, et al., 2012). Also, the worldwide rise in project management (PM) accreditation, implementation and training gives credence to its recognition as a safe paradigm for project delivery (Kwofie, et al., 2018). In Ghana, the project management environment is integrated in systemic and organizational problems such as payment challenges and long waits, bad teamwork and communication systems, financial constraints, detailed inspections, an underdeveloped and complex land tenure system and widespread disregard for building regulations (Amoah et al, 2011). It ought to be noted that, despite the increase in project management procedures in Ghana, most of the research undertaken has focused primarily on the construction industry, as building and defense projects have dominated the scene in recent years (IPMA, 2006). Although the subject is applicable in all sectors of the economy. We deal with projects in, for example, ICT, organizational development, product development, marketing modifications, manufacturing growth, research, activities, political projects, legislative projects, academic projects and social projects in many distinct industries of the economy (IPMA, 2006). With an upsurge of competition in Ghana's

business environment, astute project management practices could easily become a source of differential or competitive business advantage (Venter, 2005).

2.4 Project Management Competency Research in Ghana.

Manaan et al.,(2014) uttered that a study conducted by Ahadzie et al., (2009a) identified seven core competencies that senior executives can use to evaluate and assess PM competencies, namely: job knowledge in site design methods for repetitive building works, commitment to assisting contractors accomplish work programs, job knowledge of suitable technology transfer for repetitive building works, efficient house-unit time management procedures, skills (Manaan et al, 2014). Project results in Ghana were found to be poor due to the way in which operations are handled, the way in which project management takes place and the approaches to project management used (Ofori, 2014). Also, Low expertise in project management has also been identified as contributing to the execution of projects in Ghana (Ofori, 2014).

2.5 Dimensions of The PM Competence

The Project Management Institute being the most widely distributed source of knowledge about project management identifies three types of competencies which are knowledge-based, performance-based and personal competency (PMI, 2017). The knowledge areas relate to the management of project integration, scope, time, cost, quality, human resources, communications, risk, procurement, and stakeholders (PMI, 2017). The performance skills of project management include your job qualifications and experience (PMI, 2017). They are based on skills that you bring to the table as a project manager (PMI, 2017). Employers generally look for experience on similar

projects in similar organizations and are interested in the success of these projects (PMI, 2017). Project management's performance abilities include your work qualifications and experience (PMI, 2017). For example, you can develop a project budget, properly schedule project resources, carry out a risk assessment and mitigate risk effectively (PMI, 2017). Personal competencies are about things like your motives, attitude, values, and self-concept (PMI, 2017). Each private skill refers to elements of your personality that influence how you apply your abilities and expertise (PMI, 2017). Successful project managers can manage changes as a project develops because they're innovative and willing to take calculated risks (PMI, 2017). As a project manager, you need to discover flexible methods to respond to unexpected modifications, even if this includes some danger (PMI, 2017). This implies that you should be able to guarantee that the effort is maintained from the beginning to the end of a project (PMI, 2017). Strengthscape also identifies three types of competencies, namely; core competencies, cross functional competencies and functional competencies (Strengthscape, 2018). Core competencies are directly related to strategic organizational capabilities (Strengthscape, 2018). Core skills are highly helpful for people to express, strengthen and reward themselves with the organizational value. These capacities refer to fields where a competitive advantage is sought by the organization (Strengthscape, 2018). Some of the important core competencies include - decision making, teamwork, work standards, reliability, motivation, adaptability, problem-solving, integrity, communication, planning and organization, stress tolerance, and initiative (Strengthscape, 2018). This key skill goes together with communications competency (Curtis, 2018). Much of the communication of a project manager has to do with the negotiation of budgets, schedules, scope and resource utilization (Curtis, 2018). Cross-functional skills refer to those not immediately chosen for key skills. However, these skills are still needed in many tasks and departments for several employment (Strengthscape, 2018). Some of the examples include computer user skills, budgeting (Strengthscape, 2018). Functional competencies are also referred to as technical competencies. These are the skills that professionals are required to use on a daily or regular basis (Strengthscape, 2018). Employee training, software programming, risk analysis, data analysis and tax accounting are some of the examples that fall under this competency. It is also important to know that these competencies are job-specific ones that drive quality results and assured performances for different positions (Strengthscape, 2018). According to Frame (1999), as stated in Ofori (2014), Project manager expertise has two primary components: "knowledge-based skills and trait-based" skills (Ofori, 2014). Knowledge-based skill sets are the objective knowledge that individuals are anticipated to exhibit in order to successfully perform their jobs. For instance, within project-driven institutions, project executives are accountable for a range of operations such as Project initialization and planning, creating project cost framework, monitoring and reporting project deliverables, risk management, contract management and implementation of PM procedures and instruments, and focus on ensuring that projects are delivered on time, with a high level of customer gratification and in budget (Ofori, 2014). This places the project manager at the heart of the project's achievement and the most significant factor in effective PM as shown in (Ofori, 2014). Rego and Silva stated that project management practice presupposes a set of skills, that is, the set of skills and abilities needed to manage projects (Rego and Silva, 2012). The primary technical expertise mentioned was the capacity to build the Work Breakdown Structure (WBS) document risk assessment, cost estimates, networks of projects, value-added analysis, project baseline, progress reports, leveling of resources, integrated change control and final report (Rego and Silva, 2012). Edum and McCaffer have mentioned that, professional project leadership abilities are obtained through the

mixture of knowledge gained during training and abilities created through experience and information gained (Edum-Fotwe and McCaffer, 2000). Again, much of the knowledge required for project management is unique to project management. These include the critical path analysis and the cash flow forecast for the project (Edum-Fotwe and McCaffer, 2000). The trait-based competencies are more subjective and focus on abilities such as being politically savvy, having good judgment and human relations, as well as having an awareness of the organization's goals (Ofori, 2014). From Curtis' perspective, most project executives have a set of core competencies that are significant knowledge, characteristics and abilities for the performance of a job (Curtis, 2018). A core competency can be a hard skill, such as technical know-how, or a soft skill, such as strong interpersonal skills (Curtis, 2018). According to Ahmed (2018), different scientists categorized leadership skills in project management literature into three primary classifications which are the intellectual skills (IQ), organizational skills and mental skills (Ahmed, 2018). It should be possible for project managers to motivate and support individual (Anon., 2000). Members of the project team will rely on the project manager to fix issues and assist remove barriers (Anon., 2000). Project executives must be able to fix issues within and outside the team (Anon., 2000). Effective project managers tend to be excellent decision-makers and can delegate responsibilities to the team members most equipped to handle them (Villanova University, 2019). Project managers must always be positive, even if there are significant difficulties, issues, or barriers to the project as negative attitudes erode trust and there will be a downward spiral (Higher education, 2000). There are two schools of thought about the level needed for technical skills (Higher education, 2000). Some project executives prefer little technical understanding about the projects they manage, preferring to leave the technical management to other junior managers, such as programming managers or network managers (Higher education, 2000). Others

