UNIVERSIDAD PARA LA COOPERACION INTERNACIONAL
(UCI)

Development of a Project Management Office Proposal for the Ministry of Agriculture

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FINAL GRADUATION PROJECT SUBMITTED IN PARTIAL FULFILLMENT OF
THE REQUIREMENTS FOR THE
MASTER IN PROJECT MANAGEMENT (MPM) DEGREE

Belmopan City, Belize

July, 2018

UNIVERSIDAD PARA LA COOPERACION INTERNACIONAL
(UCI)

This Final Graduation Project was approved by the University as partial fulfillment of the requirements to opt for the Master in Project Management (MPM) Degree

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DEDICATION

This research project is dedicated to my child for being my motivation to continue to strive for excellence. I would also like to dedicate this research to my wife for being my support during these past months. Lastly, to my family and friends who have encouraged me to pursue my goals and never give up.

ACKNOWLEDGMENTS

I would like to thank my tutor Dr. Carlos Colón, for guiding me through this research and providing the necessary feedback that needed for me to complete this Proposal. I am also grateful for Angela Herrera and Gabriela Zuniga for providing their invaluable support throughout the courses.

I am grateful to all of the lecturers that enhanced my knowledge and influenced my professional growth during the Master's in Project Management programme.

Last, but not least, I would like to thank God, for giving me the health and strength to commence and complete this MPM Programme.

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ABBREVIATIONS AND ACRONYMS

- CEO – Chief Executive Officer
- CMMI – Capability Management Model Integration
- EU – European Union
- FGP – Final Graduation Project
- MAFFESDI –Ministry of Agriculture, Fisheries, Forestry, the Environment, Sustainable Development & Immigration
- MOA – Ministry of Agriculture
- PMBOK – Project Management Body of Knowledge
- PEU – Project Execution Unit
- PMI – Project Management Institute
- PMO – Project Management Office
- WBS – Work Breakdown Structure

EXECUTIVE SUMMARY (ABSTRACT)

This study will enhance the Ministry of Agriculture's project management abilities, which will ensure the success rate of the projects by reducing potential risks. In order to establish a Project Management Office (PMO) for the Ministry there had to be an assessment made of the maturity level of the Ministry. This assessment was conducted using various tools such as a questionnaire and interviews. It also included the identification of the most suitable PMO type for the Ministry. Its weakness comes from poor project management practices, lack of standardized project documentation and templates, and the lack of a roadmap as it relates to project management. The results to be achieved will increase efficiency and effectiveness as it relates to project, program and portfolio management.

The general objective for this project was to develop a Project Management Office proposal for the Ministry of Agriculture to identify a potential solution to improve its project management framework and strenghten its institutional capacity. The specific objectives were: to assess the project management practices and maturity level of the Ministry of Agriculture in order to determine the project management strenghts, improvement opportunities and needs; to analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture; to establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.

The methodologies that were used for this research were largely for the acquisition of knowledge and data. They were conducted based on physical interaction along with review of literatures utilizing both primary & secondary sources of information. Three methods of research were used to acquire the information necessary, which were analytical, survey & observational method. The analytical and survey methods were used to collect the data necessary for the assessment of the Ministry of Agriculture's Maturity level and to analyze the different types of PMOs. The observation method was used during the implementation of project activities to get a better idea of the Ministry's current project management practices. The tools identified and applied during this research were interviews, questionnaires, expert judgment, observational analysis, and an adopted Capability Maturity Model Integration (CMMI) assessment along with other analytical tools.

A project management maturity assessment was conducted utilizing a questionnaire tailored for the Ministry of Agriculture. The results were tabulated to capture strengths and weaknesses of the organization as it relates to project management. The assessment identified strengths in the project management knowledge areas of cost, communication and procurement management. The weak areas that were identified were in the areas of time, risk and quality management. Based on the data collected it was further concluded that the overall maturity assessment result for the Ministry of Agriculture was a level 2. The

maturity assessment result which places the Ministry of Agriculture at a Level 2 Maturity indicates that they would benefit from a Project Management Office to control and manage their programs and projects. It was noted that the current structure in place was insufficient to effectively manage these programs and projects. However, a level two maturity does indicate that there are some systems and structures in place that would need little adjustments to improve performance.

Three basic types of PMOs were analyzed during this research. Based on the results the most suitable PMO that is being recommended for the Ministry of Agriculture is the Controlling type of PMO. The roles and responsibilities of the controlling PMO for the Ministry were categorized as Establishing Project Methodologies, Project Tracking, and Project Support. The positioning of the PMO within the organizational structure was seen as key to the success of any future program or project. Due to the roles and responsibilities which it would have and the current maturity level of 2, it was recommended that the PMO be situated in an isolated position reporting directly to the Chief Executive Officer.

The research identified strengths and weaknesses in various knowledge areas. One of the recommendations is to conduct a project management maturity assessment every three (3) years to update the level of the Ministry's maturity level. Another recommendation is to establish a performance appraisal system in order to conduct timely and thorough reviews of the PMO's performance. To encourage feedback and continued improvement to the PMO and the roles and responsibility assigned it is recommended to establish a committee consisting of key senior managers to review and approve prior to implementation. To encourage feedback and continued improvement to the PMO and the roles and responsibility assigned a third recommendation is to establish a committee consisting of key senior managers to review and approve prior to implementation. Lastly, a recommendation relating to stakeholder management was seen as vital. It is recommended that a forum is established during the implementation phase of the Project Management Office to encourage continuous feedback and input from stakeholders.

1. INTRODUCTION

1.1 Background

Belize is not an ordinary emerging country. Its Gross National Income per capita, at around $8000.00, places it second highest in the Central American Region and allows the World Bank to classify it as an “Upper Middle-Income Country” (Country Profile, 2017). Agriculture continues to be the bedrock of the economy of Belize in the form of food security, employment, and foreign exchange earnings. However, for Belize to continue achieving prosperity in Agriculture, greater efforts and investments must be made in the modernization of the Agriculture and Food Sector to become more competitive. Despite it being classified, as an “Upper Middle-Income Country” and having such an impressive statistic, there are high levels of national debt; persistently negative balance of payments; wildly fluctuating economic growth rates and high levels of poverty, it still receives financing in the form of grants, loans and donations from various financial institutions.

The Government of Belize has been receiving funding from the European Union (EU), Inter-American Development Bank (IDB), Republic of China (ROC), and United Nations Development Programme (UNDP) among others. These international organizations have been supporting agriculture related projects for many years and continue to fund programmes. The country receives financing to implement programmes and projects that assist key Government Ministries in achieving their objectives. One key Government Ministry is the Ministry of Agriculture (MOA) due to its contribution to revenues derived from exports.

The Ministry of Agriculute is a public sector institution whose mandate is to engender a conducive environment for the development of an Agriculture and Food Sector that is competitive, diversified and sustainable, enhances food security and nutrition, and contributes to the achievement of the socio-economic development goals of Belize. The organizational setup is a hierarchical organization type with the Minister of Agriculture being at its apex. The organization also consists of statutory bodies, which rely heavily on the

government support. The Ministry focuses on five pillars such as: (1) Production, Productivity and Competitiveness Enhancement, (2) Market development, access and penetration, (3) Food Security & Nutrition and Rural Livelihoods, (4) Sustainable Agriculture & Risk Management and (5) Governance. The Ministry of Agriculture has one strategic objective, which is 'Contribute to the overall GDP growth and national household incomes and growth in export earnings.' (Government of Belize, 2016)

In order to achieve their strategic objective, they rely heavily on programme and project financing from international donors. Due to the increasing number of projects, which the Ministry began to undertake and monitor, they decided to establish a Project Execution Unit (PEU) in 2009 to assist with the implementation. The PEU's responsibilities at the onset were effective and efficient management of programs and projects with focus on monitoring and evaluation. The PEU began with one technical officer in its initial stages and as the workload began to increase so did the staff. At the time there was one major program being implemented which had to do with the Sugar Programme funded by the European Union. Since then the PEU has evolved and is responsible for national and externally funded projects. Their mandate now includes formulation, implementation, coordination, monitoring and procurement, which is far beyond their capacity to manage with the current system in place.

1.2 Statement of the problem

The Ministry of Agriculture recognized that there were communication gaps and lack of formalized standards & documentation, which triggered inefficiencies in programme and project management. Due to an increase in agriculture related projects the Ministry formally established a Project Execution Unit (PEU) in 2009. Due to the establishment being solely for the EU funded programme, there was no comprehensive and finalized Terms of Reference for the Unit when it was established. The lack of this document alone caused most of the inefficiencies and brought about problems later on for the reason being that it did not have clearly described roles and responsibilities of the staff assigned to

the PEU. In my opinion, the Ministry is currently operating in an inefficient manner due to the lack of clearly defined project management practices. Formulation to approval may take from several months to several years depending on funding agency, availability of reliable information/data etc.

The Ministry has to be fully engaged in project design and formulation and sometimes blames funding agencies for poor project design. However, lack of voluntary involvement causes the results to differ from what is expected. Many times, planning on the part of the Ministry is done without comprehensive consultations, which causes their focus to deviate from the Ministry's strategic goals and objectives. Additionally, the MOA centers their attention on a rapid solution and sometimes does not ensure project sustainability after external funding expires. One of the problems is that the Ministry has not developed a comprehensive strategy for increasing agricultural production and productivity as mandated by the Growth and Sustainability Development Strategy for Belize (Government of Belize, 2016).

The assistance provided by the International donor agencies is utilized to strengthen coordination and collaboration among partners and amongst ministry departments and units. There is a need for additional staff, which is necessary in order to obtain the desired results and impact of the projects being implemented. These agencies expect for experienced personnel to be acquired in order to speed up procurement and effectively manage the activities. Howeve,; the lack of training that is provided to the staff does not increase the capacities of these key personnel. Lastly, there is a need for the improvement of project documentation to collect data, analyze and report to key stakeholders of every programme that is to be implemented.

1.3 Purpose

The ultimate purpose for undergoing this study is to develop a Project Management Office Proposal for the Ministry of Agriculture aligned to its overall objective. It will additionally assess the maturity level of the Ministry as it relates to project management. This assessment will create value to its stakeholders

by providing an in-depth look at the organization's current strengths and needs and will give a better idea at improving opportunities.

This study will also identify the most suitable type of PMO for the Ministry of Agriculture. One major benefit will be to increase the effectiveness of project management and the success rate of projects implemented.

1.4 General objective

To develop a comprehensive solution for the Ministry of Agriculture to improve their Project Management framework and strenghten its institutional capacity.

1.5 Specific objectives

1. To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs.
2. To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture.
3. To establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.

2. THEORETICAL FRAMEWORK

2.1 Company/Enterprise framework

2.1.1 Company/Enterprise background

The Ministry of Agriculture's portfolio and responsibility is one of the biggest within the Government of Belize. It plays a key role in revenue earnings through exports and it contributes to food security of Belize. Agriculture is one of Belize's primary industries as it relates to the production of traditional and non-traditional crops. It is a great contributor to Belize's economy and has accounted for millions of dollars in exports.

The Ministry focuses on increasing the productivity and livelihoods of those who make up the agriculture sector. The decision has been made for it to become a standalone Ministry once again due to its wide-ranging thematic areas. It will officially change from being the MAFFESDI to the MOA in the first quarter of 2018.

2.1.2 Mission and vision statements

Vision:

An Agriculture and Food sector that is innovative, competitive, diversified and sustainable.

Mission:

To continue as the economic pillar of Belize, ensuring food security, generating income and foreign exchange, creating employment, and conserving natural resources, in order to grow the economy, reduce poverty and empower the local population for sustainable development.

2.1.3 Organizational structure

Describe the company/enterprise organizational structure. It might be helpful to use a Figure.

This element can be related to the areas or the organization, which might be impacted by the Final Graduation Project (FGP).

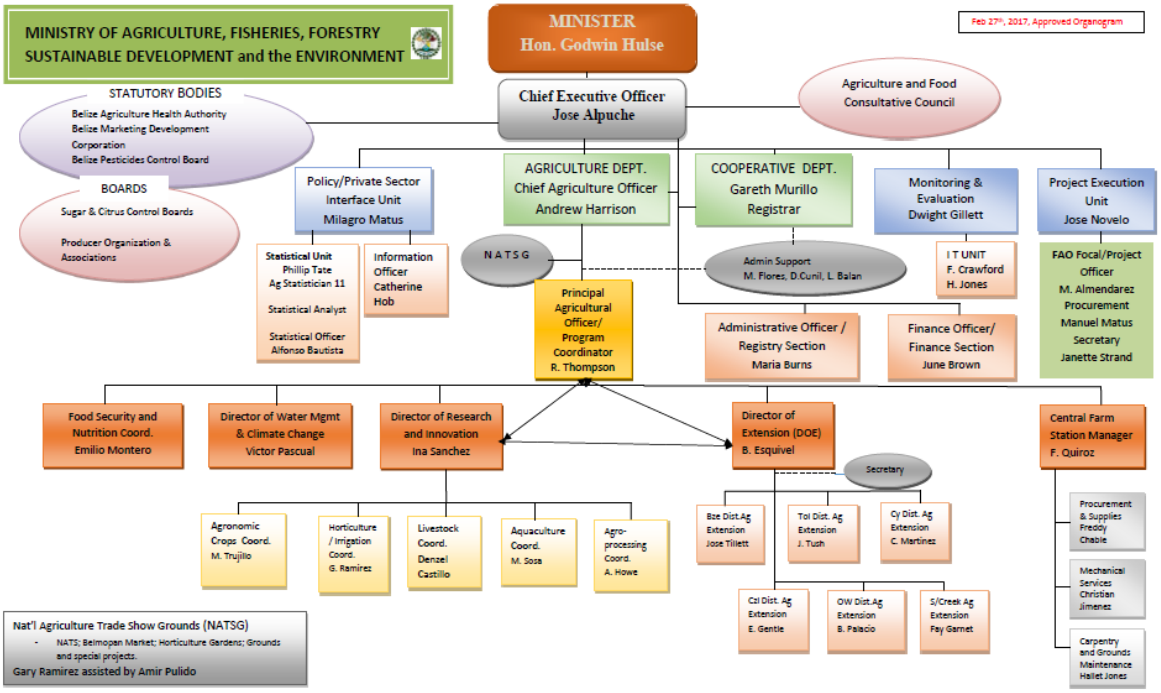


Figure 1 Organizational structure (Ministry of Agriculture Archives, 2017)

2.1.4 Products offered

The Ministry of Agriculture offers a wide array of Agriculture Services free of charge to the General Populace of Belize. These services are in the form of Technical Advice, Technological Transfer and Adaptive Research & Development for the agriculture community. Support to Producers and Enterprises for Development, Promotion of Agricultural Health, Strengthening of Agriculture Commodities. The Objective of this research is to strenghten the Ministry of Agriculture's institutional capacity along with enhancing the efficient and effective

management of projects. The outputs as a result of the activites will develop roles, management practices & procedures, tools and techniques that will ensure that the Ministry successfully implements their mandate to their many stakeholders.

2.2 Project Management concepts

Project management as defined by the Project Management Institute is the application of knowledge, skills, tools, and techniques to project activities to meet the project requirements.

Relevant concepts as may be applicable to this research are outlined below:

2.2.1 Project

A project is defined as a “temporary endeavour undertaken to create a unique product, service, or result. (Project Management Institute, 2016). The Project Management Office Proposal that will be undertaken in this case is the project. It is unique for the reason being that it is in development for the Ministry of Agriculture. This endeavour will have a date of commencement and a date of completion, which will end with the creation of the product.

When acquiring the necessary data there will be collaborative effort from stakeholders that will aid in the achievement of one common goal. The PMO Proposal will have limited time and resources allocated for the execution of the activities. These interrelated activities play a vital role in achieving the specific objectives and the overall general objective.

2.2.2 Project management

Project management administers the entire project from start to finish. It is a discipline that utilizes established guidelines, policies and procedures. This discipline has been in use for thousands of years but was not formally recognized until the 1950’s and has been adopted ever since by many organizations and

institutions. Those institutions have modified and tailored the definition to their needs.

In developing the Project Management Office Proposal for the Ministry of Agriculture, it will adhere to the Project management discipline. According to PMI, “project management is the application of knowledge, skills, tools, and techniques to project activities to meet the project requirements” (Project Management Institute, 2016). It will make use of knowledge from various stakeholders and will apply various tools and techniques in order to acquire the necessary feedback from its stakeholders. These knowledge, skills, tools and techniques will then apply to the various tasks that will be necessary to achieve the completion of the PMO Proposal.

2.2.3 Project life cycle

A project life cycle is a “series of phases that a project passes through from its initiation to its closure” (Project Management Institute, 2016). It is a standard four-step process that managers use to ensure project effectives. A life cycle shows how the project moves from start to finish in different phases. Project life cycle is vital to every project team and plays a key role in delivering successful and quality projects to the stakeholders.

The generic life cycle of a project is:

1. Initiating Phase
2. Planning Phase
3. Executing Phase
4. Closing Phase

During the Initiation phase, the project is to be conceptualized. This marks the start of the project, which then moves into the Planning Phase where a formal set of plans and goals are established. It then moves into the third phase known as the Executing phase where all the work is to happen. The established tasks and activities set out will be to achieve as the objectives are already set out during the

planning phase. Lastly, Closing Phase comes at the end of the cycle when the project is completed.

The Ministry of Agriculture unknowingly utilizes the standard project life cycle when administering projects. It is not formalized and standardized, which is what the establishment of the PMO Proposal will address.

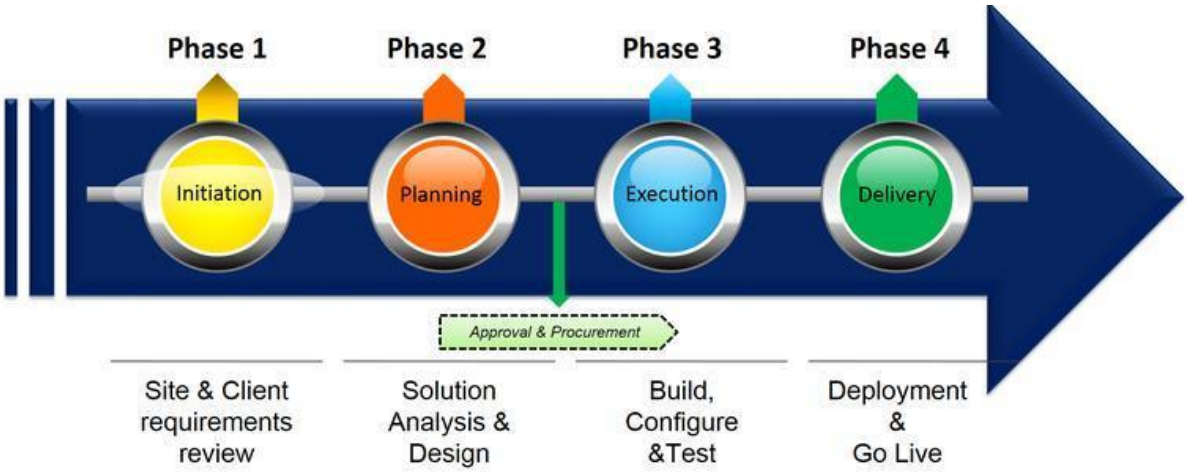


Figure 2. Project Life Cycle (Krishna H. S., 2017)

2.2.4 Project management processes

The *PMBOK® Guide* defines a process as "a set of interrelated actions and activities performed to create a pre-specified product, service or result." There are 47 logically grouped project management processes that are grouped into five process groups. The PMBOK Guide (2013) identifies five process groups, which are initiating, Planning, Executing, Monitoring & Controlling and Closing. The project management processes interact throughout the life cycle of the project with ten project management knowledge areas. The Process Groups are different from the phases of a project life cycle despite them having similar categories. Within one phase, you might go through all the Process Groups or you might only apply some of them depending on the scope and complexity of the project.

Due to the nature of this project, there may not be use for all the project management processes. In developing the Project Management Office Proposal,

the processes involved will be based on project management best practices. The design will be in such a way that it can be applicable to different projects.

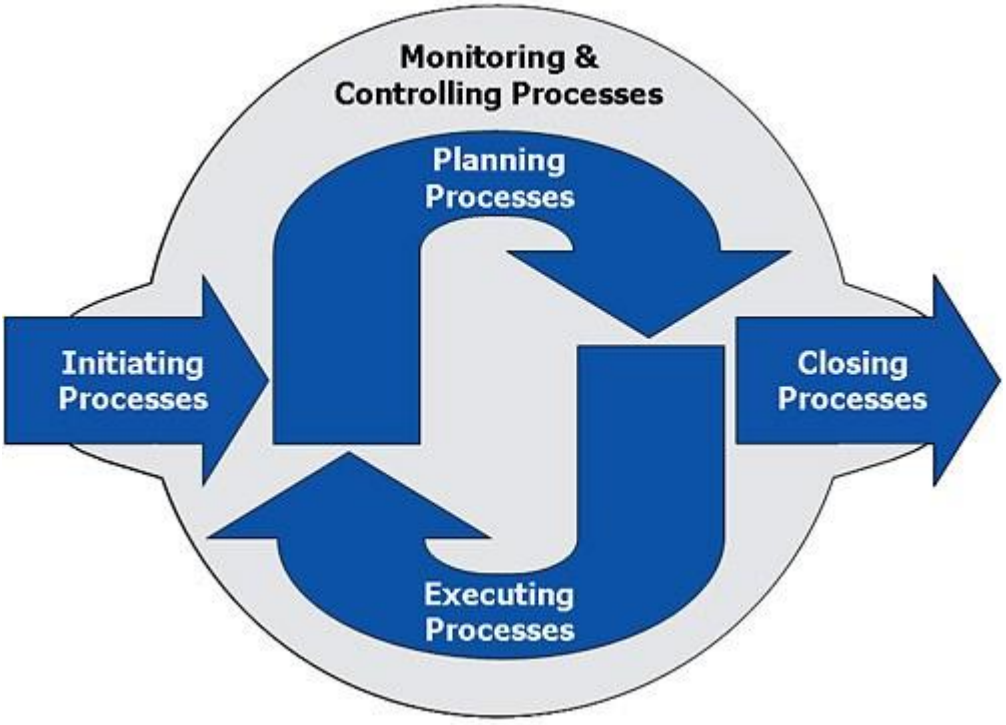


Figure 3 Project Management Processes (Nelson A. T., 2014)

2.2.5 Project management knowledge areas

Developing the Project Management Office Proposal will require the application of project management knowledge areas. A knowledge area is a complete set of concepts, terms and activities that make up a professional field or area of specialization. The project management knowledge areas that are applicable to the development of the project management office proposal for the Ministry of Agriculture are:

2.2.5.1 Project Integration Management

Project integration management is one of the ten knowledge areas and is vital for project success for it coordinates all aspects of a project. It covers all the phases

from start to the finish. According to the PMBOK Guide “Project Integration Management includes the processes and activities to identify, define, combine, unify, and coordinate the various processes and project management activities within the Project Management Process Groups” (Project Management Institute, 2013).

2.2.5.2 Project Scope Management

Project Scope Management is the knowledge area that “includes the processes required to ensure that the project includes all the work required, and only the work required, to complete the project successfully” (Project Management Institute, 2013). This knowledge area deals with the processes required to identify the work required in order to achieve the project’s deliverables.

2.2.5.3 Time Management

Project time management is to determine the time necessary to complete the deliverables of the Final Graduation Project. It is an essential knowledge area for it guides the pace as to the implementation of activities schedule.

2.2.5.4 Cost Management

“Project Cost Management includes the processes involved in planning, estimating, budgeting, financing, funding, managing, and controlling costs so that the project can be completed within the approved budget” (Project Management Institute, 2013). This knowledge area will ensure that the Final Graduation Project is complete within the allocated and approved budget.

2.2.5.5 Quality Management

This knowledge area focuses on the quality of the products and results of the project. PMBOK Guide defines this knowledge are as “Project Quality Management includes the processes and activities of the performing organization that determine quality policies, objectives, and responsibilities so that the project will satisfy the needs for which it was undertaken” (Project Management Institute, 2013). In

achieving these processes, it will ensure that the FGP is of the best possible quality.

2.2.5.6 Human Resource Management

This knowledge area highlights the organizing, managing and controlling of the team necessary for the effective completion of the project. One person is conducting this project therefore, there will be no need to acquire, develop or manage a team.

2.2.5.7 Communication Management

“Project Communications Management includes the processes that are required to ensure a timely and appropriate planning, collection, creation, distribution, storage, retrieval, management, control, monitoring, and the ultimate disposition of project information” (Project Management Institute, 2013). This is another very important knowledge area for it identifies stakeholders and clarifies any queries that may be impactful to the success of the project.

2.2.5.8 Risk Management

In this knowledge area there will be identification, managing and controlling of both negative and positive project risks. The will be a plan and analysis of the identified risks along with the development of a response plan, which will be to ensure that threats will reduce and opportunities taken advantage of.

2.2.5.9 Stakeholder Management

A stakeholder is a person, group or organization who may be directly or indirectly affected or perceive themselves to be affected by the project’s results. Here the identified stakeholders will be assessed and managed to ensure that the outcome meets their expectations. This ensures that the stakeholders with high influence will constantly received updates of the project and at the same time being satisfied.

2.3 Other Theories/Project Management office (PMO).

What is a PMO? It is the area in which certain functions (also called services) relating to project management are centered, and its objective is to help the organization achieve better results through projects. (Pinto A., 2012)

It is a unit or department in an organization that improves the implementation of projects by establishing templates, best practices and standardized processes with a focus on increasing effectiveness and improving efficiency of project management.