have detailed technical skills of computer languages, software, and networks. There is no rule that is difficult and quick (Higher education, 2000). In addition to those that are solely technical, project executives need other key skills to effectively lead and deliver on their projects (Higher education, 2000). An excellent project manager needs to know many facets of the business aspect of running a project, so critical skills discuss expertise in the areas of organization, communication, finance, and human resources (Higher education, 2000). Examples of management topics used in the training of effective project executives are: project planning, initiation and organization, individual recruitment and retention, effective project management negotiation, project management software instruments, precise estimation and cost control, project execution and control, strong project presentations and reports, sustaining a high-performance team (Higher education, 2000). In agreement to this, the International Project Management Association (IPMA) views the competence of the project manager from three dimensions (IPMA, 2006). These are the Contextual skills, behavioral skills and technical skills with their different components mentioned in addition to each spectrum of skills. Elements of technical competence deal with the issue of project management on which the experts work (IPMA, 2006). Elements of behavioral competence deal with private interactions between people and organizations employed in projects, programs and portfolios, whereas the aspects of contextual competence discuss the relationship of the project team within the project and with the continuous organization (IPMA, 2006).

Contextual Competencies: Project orientation, portfolio orientation, project, program and portfolio execution, permanent organization, business, systems, product and technology, personnel, health, safety, environment, finance and legal (IPMA, 2006).

Behavioral Competencies: leadership competence, engagement and motivation, self-control, assertiveness, relaxation, openness, creativity, result oriented, efficiency, consultation, negotiation, conflict and crisis, reliability, values appreciation and ethics (IPMA, 2006). And the **Technical Competencies**: project management success interested parties, project requirement and objectives risk and opportunity, quality, project organization, teamwork, problem resolution, project structure, scope and deliverables (IPMA, 2006).

2.6 Factors Influencing PM Competence

Ahmed has affirmed that, there are certain variables influencing project management in distinct circumstances where project leadership skill is one of the main variables (Ahmed, 2018). Several study studies focused on professional expertise in project management, mainly based on the views of project management professionals (Mahsa Taghi Zadeh et al., 2016). Some literatures have highlighted the significance of PM skills and characteristics in project success while others have assessed PM competencies across cultures and industries (Mahsa Taghi Zadeh et al., 2016). Several research on the abilities of project executives concentrated more specifically on the significance of human abilities (Mahsa Taghi Zadeh et al., 2016). Project performance is connected to leadership and organizational culture (Ahmed, 2018).

The organization's culture influences the leader and shapes the leader's activities and skills over time (Ahmed, 2018). For example, a project-based organization with a conservative, risk-averse environment will find outcomes that differ from those of a creative, high-risk community (Lindbergh, 2007). When working on a project with internal and external customers, it is essential to pay close attention to relationships, context, history and corporate culture (Watt, 2014). Corporate culture relates to the

views, attitudes and values shared by the members of the organization and their compatible actions (which they give rise to) (Watt, 2014). Corporate culture distinguishes one organization from another and dictates how organization members see you, communicate with you, and sometimes judge you (Wiezel et al, 2011). Often, projects too have a specific culture, work norms, and social conventions (Watt, 2014). Therefore, the organization must alter its leadership processes in order to attain project management enhancement and achievement; not by attempting to modify individuals or by implementing one-step alternatives such as coaching alone (Jaques, 1998). Organizational culture can be difficult to define (PMI, 2017). To understand it better, you need to know the elements (PMI, 2017). The values of an organization filter down from its vision and mission statements, the principles and values openly announced which it seeks to accomplish (PMI, 2017). These values affect how project work is done because they set underlying priorities for the work (PMI, 2017). As organizations work together, staff create a set of guidelines, values and norms implied or unwritten about how things should be accomplished (PMI, 2017).

Project-based organizations generate an environment that encourages effective project management processes, encourages organizational collaboration and offers project managers with the resources, structure and information they need to carry out their job (Lindbergh, 2007). Projects are linked to the strategy of the organization and are run through a portfolio management process to ensure that the organization carries out the right projects at the right time (Lindbergh, 2007). The organization focuses on continuously improving project management and promoting project management across the organization (Lindbergh, 2007). Once again, project managers are accountable for a range of project-oriented activities, including

initiating and making project plans, setting project cost frameworks, keeping project deliverables tracked and reported, risk management, contract management, application of PM processes and tools, and ensuring that projects are completed on time and within the budget and with a strong client or stakeholder satisfaction (Ofori, 2014). The project manager will not achieve quite enough knowledge of the same type of project over several years (IPMA, 2006). He should also apply the knowledge in real and entirely different situations, e.g. projects with various sizes, different types of projects, different organizations, various branches and/or religions and cultures (IPMA, 2006). Informal policies and procedures are those unwritten rules that the members of an organization are expected to follow (PMI, 2017). They include wide ideological values that guide how a group interacts with staff, clients, and other stakeholders (PMI, 2017). Then there are the rules about how to really get things done around here (PMI, 2017). Some procedures might be explicit, while others might be implicit (PMI, 2017). For example, it may be a common knowledge that, to get something approved, you need to go to a senior manager first (PMI, 2017).

Project management culture provides project managers with policies, processes, structure, tools and resources, to achieve project constraints. project management culture is an effective tool in achieving organizational strategic objectives (Alqahtani et al., 2015).

2.7 Chapter Summary

An organization should not jeopardize a project by assigning someone who does not have the capacity to ensure success (Bourne, 2004). If these skill sets are not accessible, a stretch task should be provided to project managers whose skill sets are

nearly at the required stage, backed by extra training, coaching and mentoring (Bourne, 2004). By providing more project managers the ability and tools to succeed in this environment and by appropriately scheduling training time and the number of individual errors in a project manager's career, a greater percentage of projects in complex organizations could provide more efficient and effective outcomes (Bourne, 2004). This would not only benefit the organizations themselves, but also enhance the profile of project management as a profession and boost the capacity and self-esteem of individual project directors (Bourne, 2004). Business institutions should seek new and more reliable guides to help them identify and develop project personnel who can fulfill these difficulties as they approach the next century (Ofori, 2014). Leaders must also be able to form and manage teams and communicate with stakeholders (Villanova University, 2019).