2.3.1 Types of Project Management Offices:

Reiling J (n.d) defines the three basic types of PMOs. They include:

Supportive PMO

The Supportive PMO generally provides support in the form of on-demand expertise, templates, best practices, access to information and expertise on other projects, and the like.

Controlling PMO

In organizations where there is a desire to "rein in" the activities, processes, procedures, documentation, and more - a controlling PMO can accomplish that. Not only does the organization provide support, but it also requires that the support be used. Requirements might include adoption of specific methodologies, templates, forms, conformance to governance, and application of other PMO controlled sets of rules

Directive PMO

This type goes beyond control and actually "takes over" the projects by providing the project management experience and resources to manage the project This is effective in larger organizations that often matrix out support in various areas, and where this setup would fit the culture.

2.3.2 Project Management Maturity

Project management maturity refers to the progressive development of an enterprise-wide project management approach, methodology, strategy, and decision-making process. The appropriate level of maturity will vary for each organization based on its specific goals, strategies, resource capabilities, scope, and needs. (Crawford J.K., 2007)

There are many Project Management Maturity Models used by organizations.
Some that may be of assistance in assessing the Ministry of Agriculture's Maturity level are:

2.3.2.1 Portfolio, Programme & Project Management Maturity Model (P3M3):

The P3M3 helps organizations address fundamental aspects of managing portfolios, programmes and projects. It improves the likelihood of a quality result and successful outcome and reduces the likelihood of risks affecting projects adversely. The organization ensures that the defined processes are up to date as necessary, and improvements are developed and implemented in accordance with a sound business case and development plan. Roles and responsibilities for carrying out all programme and project-related activities are clear throughout the organization.

It is structured with five levels of maturity within this model, which are:

- Level 1 - initial process
- Level 2 - repeatable process
- Level 3 - defined process
- Level 4 - managed process
- Level 5 - optimized process

2.3.2.2 Capability Maturity Model Integration (CMMI):

The Capability Maturity Model Integration (CMMI) is a process level improvement training and appraisal program. It was developed at Carnegie Mellon University (CMU) who claims that CMMI can be used to guide process improvement across a project, division, or an entire organization. The CMMI follows the same maturity level as the P3M3. Those Maturity levels are as follows:

1. **Initial:** Processes are unpredictable, poorly controlled and reactive
2. **Managed**: Processes are characterized for projects and are often reactive
3. **Defined:** Processes are characterized for the organization and are proactive
4. **Quantitatively managed**: Processes are measured and controlled
5. **Optimizing:** Focus on process improvement

CMMI Models: Extracted from (Greneir L., 2007)

- Guide process improvement efforts and help organizations establish and achieve improvement goals.
- Provide a common language for cross-organizational communication and benchmarking.
- Provide an integrating, organizing framework for organizational endeavors.
- Help an organization understand what specific practices to perform, how to improve its capability in performing those practices, and what process areas to focus on next. (Greneir L., 2007)

2.3.2.3 Organizational Project Management Maturity Model (OPM3):

The Project Management Institute (PMI) developed the Organizational Project Management Maturity Model (OPM3). OPM3 is the alignment of an organization's projects to its strategic goals. Specifically, this standard defines a methodology for implementing and improving OPM. It comprises a five-step iterative cycle that emphasizes assessment and continuous improvement. (Matassa P., 2006) There

must be buy in from senior management of the organization that is being assessed.

The model is implemented through a three-phase process:

1. Knowledge - Acquiring an understanding of the model and its implementation
2. Assessment - Comparing the current OPM infrastructure to a robust OPM infrastructure
3. Improvement - Determining which changes are feasible at the current time and implementing the noted changes.

This maturity model benefits organizations by ensuring efficient use of resources and provides savings when it eliminates projects that are not a part of the strategic objectives. PMI states that one major benefit of the OPM3 is that it provides leverage the organization's project management infrastructure investment to advance its strategic goals. Another key benefit is that it enhances the ability to assess OPM through access to Best Practices information. Lastly, it indicates that OP3M provides a roadmap for prioritizing and planning future improvements in Organizational Project Management

3. METHODOLOGICAL FRAMEWORK

3.1 Information sources

An information source is any system producing information or containing information intended for transmission; in information science, the conventional designation for scholarly documents or publications, which serve not only as important sources but also as the means of transmission of information in space and time. (Information Source. n.d.)

3.1.1 Primary sources

Primary sources are the original documents of an event or discovery such as results of research, experiments or surveys, interviews, letters, diaries, legal documents, and scientific journal articles. Primary sources are also records of events as they are first described. These might be videotapes, audio recordings or eyewitness news reports. (Information Sources. n.d.)

Primary sources that will be in use for this FGP will be interviews with the Project Staff along with stakeholders and upper management personnel of the Ministry. In addition, minutes and notes of meetings of Senior Managers meetings will also be useful.

3.1.2 Secondary sources

Secondary sources offer an analysis or a restatement of an event or discovery described in primary sources. They interpret, explain or summarize primary sources. Some secondary sources are used to persuade the reader. Secondary sources may be considered less objective. Examples of secondary sources include dictionaries, encyclopedias, textbooks, articles and editorials that interpret or review research works. (Identifying Information Sources, n.d.)

Examples of secondary sources will be the PMBOK Guide, fifth edition, 2013, Ministry of Agriculture's Registry, The World Wide Web, Project Reports & Templates and Presentations on Project Management Units/Offices.

Chart 1 Information sources

Objectives	**Information sources**	
	Primary	**Secondary**
To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs	Organizational Structure Public Service Regulations	Project Management Institute tools and techniques Website Articles & Documents related to Project Management Maturity.
To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture	Interviews with the programme coordinator/director of projects, monitoring officer and key project staff and stakeholders.	Website research on PMO's, Project Management Papers & templates.
To establish the roles and responsibilities to be assigned to the PMO as well as its location on the	Interviews with the Chief Executive Officer & Programme Coordinator/Director	Project Management websites, PM books, PMBOK, Ministry of Agriculture's Registry, The World Wide Web, Project Reports, Presentations on project

hierarchy on the Ministry of Agriculture's organizational management structure.	of Projects.	management and Project Management Units/Offices

3.2 Research Methods

The Business Dictionary defines Research Methods as "the process used to collect information and data for the purpose of making business decisions. The methodology may include publication research, interviews, surveys and other research techniques, and could include both present and historical information." While conducting this research the methods used were Literature reviews, Analytical, Survey and Observational research methods.

3.2.1 Analytical Method

Analytical research describes and interprets the past or recent past from selected sources. The sources may be documents preserved in collections, and/or participants' oral testimonies (oral histories). (McMillian, J. and Schumacher, S. 2001)

3.2.2 Survey Method

In survey method research, participants answer questions administered through interviews or questionnaires. (Hale J. 2011)

3.2.3 Observational Method

With the observational method (sometimes referred to as field observation) animal and human behavior is closely observed. (Hale J., 2011)

Chart 2 Research Methods

Objectives	Research methods		
	Analytical Method	Survey Method	Observational Method
To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs	This method was used to assess the current maturity status of the Ministry of Agriculture. Organizational Project Management Maturity Model standards were used to assess the organization's maturity level.	This method will be applied by acquiring the necessary information to assess the current maturity level of the organization.	
To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture	Under this objective, the analytical method was used to analyze the PMO types along with the roles & responsibilities, project management practices and objectives of the	This method was used to get feedback from key senior managers in order to gather the appropriate characteristics of a PMO suitable for the Ministry of Agriculture.	

	Ministry in an effort to establish the most suitable PMO.		
To establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.	This particular method helped with the reviews of past project management literature and documents with respect to similar project management structures in order to establish functions and responsibilities of the proposed PMO	This method was used to gather feedback from Upper Management & their strategic team to be able to identify the location of the PMO within the organizational structure.	

3.3 Tools

- A research tool is an instrument or a means of collecting information used by researchers to measure what they are studying.
- The tools used in this final graduation project are interviews, questionnaires, meetings, expert judgment, scheduling tools, observational analysis, analytical techniques, and OPM3

Chart 3 Tools

Objectives	Tools
To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs	Organizational Project Management Maturity Model
To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture	Interviews, Meetings & Expert Judgment, direct observations.
To establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.	Interviews, Meetings, Questionnaires, Assessments.

3.4 Assumptions and constraints

According to PMBOK Guide, an assumption is "A factor in the planning process that is considered to be true, real, or certain, without proof or demonstration," and a constraint is "a limiting factor that affects the execution of a project, program, portfolio, or process."

The assumptions of this FGP are:

1. The time allowed for completion of the PMO Proposal is sufficient.

2. A formalized Project Management Office will be effective in increasing the success rate of implemented projects.
3. The selected PMO Type recommended will be appropriate and effective for the Ministry of Agriculture.
4. The development process of the PMO Proposal will be cost effective.
5. Stakeholders will be forthcoming with data and information.

The Constraints of this FGP are:

1. Current Workload of the staff may affect the data collection.
2. There may be delays due to involuntary stakeholder involvement and negative influence
3. Implementation period is too short to modify and correct defects should they arise.
4. Scope of the project was too large to cover all areas necessary for the development of a comprehensive proposal.

Chart 4 Assumptions and constraints

Objectives	**Assumptions**	**Constraints**
To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs	A formalized Project Management Office will be effective in increasing the success rate of implemented projects.	There may be delays due to involuntary stakeholder involvement and negative influence Scope of the project was too large to cover all areas necessary for the development of a comprehensive proposal.
To analyze the different PMO types in order to establish the	The selected PMO Type recommended will	Current Workload of the staff may affect the data collection.

Objectives	Assumptions	Constraints
most suitable PMO for the Ministry of Agriculture	be appropriate and effective for the Ministry of Agriculture.	There may be delays due to involuntary stakeholder involvement and negative influence
To establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.	The selected PMO Type recommended will be appropriate and effective for the Ministry of Agriculture. Stakeholders will be forthcoming with data and information.	Current Workload of the staff may affect the data collection. There may be delays due to involuntary stakeholder involvement and negative influence

3.5 Deliverables

The PMBOK Guide defines deliverables as "Any unique and verifiable product, result, or capability to perform a service that is required to be produced to complete a process, phase, or project." (PMBOK Guide, 2013)

The deliverables of this project are:

- An assessment report of the maturity level of the Ministry of Agriculture.
- A Report detailing the roles and responsibilities assigned to the suitable PMO for the Ministry of Agriculture.
- A Comprehensive Report of the roles, responsibilities & location of the PMO on the Ministry of Agriculture's organizational management structure.
- A Comprehensive Report of the appropriate methodology, tools, techniques and templates.

Chart 5 Deliverables

Objectives	Deliverables
To assess the project management practices and maturity level of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs	An assessment report of the maturity level of the Ministry of Agriculture's.
To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture	Report detailing the roles and responsibilities assigned to the suitable PMO for the Ministry of Agriculture.
To establish the roles and responsibilities to be assigned to the PMO as well as its location on the hierarchy on the Ministry of Agriculture's organizational management structure.	A Comprehensive Report of the roles, responsibilities & location of the PMO on the Ministry of Agriculture's organizational management structure.

4. RESULTS

The method used to for this research was a questionnaire that was developed and set out using Organization Project Management Maturity Model methodology to assess the maturity level of the Ministry of Agriculture. The model used in conducting this assessment was adopted from the Capability Maturity Model Integration (CMMI). Questions were developed based on the ten knowledge areas of the PMBOK Guide Fifth Edition and each question relates to the forty-seven processes that fall below those ten knowledge areas.

There were forty-three questions developed each having to do with one process of each of the Knowledge Areas. In order to evaluate and score each question the

five maturity levels found in the staged representation of the CMMI model was utilized. Those maturity levels were numbered 1 through 5 where the respondents would select the appropriate maturity level best fitted for each question. The maturity level that respective question represented would be the score which would then be tallied and averaged by Project Management Knowledge Area.

The five maturity levels as adopted by CMMI are:

Level 1: Initial

At maturity level 1, processes are usually ad hoc and chaotic.

Level 2: Managed

At maturity level 2, an organization has achieved all the **specific** and **generic goals** of the maturity level 2 process areas. In other words, the projects of the organization have ensured that requirements are managed and that processes are planned, performed, measured, and controlled.

Level 3: Defined

At maturity level 3, an organization has achieved all the **specific** and **generic goals** of the process areas assigned to maturity levels 2 and 3.

At maturity level 3, processes are well characterized and understood, and are described in standards, procedures, tools, and methods.

Level 4: Qualitatively Managed

At maturity level 4, an organization has achieved all the **specific goals** of the process areas assigned to maturity levels 2, 3, and 4 and the **generic goals** assigned to maturity levels 2 and 3.

At maturity level 4 Sub processes are selected that significantly contribute to overall process performance. These selected sub processes are controlled using statistical and other quantitative techniques.

Level 5: Optimizing

At maturity level 5, an organization has achieved all the **specific goals** of the process areas assigned to maturity levels 2, 3, 4, and 5 and the **generic goals** assigned to maturity levels 2 and 3.

Processes are continually improved based on a quantitative understanding of the common causes of variation inherent in processes.

Maturity level 5 focuses on continually improving process performance through both incremental and innovative technological improvements.

A selection of ten (10) key senior managers was selected to undertake the survey. There was also a consultation with middle managers most of who implement agriculture related projects. There was quite a bit of feedback provided by the respondents and participants. The data was analyzed and the following maturity assessment results were obtained.

4.1. Assessment of the Maturity of Ministry of Agriculture

In order for any organization to be effective, their senior managers must be willing to support initiatives for change. This applies to organizations that feel their systems are being inefficient and are not satisfying the business needs. In order to know where an organization stands there must be an assessment of the status of the organizations maturity level. In this particular case the senior managers of the Ministry of Agriculture were the intended participants in order for a comprehensive assessment to take place.

There was a brief verbal presentation made to the Chief Executive Officer and Program Coordinator of the Ministry as it relates to the lack of a Project Management Office and the benefits that can be derived from creating one. The initial response was that of enthusiasm and support to perform a maturity assessment for the Ministry. Other senior managers, technical staff and project personnel quickly welcomed this research topic mostly due to the need for organizational improvements. This assessment would provide a clear picture of the Ministry’s current state and would identify weaknesses in its current structure and

systems. In determining the strengths, the Ministry of Agriculture would be able to better develop a roadmap for organizational improvement and change where necessary.

The methodology presented was the adopted CMMI, which was agreed upon by the upper management. They agreed to be interviewed based on the questions developed to gather data about the Ministry's current project management practices. The staff selected for the interviews was as follows:

1. Mr. Jose Novelo: Program Coordinator
2. Mr. Andrew Harrison: Chief Agriculture Officer
3. Mr. Belarmino Esquivel: Chief Extension Officer
4. Mr. Ricardo Thompson: Principal Agriculture Officer
5. Mr. Dwight Gillet: Monitoring Officer
6. Ms. Milagro Matus: Policy Analyst
7. Dr. Victoriano Pascual: Director Water Management
8. Ms. Melissa Almendarez: Project Officer
9. Mr. Jose Alpuche: Chief Executive Officer
10. Mr. Gareth Murillo: Registrar of Cooperatives

The aforementioned staff was carefully selected for they are all senior managers, are the strategic team for the Ministry and all have experience in planning or executing project activities within their departments.

The Process

As previously mentioned, this process was a merger of the Ten Project Management Knowledge Areas along with the CMMI.

Ten Knowledge Areas:

1. Project Integration Management
2. Project Scope Management
3. Project Time Management
4. Project Cost Management
5. Project Quality Management
6. Project Human Resource Management

7. Project Communications Management
8. Project Risk Management
9. Project Procurement Management
10. Project Stakeholder Management

The Knowledge Areas were further broken down in to processes at which point a question was developed to determine the appropriate maturity level of each. The approach was to have each senior manager select the maturity level, for every question, they believe is applicable to the Ministry. The result from the interview was then summed up where an average was derived for each knowledge area using the developed Project Management Maturity Model Template as shown in Figure 1.

Figure 4: Organizational Project Management Maturity Model Template

Project Management Maturity Model	Level 1 Initial	Level 2 Managed	Level 3 Defined	Level 4 Qualitatively Managed	Level 5 Optimizing	Score (1-5)
Project Integration Management						1.75
Project Scope Management						1.75
Project Time Management						1.125
Project Cost Management						3.2
Project Quality Management						1
Project Human Resource Management						2
Project Communications Management						2.83
Project Risk Management						1.42
Project Procurement Management						3.67
Project Stakeholder Management						1.75
TOTAL (Average)						2.05

4.2. Analysis of the different types of PMO

In order to analyze the different Project Management Office (PMO) types much research had to be undertaken. The method used to conduct this analysis was literature review. Information sources utilized were the PMBOK, Project Management Institute documents along with other Project Management related documents and articles. Based on information gathered it was determined that there are three (3) basic types of Project Management Offices. These three basic types of PMO are categorized as: Supportive PMO, Controlling PMO and Directive PMO.

4.2.1. Supportive PMO

The Supportive PMO generally provides support in the form of on-demand expertise, templates, best practices, access to information and expertise on other projects, and the like. This can work in an organization where projects are done successfully in a loosely controlled manner and where additional control is deemed unnecessary. Also, if the objective is to have a sort of "clearing-house" of project management information across the enterprise to be used freely by project managers, then the Supportive PMO is the right type.

4.2.2. Controlling PMO

In organizations where there is a desire to "rein in" the activities, processes, procedures, documentation, and more - a controlling PMO can accomplish that. Not only does the organization provide support, but it also requires that the support be used. Requirements might include adoption of specific methodologies, templates, forms, conformance to governance, and application of other PMO controlled sets of rules. In addition, project offices might need to pass regular reviews by the controlling PMO, and this may represent a risk factor on the project. This works if a) there is a clear case that compliance with project management organization offerings will bring improvements in the organization and how it executes on projects, and b) the PMO has sufficient executive support to stand behind the controls the PMO puts in place.

4.2.3. Directive PMO

This type goes beyond control and actually "takes over" the projects by providing the project management experience and resources to manage the project. As organizations undertake projects, professional project managers from the PMO are assigned to the projects. This injects a great deal of professionalism into the projects, and, since each of the project managers originates and reports back to the directive PMO, it guarantees a high level of consistency of practice across all projects. This is effective in larger organizations that often matrix out support in various areas, and where this setup would fit the culture.

There are various types of Project Management Offices and selecting the appropriate type plays a crucial role within organizations. The best type is dependent on the specific organization, systems, size and culture. In selecting the right PMO provides many benefits such as having a standardized methodology, introduction of effective processes and increase project success within organizations.

The Ministry of Agriculture is an organization that has been established for decades; however, it still operates inefficiently at times and does not always achieve its objectives as planned. The Ministry is regulated by procedures and templates that are not updated on a regular basis. This causes a setback when the Ministry is implementing projects especially due to untrained staff, poor documentation and processes, inadequate templates or inconsistent and outdated procedures. This clearly demonstrates that the Ministry would benefit from having an established PMO.

The Ministry executes and monitors locally and internationally funded projects on a regular basis. This requires strict compliance with local financial regulations and with stringent funding agencies. Based on the feedback received it was determined that the Ministry requires a Controlling PMO in order for it to be as effective as possible. This moderate control is necessary for it would provide a unified

framework. The existing templates, methods and processes of implementing projects need to be formalized and standardized.

The feedback received on all questions regarding tools, standards and documents were all at maturity level 2 and 3. This demonstrates that the organization is at a medium maturity level and in many cases a lower level. The Ministry lacks formalized documents for time management, there is no training for project staff, there are no tools currently in place to manage quality, etc. These and more are reasons that causes the Ministry's inefficiencies when implementing projects which then creates delays or budget overruns during Project execution.

The Questionnaire was broken down in an effort to capture all the project management processes. This break down played a key role in the maturity assessment and in the selection of the most appropriate PMO necessary for the Ministry of Agriculture. A few strengths were discovered along the way; however, there were weaker areas that needed addressing.

The current system in place has a few processes and tools being utilized which may need modifications. It also has forms and a few formalized documents that may be outdated or may lack key features that is necessary to increase efficiency when preparing. In combining the scores, it was seen that a majority of the questions were at a maximum of a maturity level of three. Many of the questions came back at maturity level one and two with only a few at maturity level 4. These results clearly demonstrate that the Ministry is not ready for a high control type of PMO. Despite the Ministry being in existence for so long, it still has to mature considerably as it relates to Project management thus the ruling out of a Directive PMO was clear. The staffing, processes, tools and methodology currently in place, although poor, indicates that the Ministry has something in place, which only requires moderate controls and adjustments in order to improve and standardize the overall

The Controlling PMO was seen to be the best fit for the Ministry of Agriculture. This was determined through observations of its daily operations along with the results of the maturity assessment. There are some areas where it would be recommended for a Supporting PMO type would be needed, however, with little training, the necessary adjustments and more support from upper management these would be optimized. In having a dedicated trained team with a formalized structure and standardized processes there would be lacking the controls and governance that upper management desires. Senior management made it clear that they desire the PMO to set rules that other departments would need to follow since many Ministry staff are involved in the day-to-day planning, execution or monitoring of project activities. In having the established governance and best practices there would be a more effective execution of activities.

The objectives of this PMO that is to be recommended for the Ministry of Agriculture would be to:

1. Implement a common methodology
2. Standardize terminology
3. Introduce effective repeatable project management processes
4. Provide common supporting tools
5. Ultimately, the objective is to improve levels of project success within the organization

These objectives must be satisfied for the Ministry of Agriculture to function as one cohesive unit when implementing projects.

FIGURE 5: SUMMARY OF MATURITY LEVEL ASSESSMENT

	Maturity Level 1 (1 – 1.99)	Maturity Level 2 (2 – 2.99)	Maturity Level 3 (3 – 3.99)	Maturity Level 4 (4 – 4.99)	Maturity Level 5 (5)
Knowledge Area					
Integration	1.75				
Scope	1.75				
Time	1.125				
Cost			3.2		
Quality	1				
Human Resource		2			
Communication		2.83			
Risk	1.42				
Procurement			3.67		
Stakeholder	1.75				
OVERALL LEVEL		**2.0495**			

Chart 6: Ministry of Agriculture Maturity Assessment Level

PMO Types	Description	Ministry of Agriculture	Maturity Level
Supporting	Expertise Templates Best Practices Access to Information		1-2
Controlling	Adoption of Methodologies Conformance to Governance	Establish best practices Establish Processes, Templates and Standards to follow	2-3
Directive	Resources are directly managed.		4-5

Chart 7: Types of PMOs & Level of Control

PMO Type	Level of Control	Organization Size Fit
Supporting	Low Level of Control	Small & Medium Organizations
Controlling	Medium Level of Control	Small & Medium Organizations
Directive	High Level of Control	Large Organizations

4.3. Roles and Responsibilities assigned to Ministry of Agriculture's PMO

A Project Management Office defines standards for projects within an organization. It is a structure used to standardize processes and reduce duplication or repetition during Project implementation. The key role of a PMO is to maintain process standards by establishing a framework for performance along with a formalized set of guidelines and tools to be utilized

The three key areas are:

- Establishing Project Methodologies
- Project Tracking, and
- Project Support

<u>Establishing Project Methodologies</u>

Establishing project methodologies is one of the major roles of a PMO. This role is crucial in setting out the stage for what is to be implemented. It takes into consideration the size of the project along with the resources and methodologies necessary to implement the project. It is a road map for project implementation.

Project/Program Charter

This provides an overall vision of the project/program goals and objectives to all stakeholders. The project charter can follow the template below:

CHART8: PROJECT CHARTER TEMPLATE

PROJECT CHARTER	
Date	Project Name:
Knowledge Areas / Processes	Applicacion Area (Sector / Activity)
Start date	Finish date
Project Objectives (general and specific)	
Project purpose or justification (merit and expected results)	
Description of Product or Service to be generated by the Project – Project final deliverables	
Assumptions	
Constraints	
Risks	
Budget	
Milestone & Schedule	
Background Information	
Stakeholders	
Project Manager (Prepared By):	Signature:
Authorized By:	Signature

Work Plan

This provides detailed schedules of activities, milestones, and deliverables of the project to the team. It also identifies the resources available. A Project Management Plan Template (Appendix 7) can also be elaborated to encompass all activities and areas that must be addressed.

Governance Plan

This identifies the roles and responsibilities of each member of the team. The Governance Plan can be guided by the template below:

Chart 9: Governance Plan Template

GOVERNANCE PLAN TEMPLATE (PROJECT NAME)							
Goal	Stakeholder Category	Priority	Person Responsible	Role/ Responsibility	Action Plan	Communication Technology	Comments/ Status

Work Breakdown Structure

This defines the specific deliverables due from each team member, at each stage of the project.

Communication Plan

This establishes the guidelines, protocol, and methods to communicate project information and issues among members of the team and other stakeholders. The Communication Plan can be guided by the template below:

CHART10: COMMUNICATION PLAN TEMPLATE

COMMUNICATION PLAN TEMPLATE (PROJECT NAME)					
Information Type	Person Responsible	Communication Method	Communication Technology	Time & Frequency	Comments

Forms & Templates

This simplifies communication, record keeping and reporting. Forms such as monitoring & evaluation form (Appendix 5), quarter plans (Appendix 6), procurement plan, project budget, risk register, risk management template, project scheduling, financial report template and lesson learned template.