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

Research methodology is a way to systematically solve the research problem (Kothari, 1990). It may be understood as a science of studying how research is done scientifically (Kothari, 1990). Having said that, this chapter highlights the actions to be taken to achieve the study aim and goals. It centers on the research approach, the unit of analysis, population or sample frame, sample size, sampling technique, data collection instrument, and finally the data processing and analysis.

3.2 Research Approach.

There are two basic approaches to research, viz., quantitative approach and the qualitative approach (Kothari, 1990). The former includes the quantitative generation of information which can be formally and rigidly analyzed quantitatively (Kothari, 1990). This strategy can also be sub-classified into inferential approaches to studies and simulation (Kothari, 1990). A quantitative approach was used to collect numerical data from the 2018/2019 MSc. project management (IDL) class in Accra,

3.3 Unit of Analysis:

Units of analysis are the sampling elements, often people or households or any countable objects (Bacon-Shone, 2015). Before choosing the sample, a choice must be made on a sampling unit (Kothari, 1990). Sampling unit can be a geographic unit such as country, region, town or social unit such as family, club, college or it may

be an individual (Kothari, 1990). This will therefore be from the 2018/2019 MSc project management class Accra to solicit their views on the above research topic. Reason for the selection of this unit is that, they have undergone some technical training in project management practices.

3.4 Population

The sampling frame is closely related to the population (Donald and Schindler, 2014). It is the list of elements from which the sample is drawn (Cooper and Schindler, 2014). Ideally, it is a complete and correct list of population members only (Donald and Schindler, 2014). Also referred to as the source list, it includes the names of all universe/ products (Kothari, 1990). Such a list should be comprehensive, correct, reliable and appropriate (Kothari, 1990). It is highly essential that the source list is as representative as possible of the population (Kothari, 1990). Therefore, the 2018/2019 project management class remains the population to be sampled.

3.5 Sample Size

This refers to the number of items to be selected from the universe to constitute a sample (Kothari, 1990). The size of the sample should neither be excessively large, nor too small (Kothari, 1990). It should be optimum (Kothari, 1990). All products in any area of investigation are a universe or a population. A complete enumeration of all items in the population is known as a census inquiry (Kothari, 1990). Based on this, a census survey was used to solicit data from the entire 2018/2019 MSc project management class from the Accra campus for optimum data collection.

Therefore, a census is the process of systematically obtaining and recording data about the members of a population (Wikipedia, n.d.).

3.6 Sampling Technique

This deals with the method of selecting items to be observed for the given study (Kothari, 1990). For this reason, a non-probability sampling technique was applied by using a census survey. Non-probability sampling is a sampling technique that does not provide a foundation for estimating the likelihood that each item in the population will be included in the sample (Kothari, 1990). It is the researcher's duty to identify the target population clearly (StatPac, 2017). Very little rules are to be followed and the researcher must rely on logic and discretion (StatPac, 2017). The entire population will sometimes be small enough and the author may include the whole population in the sample (StatPac, 2017). This type of work is termed a census study because data is collected on each member of the population (StatPac, 2017).

3.7 Data Collection Instrument

Primary data was collected via the use of a questionnaire. The primary data are those which are collected afresh and for the first time, and thus happen to be original in character (Kothari, 1990). Primary data are sought for their proximity to the truth and control over error (Cooper and Schindler, 2014). A questionnaire comprises of several printed or published issues on a form or set of types in a definite order and the questionnaire was sent to participants expected to read and comprehend the questions and write the answer in the space meant for the purpose in the questionnaire itself (Kothari, 1990). To prevent any influence from the researcher,

the participants must answer the questions on their own (Kothari, 1990). It must be noted that, the questionnaire was close-ended questions.

3.8 Data Processing and Analysis

Since it is not practical to store raw information in a document, alphanumeric codes are used to decrease response to a more manageable storage and future processing scheme (Cooper and Schindler, 2014). Data analysis usually involves reducing accumulated data to a manageable size, developing summaries, looking for patterns, and applying statistical techniques (Cooper and Schindler, 2014). Hence, the descriptive analysis tool in Statistical Package for the Social Sciences (SPSS) will be used to analyze the data generated via questionnaires. The rating scale was based on the cognitive processes of Bloom's Taxonomy of learning. Summary rating scales consist of statements expressing either a positive or an unfavorable approach to the subject of concern (Donald and Schindler, 2014). The participant is asked to agree or disagree with each statement (Cooper and Schindler, 2014). Each answer has a numerical score to represent its degree of preferential attitude and the results can be summed up to evaluate the general attitude of the participant (Cooper and Schindler, 2014).

CHAPTER FOUR

DATA ANALYSIS AND DISCUSSION

4.1 Introduction

This chapter discusses the views of the respondents regarding the competence of project managers. In all, the questions were sectioned in two parts. Part one focused on the demographic data of respondents whilst part two centered on respondent's People Competences and Practice Competences. Respondents were asked to indicate the level that best describes your competence using a scale rating from (0-6). Table 4.1 shows the frequency distribution profile of the respondents.

4.2 Questionnaire Response

Questionnaire was sent electronically through the Googles Forms to be administered by a class of 150. Out of this, only 42 responses were retrieved. Representing 28% of the response rate. The low response rate was because, the class were also focusing on completing their work on time. Of the 42 respondents, 11 were females and 31 being males; this represents a percentage of 26.2% and 73.8% respectively. The questionnaires were sectioned in three forms comprising of the demographic, the people competence and the practice competence.

4.2.1 Demographic Characteristics of Respondents

This section examines the background of the respondents by focusing on respondents' age, industry they work in, their position or role at work or on the project, number of years on the job and their years of project experience.