CHART 11: LESSON LEARNED TEMPLATE

LESSON LEARNED TEMPLATE (PROJECT NAME)								
Knowledge Area	Issue Category	# of Findings	Experience	Impact & Recurrence	Lesson Learned	Best Practice/ Lesson Learned	Action Required	Comments/ Status

CHART 12: QUALITY MANAGEMENT PLAN TEMPLATE

QUALITY MANAGEMENT PLAN TEMPLATE	
Project Title	
Date Prepared	
Quality Roles	Quality Responsibilities
1	1
2	2
3	3
Quality Assurance Plan (Include activities, metrics and tools)	
Quality Control Plan (Include reviews and audit plans)	
Quality Improvements Plan (Corrective Action Plan)	

CHART13: HUMAN RESOURCE MANAGEMENT PLAN TEMPLATE

HUMAN RESOURCE MANAGEMENT PLAN TEMPLATE		
Project Title		
Date Prepared		
Roles, Responsibilities and Authority		
ROLE	AUTHORITY	RESPONSIBILITY
1	1	1
2	2	2
3	3	3
ORGANIZATIONAL STRUCTURE		

Risk Analysis

This lists out potential problems and chances of deviance, the probability of those problems occurring, the possible impact, and potential solutions or mitigation strategies to those problems. Risk Management Plan can be guided by the template below:

CHART14: RISK MANAGEMENT PLAN TEMPLATE

RISK MANAGEMENT PLAN TEMPLATE								
Risk	Probability	Impact	Score/Level	Control/ Mitigation Strategy	Owner	Frequency	Early Warning Signs	Comments/ Status

Project Tracking

Tracking of project activities is very important and key to project success. PMO Roles and Responsibilities also include continuous monitoring and tracking of ongoing projects at regular intervals to ensure projects are on course and follow the approved implementation plan. At the onset of the project the established indicators and milestones will be measure to the deliverables.

The PMO for the Ministry of Agriculture is to track its projects in a three-step cycle:

Step 1: Collecting Program Status Information:

This would include an updated cycle of work plans, issues and changes, collected from project managers/coordinators at routine intervals

Step 2: Consolidation and analysis of the data collected from program status information

This would include the analysis of data and then comparing the results with established baselines and communicating the status to the senior managers for their review and immediate action.

Step 3: Implementing Corrective Action

This will be decided by the senior management through the process of change management. Recommended guide for such changes can be found in the template below:

CHART15: CHANGE MANAGEMENT PLAN TEMPLATE

CHANGE MANAGEMENT PLAN TEMPALTE			
Project Name			
Requested By:		Date:	
Request No:		Request Name/Type:	
Change Description			
Change Reason			
Impact of Change			
Proposed Action			
Status	In Review	Approved	Rejected
Approval Date:			
Approved By:			

Project Support

Apart from defining, maintaining, and managing the project processes, the PMO roles and responsibilities include providing support for the smooth execution of the project.

- The PMO provides a centralized customer focused office that not only plan, negotiate and analyze projects, but also redress the project related concerns of the client, sponsor, and staff;
- The PMO develops a team of competent project managers through training and mentoring. Such project managers ensure implementation and maintenance of the project methodology and retain the team members' focus on the tasks in hand;
- The PMO provides training in project management and the applied project tools to team members;
- The PMO provides in-house consultancy services to the project team on project related issues.

Chart 16: PMO Roles & Responsibilities Chart

No.	Responsibility	Role	Owner	Creator	Approver
1	Establishing Project Methodologies				
	Create Project Charter	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Create Work Plan	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Governance Plans	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Work Breakdown Structure	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Create Communication Plan	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Create Forms & Templates	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer

	Prepare Risk Analysis	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
2	Project Tracking				
	Collecting Project Status Information	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Consolidation & Analysis of data	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Implementation of Corrective Action	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
3	Project Support				
	Provides a centralized customer focused office	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer
	Develops a team of competent project managers	Program Coordinator	PMO	Program Coordinator	Chief Executive Officer

4.3.1 Location on the hierarchy on Ministry of Agriculture's organizational management structure

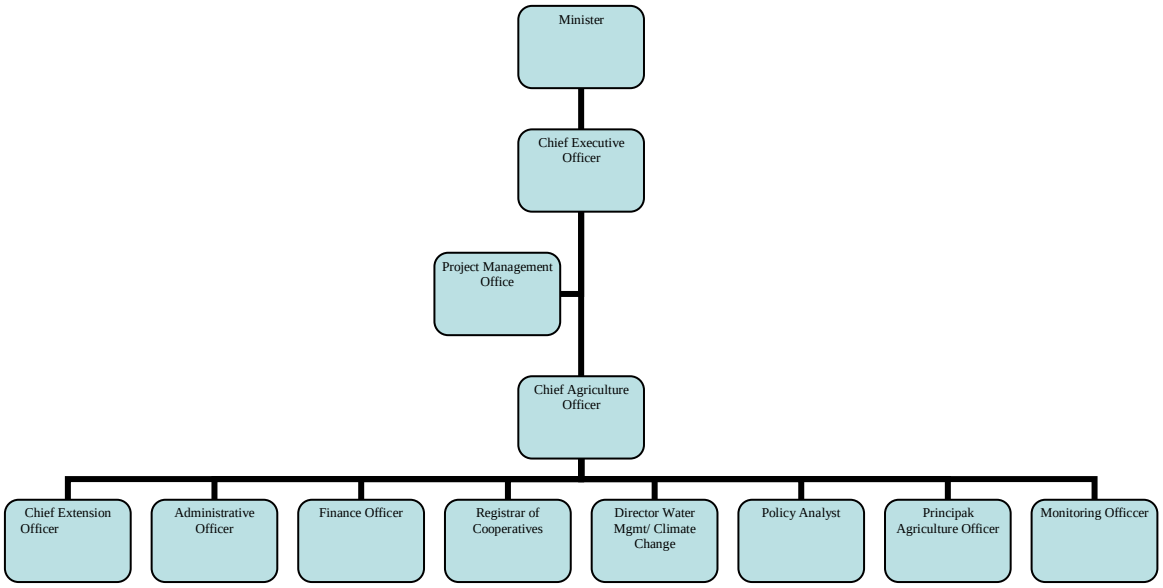
A Project Management Office (also called PMO), is an office or department within an organization that defines and maintains standards for project management within the organization. The Project Management Office provides guidance and introduces economies of repetitions in the execution of projects. (Khan B., 2016) One major role a PMO plays in any organization is strategic planning and governance.

This role is one of the most important functions and is applicable to the Ministry of Agriculture. In order to change and create new systems, tools, processes and formalized documents the PMO must have support from senior management. The key senior manager who needs to be consulted and has to give prior approval to any change within the Ministry is the Chief Executive Officer. The PMO must be involved in the setting of the strategic goals for the Ministry and align Project implementation with those goals. The PMO also advises the CEO on outcomes

and deliverables that could possibly affect the Ministry at which point opportunities can be seized.

To ensure sustainability and improvements in the project management maturity of the Ministry the position, of PMO, on the hierarchy of its management structure plays a key role. Based on the results of the project management maturity assessment conducted and after careful analysis of the feedback obtained the best location is identified as it being directly below the CEO. The PMO that was deemed to be most suitable was the controlling type of PMO. This controlling PMO would be an independent department reporting directly to Chief Executive Officer with full authority over all Programs and Projects.

Figure 6 : Proposed PMO Location on the Organizational Structure



5. CONCLUSIONS

A project management maturity assessment was conducted utilizing a questionnaire tailored for the Ministry of Agriculture. The questionnaire was scored based on a model adopted from the Capability Maturity Model Integration (CMMI). It also encompassed all the project management knowledge areas to provide a clear understanding of the current maturity status at all level. The objectives of this assessment were to determine the strengths and weaknesses of the Ministry, to identify the most suitable PMO type, to establish the roles and responsibilities of the assigned PMO type and determine its location on the Ministry's hierarchy.

1. The Ministry of Agriculture analyzed the assessment and identified strengths in the project management knowledge areas of Cost, Communication & Procurement. The results revealed that the current systems in place ensures that projects are properly planned for as it relates to budgeting and that there is effective communication which plays a key role during implementation so that the activities are executed within the predetermined budget.

   Programs and Projects within the Agriculture sector in Belize have been financed through grants and loan agreements for decades. International agencies financing these initiatives have strict guidelines that must be followed and demand strict reporting requirements. Over the years, the Ministry adopted their communication guidelines and reporting templates. This is the result of a medium maturity level in communication.

   The other strengths identified were that of cost and procurement both having to relate to finance. Due to the same guidelines previously mentioned and the limited funding received by the Ministry, focus and support is often times given to ensuring efficiency in budgeting and

expenditures. These strengths demonstrated that the maturity level of the Ministry in those knowledge areas is a three (3) making it characterized, understood, and described in standards, procedures, tools, and methods that the Ministry presently has in place.

The assessment also identified some weak areas within the Ministry. These would fall below the knowledge areas of time, risk & quality. These areas are weak and scored low because of inadequate tools that are used for time management, schedule baseline not maintained, schedule not available to all teams within the Ministry, which affects planning and execution. Another weak area is risk, which has been a problem many times when implementing activities. Risks are not thoroughly identified which means that there is a problem at the initiation stage. It is recommended to identify risks at the very onset of project planning creating a risk register in an effort to effectively manage and control them. The Risk Management Plan Template will help with prioritizing the risks.

There are little to no tools in place to manage risks nor are there documents in place for risk management. The Ministry needs to ensure that communication and documentation of risks are properly executed and updated on a regular basis. Risks can change over time and can become detrimental to any project activity which makes assessing and analyzing them a continuous task. Questionnaires and Interviews at various intervals would assist the project manager in collecting data related to risk in order to accurately updating the risk register. In having this much weaknesses in any organization it surely will affect quality of the deliverables. Quality was another weak area found within the Ministry of Agriculture. Quality is managed in a chaotic manner, quality assurance processes are limited and product quality is measured in an ad-hoc manner. The Quality Management Plan Template (see Chart #) can be used as a guide to plan, perform and control quality of the projects.

It was noted that many times the project staff were not fully involved in all project activities and are often times called in to rectify uncontrollable issues

that arise during project implementation. One weakness that came about which is seen as important is project management training for staff. Lack of knowledge in that area puts a burden on project staff for the reason that project implementers would make better decisions with basic project management knowledge. Developing training plans, a comprehensive performance appraisal system, incentive schemes would increase the effectiveness of the human resource management.

The overall maturity assessment result for the Ministry of Agriculture was a level 2, which was based on a rating of one being the lowest score and five being the highest score. This result clearly concludes that the Ministry has many improvements to be done on its tools, methods, documentation and processes as it relates to project management.

2. The results obtained from the assessment indicated that the Ministry is at a level 2 maturity, which confirms that they are in need of a Project Management Office to control their project management implementation. The current department in place to handle projects is named the Project Execution Unit. This unit consists of only project staff however; they are not involved in all the projects within the Ministry. Their templates are not standardized, they receive untimely and inadequate training, and they do not participate in all stages of the project life cycle.

   A level two maturity does indicate that there are some systems and structures in place that would only need little adjustments to improve performance. For this reason, a PMO would increase effectiveness and would be easily implemented within the current structure of the Ministry. Three basic types of PMO were analyzed during this research. Based on the results the most suitable PMO that is being recommended for the Ministry of Agriculture is the Controlling type of PMO.

3. The key role the controlling PMO for the Ministry will be to maintain process standards by establishing a framework for performance along with a formalized set of guidelines and tools to be utilized. The roles and responsibilities to be assigned to this type of PMO were categorized as Establishing Project Methodologies, Project Tracking, and Project Support. These three key areas will then be further broken down into more specific roles and responsibilities.

The location of the Project Management Office on the Organizational structure of the Ministry of Agriculture should be positioned where it can manage more efficiently and effectively. Due to the size of the organization and the current maturity level, it is recommended that the PMO be situated in an isolated position reporting directly to the Chief Executive Officer. This position plays a key role in not only implementation but also in planning. It gives the Director of Projects authority and influence in tools and techniques that may be required, methods and systems that need to be established, formalized templates and documents that need to be developed. In placing the PMO in that key location, it will reduce any bottlenecks and will garner more support in terms of resources to address and enhance the effectiveness of each project management knowledge area.

The idea of a PMO has received positive feedback and support by upper management and other stakeholders within the agriculture sector. Although there has been a recent cut in the budget of the existing, Project Unit there is commitment from the CEO with respect to increase in resources to any future PMO. The reason for this commitment and support by many is that they have seen such a PMO within the Ministry will be an asset in ensuring sustainability and increase in program & project success.

6. RECOMMENDATIONS

The Ministry of Agriculture has systems, processes and documents in place to manage projects. Based on the assessment conducted their maturity level is adequate but has room for much improvement. The Ministry focuses much of its energy and resources on routine work, which causes program and projects to be overlooked or inadequately managed. The following are recommended as a way forward:

1. It is noted that the maturity assessment conducted brought to light many strengths and even more weaknesses. For this reason, you must conduct a project management maturity assessment every three (3) years to update the level of the Ministry's maturity level. The Program Director will ensure that this is thoroughly conducted at the completion of the program budgeting cycle, which their department is mandated to do every three (3) years.
2. Upon establishment of the Project Management Office there must be a performance appraisal system set up simultaneously in order to conduct timely and thorough reviews of the PMO's performance. This system must include specific performance indicators along with defined PMO Metrics.
3. To encourage feedback and continued improvement to the PMO and the roles and responsibility assigned it is recommended to establish a committee consisting of key senior managers to review and approve prior to implementation. This committee is to review the proposed roles, responsibilities and structure and make recommendations or modifications as should the need arise.
4. It is highly recommended that a forum is established during the implementation phase of the Project Management Office to encourage continuous feedback and input from stakeholders. There must be support and commitment from senior management to ensure the smooth transition from a Project Execution Unit to a Project Management Office.

7. BIBLIOGRAPHY

- Country Profile. (n.d.). Retrieved November 26, 2017, from http://databank.worldbank.org/data/Views/Reports/ReportWidgetCustom.aspx?Report_Name=CountryProfile&Id=b450fd57&tbar=y&dd=y&inf=n&zm=n&country=BLZ
- Government of Belize. (March 2016). Growth and Sustainable Development Strategy for Belize 2016-2019. Belmopan City
- Krishna, H. S. (2017, March 07). Project Life Cycle of a Project Management Organization. Retrieved December 02, 2017, from http://globalskillup.com/project-life-cycle/
- Read the full definition. (n.d.). Retrieved December 07, 2017, from http://www.businessdictionary.com/definition/research-methodology.html
- Nelson, A. T. (2014, December 07). Project Life Cycle vs. Process Groups. Retrieved December 03, 2017, from http://trevorknelson.com/2014/12/08/project-life-cycle-vs-process-groups/
- Pinto, A. (2012). How to assess the maturity of a PMO. Paper presented at PMI® Global Congress 2012—North America, Vancouver, British Columbia, Canada. Newtown Square, PA: Project Management Institute.
- Reiling, J. (n.d.). The Three Different Types of Project Management Offices (PMO). Retrieved December 03, 2017, from https://www.projectsmart.co.uk/3-different-types-of-project-management-offices.php
- Crawford, J.K. (2007). Project Management Maturity Model, Second Edition. Boca Raton, FL: Auerbach/CRC Press.
- Greiner, L. (2007, October 17). Capability Maturity Model Integration (CMMI) Definition and Solutions. Retrieved December 03, 2017, from https://www.cio.com/article/2437864/process-improvement/capability-maturity-model-integration--cmmi--definition-and-solutions.html
- Matassa, P. (2006). Grow up already!—An OPM3® primer. Paper presented at PMI® Global Congress 2006—North America, Seattle, WA. Newtown Square, PA: Project Management Institute.
- Information source. (2017, October 16). Retrieved December 06, 2017, from https://en.wikipedia.org/wiki/Information_source
- Identifying Information Sources. (n.d.). Retrieved December 06, 2017, from https://www.umflint.edu/library/identifying-information-sources
- McMillian, J. and Schumacher, S. (2001). Research in education: A conceptual introduction (5th edition). New York: HarpersCollins College Publishers.
- Hale, J. (2011, September 27). The 3 Basic Types of Descriptive Research Methods. Retrieved December 08, 2017, from https://psychcentral.com/blog/archives/2011/09/27/the-3-basic-types-of-descriptive-research-methods/
- Project Management Institute. (2004). A guide to the project management body of knowledge (PMBOK guide). Newtown Square, Pa: Project Management Institute

- Khan, B. (2016, December 13). 5 Major roles a Project Management Office plays within a company. Retrieved April 16, 2018, from https://www.nqicorp.com/en/2016/12/13/5-major-roles-a-project-management-office-plays-within-a-company/
- Information Source. (n.d.) *McGraw-Hill Dictionary of Scientific & Technical Terms, 6E*. (2003). Retrieved May 12 2018 from https://encyclopedia2.thefreedictionary.com/Information+Source

8. APPENDICES

Appendix 1: FGP Charter

PROJECT CHARTER	
Date	Project Name:
Novemeber 19th 2017	**Development of a Project Management Office Proposal for the Ministry of Agriculture**
Knowledge Areas / Processes	Applicacion Area (Sector / Activity)
Knowledge areas: Project Scope Management, Time Management, Cost Management, Quality Management, Human Resource Management, Communication Management, Risk Management, Procurement Management & Stakeholder Management **Process groups:** Initiation, Planning, Execution, Monitoring & Control & Closing	**Agriculture Sector/Management**
Start date	Finish date
November 19th 2017	July 13th 2018
Project Objectives (general and specific)	
General objective: To develop a Project Management Office proposal for the Ministry of Agriculture to strenghten its institutional capacity and efficiently & effectively manage project implementation. **Specific objectives:** 1 1. To assess the project management practices and maturity of the Ministry of Agriculture, in order to determine the project management strenghts, improvement opportunities and needs 2. To analyze the different PMO types in order to establish the most suitable PMO for the Ministry of Agriculture 3. To establish the roles and responsibilities to be assigned to the PMO as well as its	

location on the hierarchy on Ministry of Agriculture organizational management structure

Project purpose or justification (merit and expected results)

The Ministry of Agriculture (MoA) is a public sector institution whose mandate is to formulate, execute, monitor and coordinate the Government of Belize agricultural and food policies. A Project Execution Unit (PEU) was established to strengthen the implementation responsibility of the Ministry with special emphasis on the efficient implementation of programs and projects funded by international partners. The PEU's responsibilities include effective and efficient management of programs and projects inclusive of procurement, technical strategies and contents of financing agreements and coordination with other initiatives and monitoring and evaluation.

The country of Belize receives assistance for various sectors from international funding institutions in the form of donations, grants and loans. The Ministry has a direct responsibility to manage and/or monitor the spending of approximately four million Belize Dollars every year in the agriculture sector. There is a perception of the PEU, within the Ministry, that they are not adequately meeting the needs with respect to records management, communication and quality. Many factors affect the PEU in achieving their objectives that can be solved through the establishment of clear project management procedures, processes, roles and responsibilities. Upper management is aware of the constraints affecting the Unit, however, due to priority in policy areas and Research & Development it has been overlooked. In having an established Project Management Office the Ministry can then provide a standardized and effective method for eliminating those problems that have arisen due to inadequately applied Project Management practice.

Description of Product or Service to be generated by the Project – Project final deliverables

1. The Project Management Office Proposal will be generated
2. Maturity assessment of the Ministry will be developed.
3. PMO Application Documents and Best Practices for the Ministry of Agriculture

Assumptions

1. The time allowed for completion of the PMO Proposal is sufficient
2. The Prosopal and related documents will be developed using information and feedback gathered from the Ministry of Agriculture.
3. The development process of the PMO Proposal will be cost effective.

Constraints

Limited funding for the comprehensive consultations for and preparation of the PMO Proposal.

Stakeholders resistant to change might derail the project development.

Current Project Work Load may impact the results.

Preliminary risks

If the data and support is not forthcoming by stakeholders the proposal might not be completed within the desired timeframe impacting the quality of the completed document.

Budget

Human Resource : $12,000

Supplies: $1,000

Equipment Usage: $1,250

Operational Expenses: $2,000

Total BZD $16,250

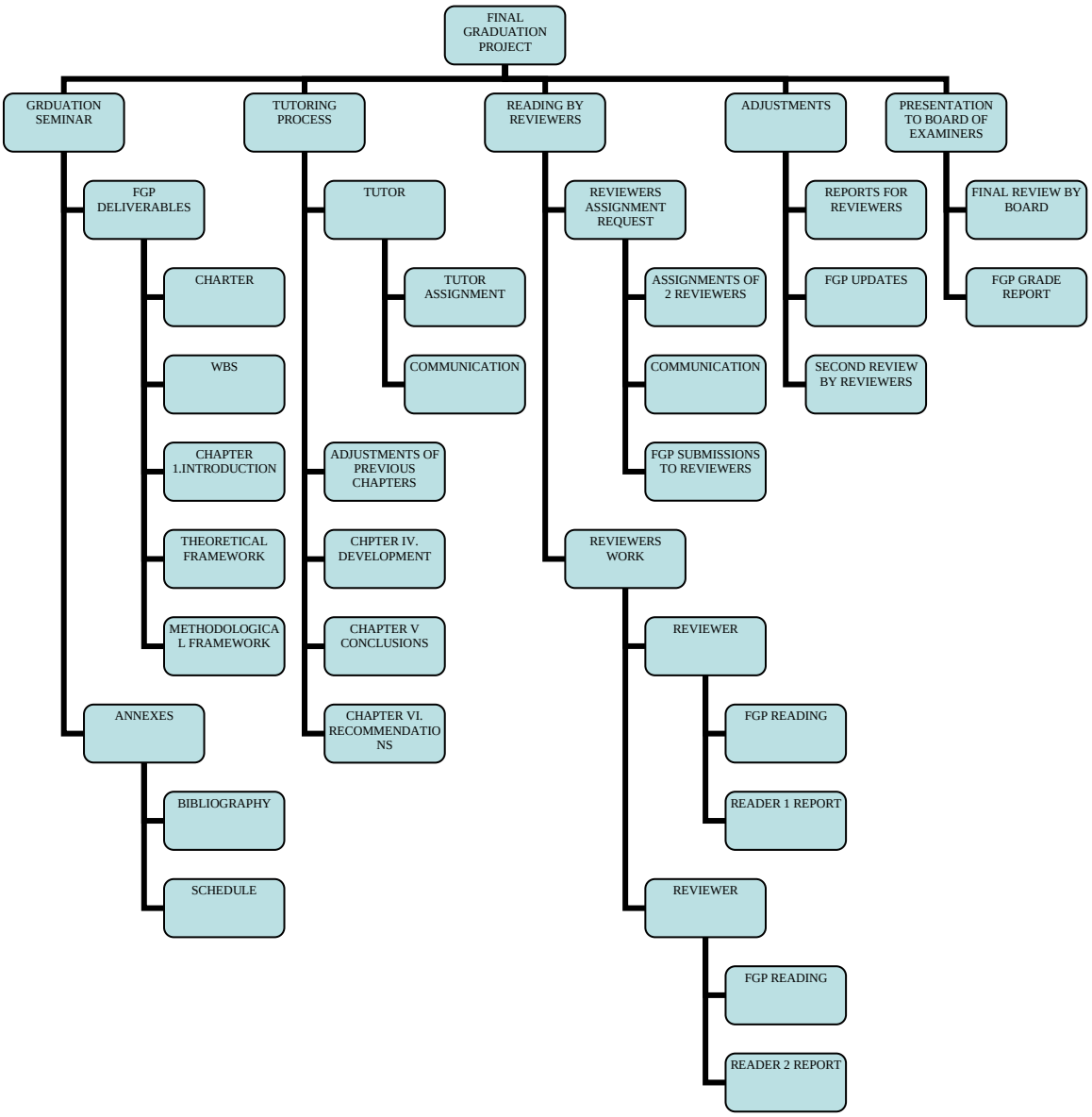
Milestones and dates

Milestone	Start date	End date
FGP Graduation Seminar Approval	November 13th 2017	December 17th 2017
Tutoring Process & Approval	February 19th 2018	May 18th 2018
FGP Submission to Reviewers	May 21st 2018	May 25th 2018
Reader Reports 1 & 2	May 28th 2018	June 8thth 2018
Adjustements Second Review	June 11th 2018	July 6th 2018
Submission of FGP to the Board & Grade Report	July 9th 2018	July 13th 2018