Table4.1: Frequency Distribution Profile of Respondents

Table4.1: Frequency Dis				
		Frequency	Percent	Cumulative Percent
	Female	11	26.2	26.2
1. What is you gender?	Male	31	73.8	100
	Total	42	100	
	25 – 30	11	26.2	26.2
2. Which age range do	31 – 40	16	38.1	64.3
you fall within?	41 - 50	13	31	95.2
	51 – 60	2	4.8	100
	Banking/Financial Sector	7	16.7	16.7
2 What industry do	Construction	22	52.4	69
3. What industry do you work in?	Information Technology	2	4.8	73.8
	Oil and Gas	4	9.5	83.3
	Other(s)	7	16.7	100
	Assistant project manager	4	9.5	9.5
	Employer/Director	2	4.8	14.3
	Middle-level executive	5	11.9	26.2
	Other(s)	5	11.9	38.1
4. What is your role on the project/firm?	Program/project officer	2	4.8	42.9
- 7	Project manager/team leader	15	35.7	78.6
	Project team member	8	19	97.6
	Senior executive	1	2.4	100
	11 – 15 years	6	14.3	14.3
	16 – 20 years	1	2.4	16.7
5. How long have you	2-5 years	17	40.5	57.1
been in your present position?	6 – 10 years	14	33.3	90.5
position.	Less than 2 years	2	4.8	95.2
	Over 20 years	2	4.8	100
	11 – 15 years	4	9.5	9.5
	16 – 20 years	3	7.1	16.7
6. How many years of	2-5 years	15	35.7	52.4
project experience do	6 – 10 years	12	28.6	81
you have?	Less than 2 years	5	11.9	92.9
	Over 20 years	3	7.1	100
	Total	42	100	

4.2.1.1 Age Range of Respondents.

From the replies obtained, majority of the respondents range between the ages of 31-50 thus 29 of the respondents which totals to a percentage of 69.1% jointly. It was followed by 10 respondents between the ages of (25-30) representing 23.8%.

4.2.1.2 Industry of Work

Relating to the industry in which respondents work, it was realized that, 52.4% of respondents were from the construction industry indicating 22 of the respondents comprising both males and females. This was followed by the Banking/Financial Sector which gave 16.7% thus 7 respondents and another 16.7% from different working sectors but the precise industries were not stated.

4.2.1.3 Role on the Project/ Firm

Regarding the respondents' role on the project/firm, 14 of the respondents were Project manager/team leader representing 33.3%, 19% were Project team member with a total of 8 respondents, 11.9% were Middle-level executives, 11.9% did not specify their roles on the projector/firm, 9.5% were Assistant project manager. A few respondents were Employer/Director and Senior executive. It can be observed that most of the respondents occupy key positions on the project and in the firm thus supporting the quality of information obtained.

4.2.1.4 Number of Years in Present Position

On the number of years respondents have been in the present positions, 17 respondents indicated they have held that position between 2-5 years giving 40.5%, 13 respondents have been in that position between 6-10 years thus, 31%, 14.5% range from 11-15

years whereas 2 respondents representing 5% have been in their positions for less than two years. Again, two respondents indicated they have held that position for over 20 years which gave 4.8%. It can be observed that, the number of years some respondents have had in their present positions was likely to make them gain knowledge and help them gain competence in their respective positions thereby being assets to the organization.

4.2.1.5 Number of Years with Project Experience

On the question about the number of years respondents have had project experience, 24 respondents have between 2-5 years and 6-10 years of project experience representing 59.4% jointly. 11.5% have less than 2 years project experience, 3 respondents have over 20 years of Project experience making 7.1%. 11 respondents have between 11-15 and 16-20 years; representing 16.4%. Unfortunately, 2 respondents making 4.8% did not state their years of project encounter. It should be stated that, the number of years a person has on the project gives that individual worth of project management experience. Much experience equips the project manager to function effectively on to the success of the projects they execute.

4.3 Practice Competences

This portion sought to assess the respondents based on the technical competency and the cognitive processes of Bloom's Taxonomy of Learning was used in this regard.

The practice competence dealt with the respondent's ability to apply their technical and knowledge when executing projects. Table 4.3.1 shows how respondents rank in their technical competences.

Table 4. 2. A Practice Competences of Respondents

ractice Competences			
P1Project design	Mean	Std.	Ranking
Select and review the overall project management approach	3.417	0.983	1 st
Design the project execution architecture	3.346	1.021	2 nd
Lessons learned from and with other projects	3.261	1.065	3^{rd}
Determine the complexity of the strategy and its implications	3.223	1.072	4 th
Acknowledge, priorities and review success criteria	3.117	1.113	5 th
P2Requirement and objectives			
Project stakeholder needs and requirements	3.643	1.163	1 st
Priorities and decide on requirements and acceptance criteria	3.548	1.211	2 nd
Define and develop the project goal hierarchy	3.286	1.212	3 rd
P3Scope			
Define the work packages of the project	3.548	1.208	1 st
Structure the project scope	3.381	1.074	2 nd
Define the project deliverables	3.381	1.127	3 rd
Establish and maintain scope configuration	3.238	1.014	4 th

Table 4. 2. B Practice Competences of Respondents

Table 4. 2. B Fractice Competences (v veshanaciits		1
P4Time			
Decide on schedule and stage approach	3.595	1.049	1 st
Monitor progress against the timetable and make any changes needed	3.595	0.989	2 nd
Sequence project activities and create a schedule	3.524	1.224	3 rd
Determine the job effort and activity length	3.31	1.125	4 th
Define the activities required to deliver the project	3.214	0.967	5 th
P5Organisation and information			
Implementing, monitoring and maintaining the project organization	3.619	1.066	1 st
Define the project's framework, roles and duties	3.548	1.12	2 nd
Assess and determine the needs of stakeholders relating to information and documentation	3.381	1.173	3 rd
Establish information flow infrastructure, procedures and systems	3.238	1.127	4 th
P6Quality			
Verify the accomplishment of project quality goals and advise any corrective and/or preventive measures needed	3.507	0.992	1 st
Plan and organize project results validation Ensure the quality of the project	3.381	1.211	2 nd
Review the project and its results to guarantee that they continue to fulfill the quality management plan criteria	3.333	1.034	3 rd
Develop, track and revise the project's quality management plan	3.286	1.112	4 th
G 71.11.6 1 (20.70)	·	· · · · · · · · · · · · · · · · · · ·	·

Table 4. 2.C Practice Competences of Respondents

P7Finance			
Establish the project budget	3.31	1.045	1 st
Monitor project finances to define and correct project plan deviations	3.262	1.201	2 nd
Estimate project costs	3.19	0.987	3 rd
Secure project funding	3.119	1.768	4 th
Develop and retain a project financial management and reporting system	3.119	0.996	5 th
P8Resources			
Assess the use of resources and take all needed corrective measures	3.381	1.217	1 st
Identify and negotiate future sources of resources	3.262	0.991	2 nd
Apportion and disperse funds as required	3.238	1.061	3^{rd}
Develop a strategic resource plan for project delivery	3.214	1.121	4 th
Defines the quality and amount of resources needed	3.119	1.038	5 th
P9Procurement			
Monitor contract execution, address problems and seek redress if needed	3.31	1.079	1 st
Contribute to negotiating and agreeing contractual terms and conditions that meet project goals	3.214	1.213	2 nd
Contribute to vendor and partner assessment and choice	3.167	1.064	3 rd
Agree on procurement needs, options and processes	3.071	1.116	4 th

Table 4. 2.D Practice Competences of Respondents

P10 Plan and control			
Report on project progress	3.976	0.976	1 st
Assess, agree and execute modifications to the project	3.786	1.211	2 nd
Close and review a project or stage	3.643	1.089	3 rd
Start and organize the move to a fresh stage of the project	3.381	1.214	4 th
Control the efficiency of the project against the project plan and take all required remedies	3.238	1.083	5 th
Start the project and develop and get agreement on the project management plan	3.071	1.032	6 th
P11Risk and opportunity			
Evaluate and monitor risks, opportunities and implemented responses	3.286	1.231	1 st
Select strategies to tackle hazards and possibilities and execute reaction plans	3.286	1.023	2 nd
Identify risks and opportunities	3.238	1.21	3^{rd}
Assess the likelihood and effect of possibilities and hazards	3.119	0.979	4 th
Develop and implement a risk management framework	3.119	1.116	5 th

Table 4. 2.E Practice Competences of Respondents

P12Stakeholders			
Develop and sustain a communication strategy and plan for stakeholders	3.476	1.172	1 st
Identify stakeholders and analyses their interests and influence	3.381	1.211	2 nd
Engage with managers, sponsors and senior managers to gain dedication and handle interests and expectations	3.333	1.067	3 rd
Organize and maintain networks and alliances	3.262	1.216	4 th
Engage users, partners and vendors in order to develop their collaboration and engagement	3.238	0.963	5 th
P13Change and transformation			
Develop change or transformation strategy	3.214	0.963	1 st
Identify change requirements and transformation opportunities	3.167	1.063	2 nd
Implement change or transformation management strategy	3.095	1.162	3 rd
Assess the adaptability to change of the organization(s)	2.952	1.132	4 th

From the table above, It can be noted that participants classified their skills in important components such as the capacity to select and review the general project management strategy, the needs and specifications of project stakeholders, defined project job packages, implemented, monitored and maintained project organization, verified project performance goals and recommended any needed corrections, Supervising contract execution, addressing issues and seeking redress where necessary, reporting on project progress, assessing and monitoring risks, opportunities and responses, developing and maintaining a strategy and communication plan for stakeholders and their ability to develop change or transformation strategies as first (1st) Followed by competence in designing the project execution architecture, priorities and determining requirements and acceptance criteria, structuring the project

scope, monitoring progress on schedule and making any necessary adjustments, defining the project structure, roles and responsibilities, planning and organizing the project outcome validation to ensure quality throughout the project, also Identify potential sources of resources and collectively negotiate their acquisition, contribute to the negotiation and agreement of contractual terms and conditions that meet project objectives, evaluate, agree on and implement project changes, select strategies and implement risk and opportunity response plans, identify stakeholders and analyze their interests and influence and ability second (2nd) by respondents. Other elements ranked third (3rd) include lessons learned from and with other projects, define and develop the project goal hierarchy, define the project deliverables, sequence project activities and create a schedule, assess and determine the needs of stakeholders relating to information and documentation, evaluate the project and its deliverables to ensure that they continue to meet the specifications of the Quality Management Plan, estimate project costs, allocate and distribute resources as per the defined needs, contribute to the evaluation and selection of suppliers and partners, identify risks and opportunities, close and evaluate a phase or project and also engage with the executive or sponsor and higher management to gain commitment and to manage interests and expectations. Although all these competency elements are prime for the successful execution of projects, some of these were ranked low. Over all, it was realized that, respondents had competences in most of the competence indicators except for a few who had little or no competence in those elements. This could be because they were not being engaged to perform those activities on the project or the firm.

Table4.3.A People Competences of Respondents

People Competences			
P1Self-reflection and self-management	Mean	Std.	Ranking
Take responsibility for personal learning and development	3.714	1.131	1 st
Personal motivations to stay focused and set personal objectives	3.429	1.421	$2^{\rm nd}$
Organize personal work depending on the situation and own resources	3.429	1.072	3 rd
Build self-confidence based on personal strengths and weaknesses	3.238	1.027	4 th
Ways in which own values and experiences affect the work	3.136	1.213	5 th
P2Personal integrity and reliability			
Take responsibility for own decisions and actions	3.905	1.104	1 st
Acknowledge and apply ethical values to all decisions and actions	3.738	1.142	2 nd
Complete tasks thoroughly in order to build confidence with others	3.69	1.113	$3^{\rm rd}$
Act, make choices and interact consistently	3.643	0.976	4 th
Promote the sustainability of outputs and outcomes	3.429	1.213	5 th
P3Personal communication			
Employ humor and sense of perspective when appropriate	3.476	1.107	1 st
Provide clear and structured information to others and verify their understanding	3.476	0.959	2 nd
Communicate effectively with virtual teams	3.429	0.861	3rd
Facilitate and promote open communication	3.333	1.124	4 th
Choose communication styles and channels to satisfy the requirements of the public, environment and level of leadership	3.333	1.034	5th

4.4 People Competences

This section also sought to examine the people competences of the respondents. To doing this, the respondents were asked to rate their people competences based on the cognitive processes of Bloom's Taxonomy of Learning. Over all, a project manager's ability to understand, demonstrate, remember and apply learned skills are very crucial

to the success of the project. This is because the technical skills learned on the job or in school about the subject (Project Management).

Table 4.4.B People Competences of Respondents

Table 4.4.B People Competences of	Respondents		
P4Relations and engagement			
Show trust and respect by enabling others to communicate their views and issues	3.738	1.027	1 st
Demonstrate empathy through listening, understanding and support	3.571	1.211	2 nd
Share your own vision and objectives to achieve other people's dedication and engagement	3.571	0.976	3 rd
Initiate and develop personal and professional relations	3.429	1.201	4 th
Build, facilitate and contribute to social networks	3.19	0.861	5 th
P5Leadership			
Provide guidance, coaching and mentoring for people and teams to guide and enhance their job	3.595	1.211	1 st
Take ownership and show commitment	3.595	1.072	2 nd
Initiate action and proactively offer help and advice	3.548	1.162	3 rd
Make, enforce and review decisions	3.476	1.211	4 th
Exert appropriate power and influence over others to achieve the goals	3.429	1.037	5 th
P6Teamwork			
Promote cooperation and networking between team members	3.595	1.121	1 st
Empower teams by delegating tasks and responsibilities	3.595	1.172	2 nd
Select and build the team	3.5	0.987	3 rd
Support, facilitate and review the development of the team and its members	3.381	1.056	4 th
Recognize errors to facilitate learning from mistakes	3.357	0.967	5 th