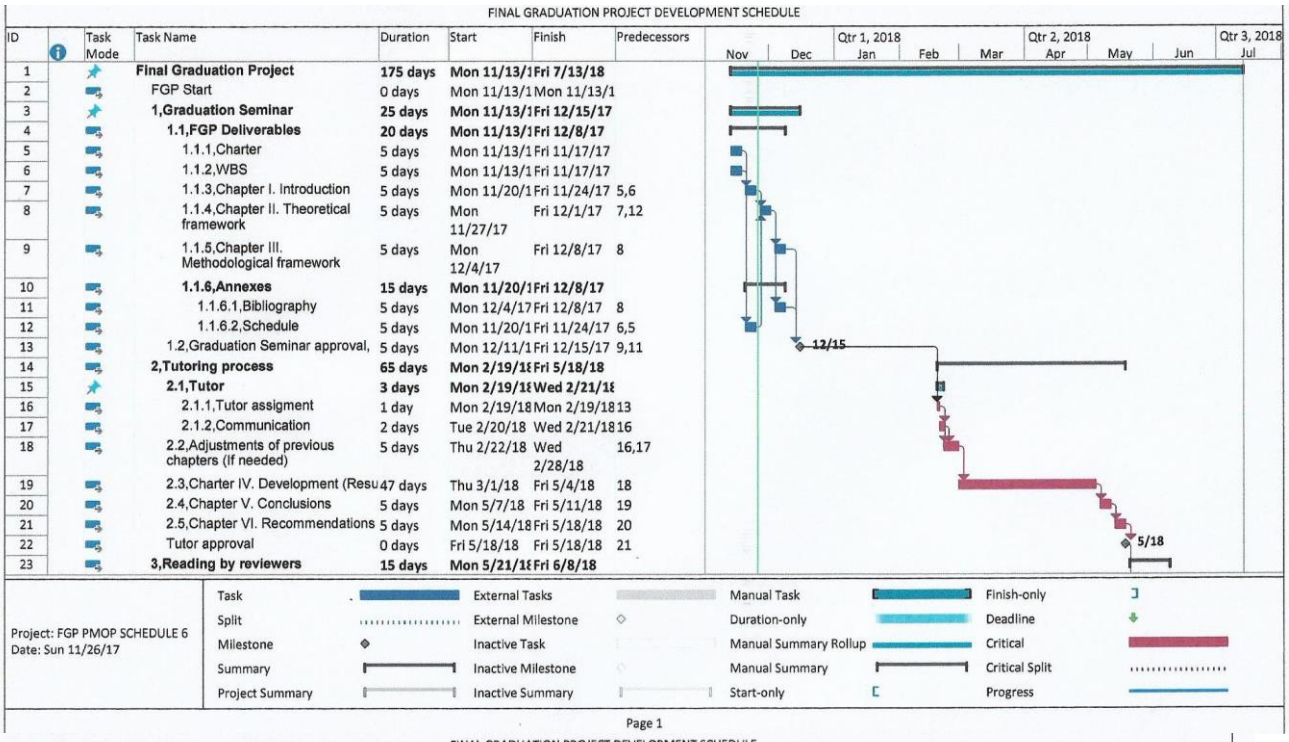
Relevant historical information
The Ministry of Agriculute is a public sector institution whose vision is '*A transformed/modern sector that is fully competitive, diversified and sustainable.*' Their mission is '*To continue as the economic pillar of Belize, ensuring food security, generating income and foreign exchange, creating employment, and conserving natural resources, in order to grow the economy, reduce poverty and empower the local population for sustainable development.'* The organizational setup is a hierarchical organization type with the Minister of Agriculture being at the apex. The organization also consists of statutory bodies, which rely heavily on the government support. Those bodies are considered partners in development and also execute Projects for which they often times need technical assistance and advice with regard to implementation. The Ministry has one strategic objective, which is '*Contribute to the overall GDP growth and national household incomes and growth in export earnings*.' In order to achieve this objective they rely heavily on programme and project financing from international donors. Due to the increasing number of projects, which the Ministry began to undertake and monitor, they decided to establish a Project Execution Unit (PEU) in 2009 to assist with the implementation. The unit began with one officer at a time as the workload began to increase. At the time there was one main programme being implemented which had to do with the Accompanying Measures for Sugar Programme funded by the European Union. Terms of References were prepared and a draft strategic plan was made for the PEU but never finalized and accepted. Since then there have been many more programmes funded by other agencies for which the present TORs in place do not encompass all the additional duties.
Stakeholders
Direct stakeholders: Chief Executive Officer Programme Coordinator Project Officers Procurement Officer UCI-GSPM Representatives **Indirect stakeholders:**

Ministry of Agriculture Staff Partners in Development Funding Agencies Farmers Educational Institutions	
Project Manager: Manuel Matus	Signature:
Authorized by: Dr. Carlos Colón Riollano	Signature:

Appendix 2: FGP Work Breakdown Structure (WBS)



Appendix 3: FGP Schedule



FINAL GRADUATION PROJECT DEVELOPMENT SCHEDULE

ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors
1		**Final Graduation Project**	**175 days**	**Mon 11/13/1**	**Fri 7/13/18**	
2		FGP Start	0 days	Mon 11/13/1	Mon 11/13/1	
3		**1,Graduation Seminar**	**25 days**	**Mon 11/13/1**	**Fri 12/15/17**	
4		**1.1,FGP Deliverables**	**20 days**	**Mon 11/13/1**	**Fri 12/8/17**	
5		1.1.1,Charter	5 days	Mon 11/13/1	Fri 11/17/17	
6		1.1.2,WBS	5 days	Mon 11/13/1	Fri 11/17/17	
7		1.1.3,Chapter I. Introduction	5 days	Mon 11/20/1	Fri 11/24/17	5,6
8		1.1.4,Chapter II. Theoretical framework	5 days	Mon 11/27/17	Fri 12/1/17	7,12
9		1.1.5,Chapter III. Methodological framework	5 days	Mon 12/4/17	Fri 12/8/17	8
10		**1.1.6,Annexes**	**15 days**	**Mon 11/20/1**	**Fri 12/8/17**	
11		1.1.6.1,Bibliography	5 days	Mon 12/4/17	Fri 12/8/17	8
12		1.1.6.2,Schedule	5 days	Mon 11/20/1	Fri 11/24/17	6,5
13		1.2,Graduation Seminar approval,	5 days	Mon 12/11/1	Fri 12/15/17	9,11
14		**2,Tutoring process**	**65 days**	**Mon 2/19/18**	**Fri 5/18/18**	
15		**2.1,Tutor**	**3 days**	**Mon 2/19/18**	**Wed 2/21/18**	
16		2.1.1,Tutor assigment	1 day	Mon 2/19/18	Mon 2/19/18	13
17		2.1.2,Communication	2 days	Tue 2/20/18	Wed 2/21/18	16
18		2.2,Adjustments of previous chapters (if needed)	5 days	Thu 2/22/18	Wed 2/28/18	16,17
19		2.3,Charter IV. Development (Resu	47 days	Thu 3/1/18	Fri 5/4/18	18
20		2.4,Chapter V. Conclusions	5 days	Mon 5/7/18	Fri 5/11/18	19
21		2.5,Chapter VI. Recommendations	5 days	Mon 5/14/18	Fri 5/18/18	20
22		Tutor approval	0 days	Fri 5/18/18	Fri 5/18/18	21
23		**3,Reading by reviewers**	**15 days**	**Mon 5/21/18**	**Fri 6/8/18**	

Qtr 1, 2018 (Nov, Dec, Jan) · Qtr 2, 2018 (Feb, Mar, Apr, May, Jun) · Qtr 3, 2018 (Jul)

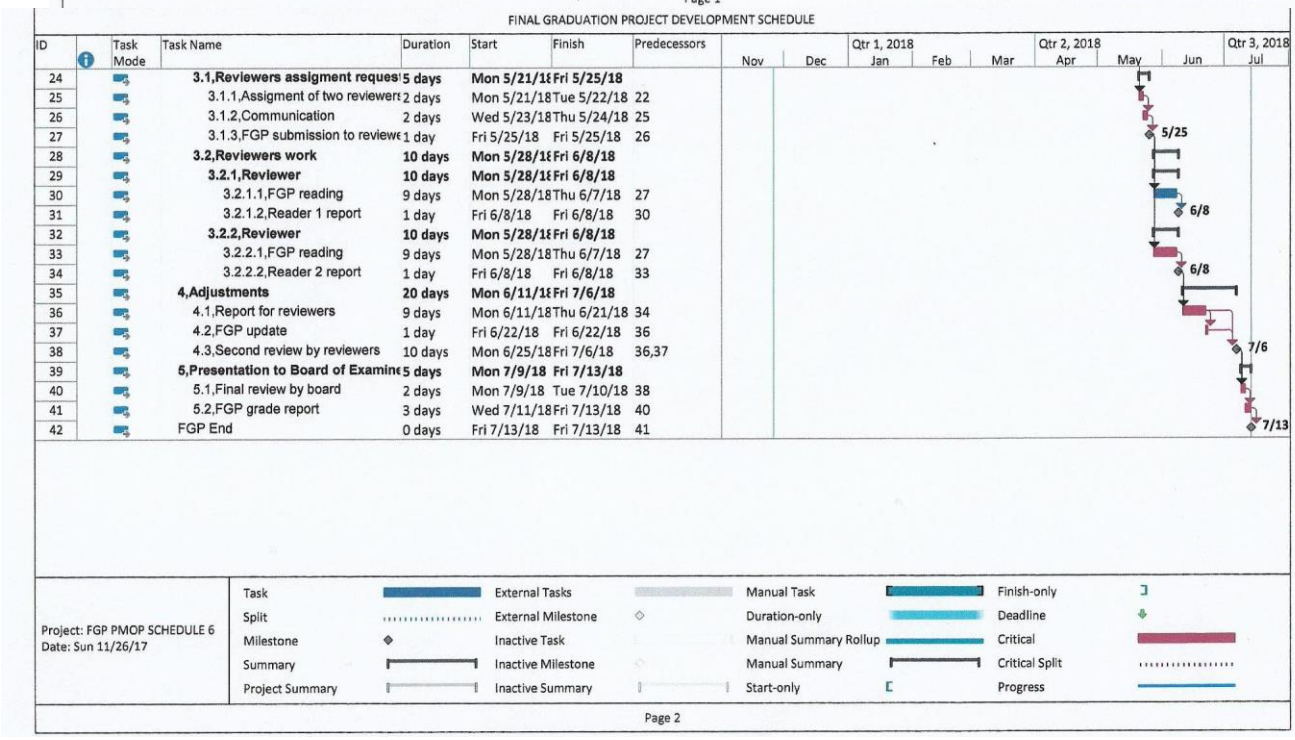
12/15

5/18

Project: FGP PMOP SCHEDULE 6
Date: Sun 11/26/17

Task	External Tasks	Manual Task	Finish-only		
Split	External Milestone	Duration-only	Deadline		
Milestone	Inactive Task	Manual Summary Rollup	Critical		
Summary	Inactive Milestone	Manual Summary	Critical Split		
Project Summary	Inactive Summary	Start-only	Progress		

Page 1



FINAL GRADUATION PROJECT DEVELOPMENT SCHEDULE

ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors
24		**3.1,Reviewers assigment reques**	**5 days**	**Mon 5/21/18**	**Fri 5/25/18**	
25		3.1.1,Assigment of two reviewers	2 days	Mon 5/21/18	Tue 5/22/18	22
26		3.1.2,Communication	2 days	Wed 5/23/18	Thu 5/24/18	25
27		3.1.3,FGP submission to reviewe	1 day	Fri 5/25/18	Fri 5/25/18	26
28		**3.2,Reviewers work**	**10 days**	**Mon 5/28/18**	**Fri 6/8/18**	
29		**3.2.1,Reviewer**	**10 days**	**Mon 5/28/18**	**Fri 6/8/18**	
30		3.2.1.1,FGP reading	9 days	Mon 5/28/18	Thu 6/7/18	27
31		3.2.1.2,Reader 1 report	1 day	Fri 6/8/18	Fri 6/8/18	30
32		**3.2.2,Reviewer**	**10 days**	**Mon 5/28/18**	**Fri 6/8/18**	
33		3.2.2.1,FGP reading	9 days	Mon 5/28/18	Thu 6/7/18	27
34		3.2.2.2,Reader 2 report	1 day	Fri 6/8/18	Fri 6/8/18	33
35		**4,Adjustments**	**20 days**	**Mon 6/11/18**	**Fri 7/6/18**	
36		4.1,Report for reviewers	9 days	Mon 6/11/18	Thu 6/21/18	34
37		4.2,FGP update	1 day	Fri 6/22/18	Fri 6/22/18	36
38		4.3,Second review by reviewers	10 days	Mon 6/25/18	Fri 7/6/18	36,37
39		**5,Presentation to Board of Examine**	**5 days**	**Mon 7/9/18**	**Fri 7/13/18**	
40		5.1,Final review by board	2 days	Mon 7/9/18	Tue 7/10/18	38
41		5.2,FGP grade report	3 days	Wed 7/11/18	Fri 7/13/18	40
42		FGP End	0 days	Fri 7/13/18	Fri 7/13/18	41

Qtr 1, 2018 (Nov, Dec, Jan) · Qtr 2, 2018 (Feb, Mar, Apr, May, Jun) · Qtr 3, 2018 (Jul)

5/25

6/8

6/8

7/6

7/13

Project: FGP PMOP SCHEDULE 6
Date: Sun 11/26/17

Task	External Tasks	Manual Task	Finish-only		
Split	External Milestone	Duration-only	Deadline		
Milestone	Inactive Task	Manual Summary Rollup	Critical		
Summary	Inactive Milestone	Manual Summary	Critical Split		
Project Summary	Inactive Summary	Start-only	Progress		

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Appendix 4: Project Management Maturity Questionnaire

Project Management Maturity Questionnaire

Level 1: Initial 1pt	**Level 2: Managed** 2pts	**Level 3: Defined** 3pts	**Level 4: Qualitatively Managed** 4pts	**Level 5: Optimizing** 5pts
processes are usually ad hoc and chaotic.	an organization has achieved all the **specific** and **generic goals** of the maturity level 2 process areas. In other words, the projects of the organization have ensured that requirements are managed and that processes are planned, performed, measured, and controlled.	an organization has achieved all the **specific** and **generic goals** of the process areas assigned to maturity levels 2 and 3. At maturity level 3, processes are well characterized and understood, and are described in standards, procedures, tools, and methods.	an organization has achieved all the **specific goals** of the process areas assigned to maturity levels 2, 3, and 4 and the **generic goals** assigned to maturity levels 2 and 3. At maturity level 4 Sub processes are selected that significantly contribute to overall process performance. These selected sub processes are controlled using statistical and other quantitative techniques.	an organization has achieved all the **specific goals** of the process areas assigned to maturity levels 2, 3, 4, and 5 and the **generic goals** assigned to maturity levels 2 and 3. Processes are continually improved based on a quantitative understanding of the common causes of variation inherent in processes. Maturity level 5 focuses on continually improving process performance through both incremental and innovative technological improvements.