Table 4.5.C People Competences of Respondents

spondents		
3.238	1.154	1st
3.214	1.045	2 nd
3.143	0.954	3 rd
3.071	1.212	4 th
3.595	1.026	1 st
3.429	1.139	2 nd
3.405	1.021	3 rd
3.381	1.062	4 th
3.31	1.214	5 th
3.619	1.052	1 st
3.476	1.171	2 nd
3.429	1.029	3 rd
3.357	1.142	4 th
3.167	1.181	5 th
3.595	1.226	1 st
3.548	1.109	2 nd
3.333	1.041	3 rd
3.286	1.031	4 th
3.119	0.962	5 th
	3.238 3.214 3.143 3.071 3.595 3.429 3.405 3.381 3.31 3.619 3.476 3.429 3.357 3.167 3.595 3.548 3.333 3.286	3.238 1.154 3.214 1.045 3.143 0.954 3.071 1.212 3.595 1.026 3.429 1.139 3.405 1.021 3.381 1.062 3.31 1.214 3.619 1.052 3.476 1.171 3.429 1.029 3.357 1.142 3.167 1.181 3.595 1.226 3.548 1.109 3.333 1.041 3.286 1.031

From Table 4.3.A to 4.3.C. above, it was realized that respondents had high competence in taking responsibility for personal learning and development, taking responsibility for own decisions and actions, showing Trust and respect by encouraging others to share their views or concerns, by providing guidance, coaching and mentoring to guide and improve the work of individuals and teams, by anticipating and possibly preventing conflicts and crises, by using creative techniques to find alternatives and solutions, by developing and evaluating options and alternatives that can meet the needs of all parties, and most importantly deliver results and get acceptance; therefore ranking these skills first (1st). Respondents then followed on to rank these elements as **second** (2nd) on their people skills:- Personal motivations for setting personal goals and focusing, recognizing and applying ethical values to all decisions and actions, providing clear and structured information and verifying their understanding, employ humor and sense of perspective when appropriate, demonstrate empathy through listening, understanding and support, take ownership and show commitment, empower teams by delegating tasks and responsibilities, find the causes and consequences of conflicts and crises and select appropriate response(s), Promoting a holistic view of the project and its context in order to improve decisionmaking, defining a negotiating strategy in line with its own objectives that is acceptable to all parties involved and creating and maintaining a healthy, safe and productive working environment.

On the **third**(3rd) ranking, Respondents organized personal work depending on the situation and on their own resources, completed tasks thoroughly to build trust with others, communicated effectively with virtual teams, shared their own vision and goals in order to gain engagement and commitment from others, initiated action and

proactively offered assistance and advice, selected and established teams, as well as mediating to resolve conflicts.

It should be stated that, some of the competency elements were ranked low as respondents had little or no competency in such skills. The reason for this could he that, they have not been exposed to such opportunities on the job.

4.5 Discussion of Results

Based on the aim to explore the competence level of project managers in Ghana, the competence factors were assessed on two main elements which are the Practice competency elements and the People competency elements. In all, there were a total of 108 independently described competences and attitudes deemed to be important for project managers to possess in order to conduct projects successfully. From the practice elements, these outstanding abilities were rated high by the respondents since they could identify more with these abilities -"select and review the overall project management approach, project stakeholder needs and requirements, decide on schedule and stage approach, implementing, monitoring and maintaining the project organization, verify the accomplishment of project quality goals and advise any corrective or preventive measures needed, establish the project budget, assess the use of resources and take all needed corrective measures, monitor contract execution, address problems and seek redress if needed, report on project progress, evaluate and monitor risks, opportunities and implemented responses, develop and sustain a communication strategy and plan for stakeholders and developing change or transformation strategy". On the aspect of the people competency skills, respondents identified mostly with "taking responsibility for personal learning and development,

taking responsibility for own decisions and actions, show trust and respect by enabling others to communicate their views and issues, provide guidance, coaching and mentoring for people and teams to guide and enhance their job, promote cooperation and networking between team members, anticipate and possibly prevent conflicts and crises, creative techniques to find alternatives and solutions, develop and evaluate options and alternatives with the potential to meet the needs of all parties and most importantly deliver results and get acceptance. It is necessary to note that, all the competency elements are very much needed for project managers to excel in their profession as project managers as well as helping organizations to achieve project and organizational objectives.

CHAPTER FIVE

FINDINGS, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

This chapter desires to recap the findings of the study based on the results relating to the objectives in order to draw conclusion and make recommendations for industry practice and further research based on the objectives of the study, which are to identify the level of project management competency of project managers and to identify the factors that influence the level of project management competence.

5.2.1 Practice Competency of Respondents and Summary of Key Findings

Research Objective One: To identify the level of project management technical competency of project manager.

The first objective of this research is to identify the competency level of project managers in relation to their technical skills. To attain this objective, the Bloom's Taxonomy of Learning was used to build a list of competency elements to assess the competency level of the respondents. These elements which were used as the questionnaire have been presented in Table 4.4.1 above.

It can be observed from the table that most of the respondents are averagely competent with their strengths being shown in their ability to plan and control and report on project progress, lessons learned from and with other projects, gather requirements and meet project stakeholder needs and requirements and also implement, monitor and maintain the organization of the project, select and review the overall project management approach, prioritize and decide on requirements and acceptance criteria. From the view of senior management, project executives must

have leadership skills to ensure efficient management during the project design stage (Ahadzie et al, 2014). This requires management to be better competent in the execution of projects to enhance customer satisfaction. Problem solving competency ensures that a leader identifies and analyzes issues, weighs data significance and precision, creates and evaluates alternative approaches and make suggestions (Ahmed, 2017).

5.2.2 People Competency of Respondents and Key Findings

Research Objective Two: To identify the level of project management behavioral competency of project managers.

Relative to the second research objective is identifying the behavioral competency level of project managers in terms of their people skills. The people competency elements were factored in the questionnaire for respondents to assess themselves which can be seen in the table above. It can then be seen that, respondents are able to self-reflection and self-management, take private learning and development responsibilities, recognition and apply ethical principles to all choices and actions, apply personal integrity and reliability, take responsibility for their own choices and actions and demonstrate trust and regard by encouraging others to communicate their views or issues, develop and assess options and alternatives that are capable of meeting the requirements of all sides, generate and sustain a healthy, secure and productive working atmosphere, and produce outcomes and achieve recognition. The research shows that, the people competences required of the project managers in Ghana are very necessary for the success of project execution. It was also observed that, people with much working and project experience have a greater level of competence and could perform better than those with less working or project experience. The implication is that, project managers especially upcoming ones should endeavor to learn more skills from senior managers on the job vice-versa, senior managers with much competence should mentor the younger project managers. Project managers with less experience should take every opportunity available on the job to equip them; this could be in the form of on the job training and other forms of training that may be applicable to those involved. As stated by Prabhakar, Relationship-oriented project executives offered more effective projects and greater project chances of achievement (Prabhakar, 2005). It was noticed that, successful project managers do have a high level of confidence as they have had the opportunity to identify their strengths and weaknesses and they have used this knowledge to enhance their performance on the job. It was also discovered that, project managers with less competence are not fully engaged in the execution of project activities in their work places; this therefore justified the reason for some respondents stating that they had none or little competence in the respective competence. Another main finding was that project managers' private characteristics and project management attitudes are very crucial to the achievement of the project (Ahmed, 2017).

5.3 Conclusion

This exploratory research attempted to assess project managers 'level of competence in Ghana. The study revealed that project managers who have been on the job for a long time have a lot of skill than those who have been on the job for a couple more years. Project manager's technical and people skills play a vital role in the success or failure of the project. Against this background, project managers, project team, project stakeholders and aspiring project managers are encouraged to acquire knowledgeable in project management practices as well as knowledge in people skills in order to enhance project success in Ghana.

5.4 Recommendations

- Since people skills are needed for project success, it is recommended that, everyone practicing project management should make a conscious effort to develop their people competences to enhance project success.
- More of research study should be conducted in other aspects of the Ghanaian working environment. This is because research work done so far have centered on the construction industry though project management covers all working industries in Ghana.
- Highly competent project managers should endeavor to inculcate their skills into managers with less project management competence in order to continually create a cycle of competent project managers in Ghana which will lead to successful project being delivered in Ghana.
- Project managers with less competence should be engaged more on the job to perform project related activities in order to enhance their competences.
- Every member in the organization should be project management conscious in order to enhance cooperation in the successful execution of projects thereby bringing growth to the organization.
- Recommendation will be made to other investigators to explore the topic above on a wider population in other to enhance the competency of project managers in Ghana.

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APPENDIX 1: SURVEY QUESTIONNAIRE

KWAME NKRUMAH UNIVERSITY OF SCIENCE AND TECHNOLOGY, DEPARTMENT OF CONSTRUCTION TECHNOLOGY & MANAGEMENT, GHANA.

QUESTIONNAIRE

Introduction:

I am a researcher pursing MSc. Project Management at the Kwame Nkrumah University of Science and Technology, Kumasi. This research questionnaire has been designed to solicit your view on the topic: "Assessing the Competence Level of Project Managers in Ghana".

The aim of the study is to explore project management competencies of project managers in Ghana.

All information provided is strictly for academic purpose and shall be kept confidential.

In case of any clarifications, questions or contribution, I can be contacted on 0208560212 or email phphyl3@gmail.com. I appreciate your time spent in completing this questionnaire.

PART I: DEMOGRAPHICS

Please tick (the appropriate box
1. What	is you gender?
Female []	Male []

2. Which age range do you fall within?

25 – 30 [] 31 – 40 [] 41 – 50 [] 51 - 60 [] 61 and above []
3. What industry do you work in? Construction [] Banking/Financial Sector [] Information Technology [] Mining [] Agriculture [] Healthcare [] Oil and Gas [] Others Please specify
4. What is your role on the project/firm? Employer/Director [] Senior executive [] Middle-level executive [] Project manager/team leader [
Program/project officer [] Project team member [
Assistant project manager [] Others (please kindly specify
5. How long have you been in your present position? Less than 2 years $[]$
6. How many years of project experience do you have? Less than 2 years [] 2-5 years [] 6 - 10 years [] 11-15 years [] 16-20 years [] Over 20 years []
COMPETENCE RATING SCALE: The rating scale is based on the cognitive processes of Bloom's Taxonomy of Learning
Kindly indicate the level that best describes your competency using the underlisted rating (1-6) with regards to the indicators 0 - None; no or little exposure to the Element or Key Competence Indicator. 1 - Remember: exhibit memory of learned materials by recalling facts, terms and basic concepts
2 – Understand: Demonstrate understanding of facts and ideas by organizing, comparing, interpreting 3 – Can Apply; Use acquired knowledge to solve problems in new situations by applying the knowledge, rules and facts
4 – Can Analyze: Examine and break information into parts by identifying motives or causes, make inferences and find evidence to support generalizations 5 - Evaluate: Present and defend opinions by making judgements based on criteria and standards.
6 Create: Put elements together to form a coherent whole; Develop something novel or new.

Example P1.1 The indicator is: ways in which own values and experience affect work

The competence level could be **4** which means the individual has gone beyond the level of applying to being able to *identify causes and make inferences* regarding how his values affect work

1. PEOPLE COMPETI	ENCES						
P1.1 Self-reflection	0	1	2	3	4	5	6
and self-management							
1 Ways in which own							
values and experiences							
affect the work							
2 Build self-confidence							
on the basis of personal							
strengths and							
weaknesses							
3 Personal motivations							
to set personal goals							
and keep focus							
4 Organize personal							
work depending on the							
situation and own							
resources							
5 Take responsibility							
for personal learning							
and development							
P1.2 Personal							
integrity and reliability							
,							
1 Acknowledge and apply ethical values to							
all decisions and							
actions and							
2 Promote the							
sustainability of							
outputs and outcomes							
3 Take responsibility							
for own decisions and							
actions							
4 Act, take decisions							
and communicate in a							
consistent way							
5 Complete tasks							
thoroughly in order to							
build confidence with							
others							
P1.3 Personal							
communication							
1 Provide clear and							
structured information							
to others and verify							
their understanding							

				•		•	,
2 Facilitate and							
promote open							
communication							
3 Choose							
communication styles							
and channels to meet							
the needs of the							
audience, situation and							
management level							
4 Communicate							
effectively with virtual							
teams							
5 Employ humor and							
sense of perspective							
when appropriate							
P1.4 Relations and							
engagement							
1 Initiate and develop							
personal and							
professional relations							
2 Build, facilitate and							
networks							
3 Demonstrate							
empathy through							
listening,							
understanding and							
support							
4 Show confidence and							
respect by encouraging							
others to share their							
opinions or concerns							
5 Share own vision and							
goals in order to gain							
the engagement and							
commitment of others							
	0	1	2	3	4	5	6
P1.5 Leadership	U	1	4	3	4	3	0
1 Initiate action and							
proactively offer help							
and advice							
2 Take ownership and							
show commitment							
3 Provide direction,							
coaching and							
mentoring to guide and							
improve the work of							
individuals and teams							
4 Exert appropriate							
power and influence							
power and influence				<u> </u>		l	

	1		1		
over others to achieve					
the goals					
5 Make, enforce and					
review decisions					
P1.6 Teamwork					
1 Select and build the					
team					
2 Promote cooperation					
and networking					
between team members					
3 Support, facilitate					
and review the					
development of the					
team and its members					
4 Empower teams by					
delegating tasks and					
responsibilities					
5 Recognize errors to					
facilitate learning from					
mistakes					
P1.7 Conflict and					
crisis					
1 Anticipate and					
possibly prevent					
conflicts and crises					
2 Find the causes and					
consequences of					
conflicts and crises and					
select appropriate					
response(s)					
3 Mediate and resolve					
conflicts and crises					
and/or their impact					
4 Share learning from					
conflicts and crises in					
order to improve future					
practice					
P1.8 Resourcefulness					
1 Stimulate and support					
an open and creative					
environment					
2 Conceptual thinking					
to define situations and					
strategies					
3 Analytic techniques					
to analyzing situations,					
financial and					
organizational data and					
trends					
uchus		<u> </u>		<u> </u>	

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4 Creative techniques							
to find alternatives and							
solutions							
5 Promote a holistic							
view of the project and							
its context to improve							
decision-making							
P1.9 Negotiation							
1 The interests of all							
parties involved in the							
negotiation							
2 Develop and evaluate							
options and							
alternatives with the							
potential to meet the							
needs of all parties							
3 Define a negotiation							
strategy in line with							
own objectives that is							
acceptable to all parties							
involved							
4 Reach negotiated							
agreements with other							
parties that are in line							
with own objectives							
5 Detect and exploit							
additional selling and							
acquisition possibilities							
P1.10 Results							
orientation							
1 Review all decisions							
and actions against							
their impact on project							
success and the							
objectives of the							
organization							
2 Balance needs and							
means to optimize							
outcomes and success							
3 Create and maintain a		·					
healthy, safe and							
productive working							
environment							
4 Promote and 'sell' the							
project, its processes							
and outcomes							
5 Deliver results and							
get acceptance							
2. PRACTICE COMPI	ETENCES						

1 Acknowledge, priorities and review success criteria				
2 Lessons learned from and with other projects				
3 Determine complexity and its consequences for the approach				
4 Select and review the overall project management approach				

P2.1 Project design	0	1	2	3	4	5	6
5 Design the project							
execution architecture							
P2.2 Requirements							
and objectives							
1 Define and develop							
the project goal							
hierarchy							
2 Project stakeholder							
needs and							
requirements							
3 Priorities and decide							
on requirements and							
acceptance criteria							
P2.3 Scope							
1 Define the project							
deliverables							
2 Structure the project							
scope							
3 Define the work							
packages of the project							
4 Establish and							
maintain scope							
configuration P2.4 Time							
1 Define the activities							
required to deliver the							
project 2 Determine the work							
effort and duration of							
activities							
3 Decide on schedule							
and stage approach							
4 Sequence project							
activities and create a							
schedule							
5 Monitor progress							
against the schedule							
and make any							
necessary adjustments							
P2.5 Organization							
and information							
1 Assess and determine							
the needs of							
stakeholders relating to							
information and							
documentation							
2 Define the structure,							
roles and							

responsibilities within the project				
3 Establish				
infrastructure,				
processes and systems				
for information flow				
4 Implement, monitor				
and maintain the				
organization of the				
project				
P2.6 Quality				
1 Develop, monitor the				
implementation of, and				
revise a quality				
management plan for				
the project				
2 Review the project				
and its deliverables to				
ensure that they				
continue to meet the				
requirements of the				
quality management				
plan				
3 Verify the				
achievement of project				
quality objectives and recommend any				
recommend any necessary corrective				
and/or preventive				
actions				
4 Plan and organize the				
validation of project				
outcomes Ensure				
quality throughout the				
project				
P2.7 Finance				
1 Estimate project				
costs				
2 Establish the project				
budget				
3 Secure project				
funding				
4 Develop, establish				
and maintain a				
financial management				
and reporting system				
for the project				
5 Monitor project				
financials in order to				
identify and correct				

deviations from the							
project plan							
P2.8 Resources	0	1	2	3	4	5	6
1 Develop strategic							
resource plan to deliver							
the project							
2 Define the quality							
and quantity of							
resources required							
3 Identify the potential							
sources of resources							
and negotiate their							
acquisition							
4 Allocate and							
distribute resources							
according to defined							
need							
5 Evaluate resource							
usage and take any							
necessary corrective							
actions							
P2.9 Procurement							
1 Agree on							
procurement needs,							
options and processes							
2 Contribute to the							
evaluation and							
selection of suppliers							
and partners							
3 Contribute to the							
negotiation and							
agreement of							
contractual terms and							
conditions that meet							
project objectives							
4 Supervise the							
execution of contracts,							
address issues and seek							
redress where							
necessary							
P2.10 Plan and							
control							
1 Start the project and							
develop and get							
agreement on the							
project management							
plan							
2 Initiate and manage							
the transition to a new							
project phase							
project pride					i	l	

	1	1	1		
3 Control project					
performance against					
the project plan and					
take any necessary					
remedial actions					
4 Report on project					
progress					
5 Assess, get					
agreement on, and					
implement project					
changes					
6 Close and evaluate a					
phase or the project					
P2.11 Risk and					
opportunity					
1 Develop and					
implement a risk					
management					
framework					
2 Identify risks and					
opportunities					
3 Assess the					
probability and impact					
of risks and					
opportunities					
4 Select strategies and					
implement response					
plans to address risks					
and opportunities					
5 Evaluate and monitor					
risks, opportunities and					
implemented responses					
P2.12 Stakeholders					
1 Identify stakeholders					
and analyses their					
interests and influence					
2 Develop and				-	
maintain a stakeholder					
strategy and					
communication plan					
3 Engage with the					
executive, sponsors					
and higher					
management to gain					
commitment and to					
manage interests and					
expectations					
4 Engage with users,					
partners and suppliers					
to gain their		ĺ			

cooperation and commitment 5 Organize and maintain networks and alliances			
P2.13 Change and transformation			
1 Assess the adaptability to change of the organization(s)			
2 Identify change requirements and transformation opportunities			
3 Develop change or transformation strategy			
4 Implement change or transformation management strategy			