Using the table above please score the questions below. Score the question based on the level and apply the respective point(s) the level represents.

INTEGRATION

1. Are all the projects executed in professional manner within planned time and cost?
Score:
Comments(if any):

2. Do you use the project charter?
Score:
Comments(if any):

3. Does the overall change controls manage actual changes when they occur? 2
Score:
Comments(if any):

4. Does the Project Coordinator have responsibility in project planning, execution, and control? 3
Score:
Comments(if any):

5. Does all project process management apply to all projects? 2
Score:
Comments(if any):

SCOPE

6. Is there proper use of all the scope management processes as it relates to projects? 3
Score:
Comments(if any):

7. Are there standardized scope management documents? 3
Score:
Comments(if any):

8. In what way is the scope of a project determined? 4
Score:
Comments(if any):

9. In what manner is scope changed and controlled? 2
Score:
Comments(if any):

TIME

10. Are there formalized documents for time management?
Score:
Comments(if any):

11. Are there adequate tools/ techniques used for time management process?
Score:
Comments(if any):

12. Is the baseline schedule maintained for each projects?
Score:
Comments(if any):

13. Is the planned schedule available for all project teams via web or email?
Score:
Comments(if any):

COST

14. What systems / tools do you currently use to manage your project cost?
Score:
Comments(if any):

15. Is standard method practiced for resource planning, cost estimation and budgeting?
Score:
Comments(if any):

16. How are project costs assigned?
Score:
Comments(if any):

17. What method do you use for tracking costs? Is there a built system for cost tracking
Score:
Comments(if any):

18. Are scope changes and cost estimates approved by management?
Score:
Comments(if any):

QUALITY

19. Is there software based systems / tools that you currently use to manage your project quality?
Score:
Comments(if any):

20. Are quality goals methods and systems established for each project
Score:
Comments(if any):

21. Are quality assurances processes established and recognized by your organization?
Score:
Comments(if any):

22. Are there performance/quality standards used to identify and measure projects product quality?
Score:
Comments(if any):

HUMAN RESOURCE
23. Are your project management practices and process consistent across divisions and functional groups?
Score:
Comments(if any):

24. What systems / tools do you currently 0use to plan HR management in your projects?
Score:
Comments(if any):

25. Are PM training courses identified and training provided?
Score:
Comments(if any):

26. Do you have defined roles and responsibilities for all project members?
Score:
Comments(if any):

27. Do you have a defined skill level for project manager?
Score:
Comments(if any):

COMMNUNICATION
28. What kind of techniques and tools do you use to plan communications?
Score:
Comments(if any):

29. Does project manager share lessons learned with project members?
Score:
Comments(if any):

30. Are final reports, lessons learned and previous experiences well organized, documented and utilized for other projects?
Score:
Comments(if any):

RISK
31. When is project risk analyzed?
Score:
Comments(if any):

32. Are the areas of risk identified and mitigated for each project?

Score:
Comments(if any):

33. Is there a defined process to measure deliverables?
Score:
Comments(if any):

34. What methods or tools do you use to manage and control risk?
Score:
Comments(if any):

35. Are there standard documents provided of risk management for project members and customers?
Score:
Comments(if any):

36. Is the risk analysis done for each project?
Score:
Comments(if any):

PROCUREMENT
37. Is there a written formal working procedure and format for procurement works?
Score:
Comments(if any):

38. Is the procurement management process applied to all projects?
Score:
Comments(if any):

39. Does the procurement department take lead on planning, requisitioning items?
Score:
Comments(if any):

STAKEHOLDER
40. Is the stakeholder management process required to identify the people, groups or organizations that could impact or be impacted by the project?
Score:
Comments(if any):

41. What tools do you use to identify stakeholders in your project?
Score:
Comments(if any):

42. Is the relevant information available for all identified stakeholders?
Score:
Comments(if any):

43. Who has a responsibility to plan, manage, control, and make decisions in stakeholder management process?
Score:
Comments(if any):

APPENDIX 5: PROPOSED QUARTERLY MONITORING REPORT TEMPLATE

PROJECT REFERENCE	
PROJECT NAME	
DATE: QUARTERLY MONITORING REPORT	
PREPARED BY	

1. Focus of the Quarter (From……*to*……..)			
Activities:	**Key Outputs**	**Achievements**	**Challenges**
1.			
2.			

2. Plans for next Quarter (From……*to*……..)		
Planned Activities	**Outputs / Targets**	**Prioritized Key Inputs/Resources**
1.		
2.		

3. Comments / Observation

1.

2.

3.

4. Recommendations – [Moving forward]

1.

2.

APPENDIX 6: PROPOSED QUARTER PLAN TEMPALTE

Quarter Plan		Ministry of Agriculture			REF:			
					Month-Year:			
Section/ Department:			Quarterly Period:		Prepared By:			
RECURRENT / CAPITAL II OR III PROGRAM								
#	Priority Area / Strategic Objective	Activities	Person/ Unit Responsible	Expected Target	M1	M2	M3	Completed (Y / N) or Status

APPENDIX 7: PROJECT MANAGEMENT PLAN TEMPLATE

Project Reference	
Project Name	

1 Methodology
Describe how the project team will execute, manage, monitor and close the project.
In addition to serving as a guide for the team throughout the project.

2 High Level Overview
[Past, where you are. Describe the current situation and why the project is necessary.]

3 SMART goals and project success criteria
[Future, where you are going. Describe the expected benefits detailing clearly SMART objectives and related success criteria.

4 Scope Management
[Detailed description of the scope of the project]

5 Schedule Management
[Based on WBS, set tasks, duration, start, finish, and Responsible. This section will be created automatically from MS Project]

6 Cost Management
[Set resources for all activities of the timeline]

7 Project Organization (Governance)
[Create Stakeholder register & set names and responsibilities]

8. Human Resource Management
[Identify required skills, reporting relationships and creating a staff management plan]

9. Risk management
[List the risks and associated strategies, considering Severity items, Probability, impact, action.]

10. Communication Strategy
[The Following must be identified: What, When, How & for Whom?]

10. Procurement Management
[This is to include plans and contract management]

11. Quality Management
[Identify quality requirements and standards for the project]

12. Change Control Management
[This sets the criteria & approval flow for changes in scope]

APPENDIX 8: RESULTS OF QUESTIONNAIRES

#	Question	Maturity Level (1-5)	R1	R2	R3	R4	R5	R6	R7	R8	R9	R10
	INTEGRATION	**1.75**										
1	Are all the projects executed in professional manner within planned time and cost?	2	1.75	2.5	2	1.25	1.5	2.5	1.75	2.25	2.5	2
2	Do you use the project charter?	1.5	2	1	1.5	1.5	1.75	1.25	1.5	1.5	1.75	1.25
3	Does the overall change controls manage actual changes when they occur?	1.25	1	1.5	1.5	1	1.25	1	1.5	1.25	1.5	1
4	Does the Project Coordinator have responsibility in project planning, execution, and control?	3	3	3.25	3	3.25	2.75	3.5	3	3	2.5	2.75
5	Does all project process management apply to all projects?	1	1	1	1	1	1	1	1	1	1	1
	SCOPE	**1.75**										
6	Is there proper use of all the scope management processes as it relates to projects?	1	1	1	1	1	1	1	1	1	1	1

17	Are there standardized scope management documents	1	1	1	1	1	1	1	1	1	1	1
8	In what way is the scope of a project determined?	3	2.5	3	2.75	3.25	3.5	2.5	3.25	3.5	3	2.75
9	In what manner is scope changed and controlled?	2	2	2.5	2	1.5	2.25	2.5	1.75	1.5	1.75	2.25
	TIME	**1.125**										
10	Are there formalized documents for time management?	1	1	1	1	1	1	1	1	1	1	1
11	Are there adequate tools/ techniques used for time management process?	1.5	1.25	1.5	1.5	1.75	1.5	1.75	1.5	1.25	1.75	1.25
12	Is the baseline schedule maintained for each projects?	1	1	1	1	1	1	1	1	1	1	1
13	Is the planned schedule available for all project teams via web or email?	1	1	1	1	1	1	1	1	1	1	1
	COST	**3.2**										
14	What systems / tools do you currently use to manage your project cost?	3	3	3	3.25	3	3.25	2.75	3	2.75	3	3
15	Is standard method practiced for resource planning, cost	2	2	2	2	2	2	1.75	2	1.75	2.5	2

	estimation and budgeting											
16	How are project costs assigned?	4	3.75	4	4	3.75	4	4.25	4	4	4	4.25
17	What method do you use for tracking costs? Is there a built system for cost tracking	3	3	3.25	3	3	3	2.75	3	3	2.75	3.25
18	Are scope changes and cost estimates approved by management?	4	4	4	3.75	4	3.5	4	4	4.5	4	4.25
	QUALITY	**1**										
19	Is there software based systems / tools that you currently use to manage your project quality	1	1	1	1	1	1	1	1	1	1	1
20	Are quality goals methods and systems established for each project	1	1	1	1	1	1	1	1	1	1	1
21	Are quality assurances processes established and recognized by your organization?	1	1	1	1	1	1	1	1	1	1	1
22	Are there performance/quality	1	1	1	1	1	1	1	1	1	1	1

	standards used to identify and measure project's product quality?											
	HUMAN RESOURCE	**2**										
23	Are your project management practices and process consistent across divisions and functional groups?	1.5	1.25	1.5	1.25	1	1.5	1.75	1.75	2	1.5	1.5
24	What systems / tools do you currently use to plan HR management in your projects	2	2	2	2.25	2.5	1.75	2	1.75	2	1.75	2
25	Are PM training courses identified and training provided?	1.5	1	1	1.5	1.75	1.75	2	1.5	1.75	1.5	1.25
26	Do you have defined roles and responsibilities for all project members?	2	2	2	2	2	2	2	2	2	2	2
27	Do you have a defined skill level for project manager?	3	3	3	3	3	3	3	3	3	3	3
	COMMUNICATION	**2.83**										

28	What kind of techniques and tools do you use to plan communications	3	3.25	3	3.5	2.75	3	2.5	2.75	3.25	3.5	3
29	Does project manager share lessons learned with project members	2.5	2.25	2.25	2.5	2.5	2.75	2.5	2.75	2.25	2.75	2.5
30	Are final reports, lessons learned and previous experiences well organized, documented and utilized for other projects?	3	2.5	3	3.25	3	3.25	3	3	3.25	2.75	3
	RISK	**1.42**										
31	Is project risk analyzed in a timely manner?	1.5	1.5	1.25	1.5	1.5	1.75	1.5	1.5	1.75	1.5	1.25
32	Are the areas of risk identified and mitigated for each project?	1.5	1	1.5	1.5	1.5	1.5	1.25	2	1.75	1.25	1.75
33	Is there a defined process to measure deliverables?	1.5										
34	What methods or tools do you use to manage and control risk?	1	1	1	1	1	1	1	1	1	1	1

35	Are there standard documents provided of risk management for project members and customers	1	1	1	1	1	1	1	1	1	1	1
36	Is the risk analysis done for each project	2										
	PROCUREMENT	**3.67**										
37	Is there a written formal working procedure and format for procurement?	3	3	3	2.75	3	3	3.25	3	3	3	3
38	Is the procurement management process applied to all projects?	4	4	4	3.75	4.5	4	4	3.75	4	4	4
39	Does the procurement officer take lead on planning, requisitioning, contracting, etc?	4	4	4	4	4	4	4	4	4	4	4
	STAKEHOLDER	**1.75**										
40	Is the stakeholder management process used to identify the people, groups or organizations that could impact or be impacted by the project?	1	1	1	1	1	1	1	1	1	1	1

41	What tools do you use to identify stakeholders in your project	1	1	1	1	1	1	1	1	1	1	1
42	Is the relevant information available for all identified stakeholders?	3	2.75	3.25	2.75	3.5	3.25	2.75	2.75	3.25	2.75	3
43	Does Project Staff have full responsibility to plan, manage, control, and make decisions in stakeholder management process?	2	2.25	2	2.25	1.75	2.25	1.75	2	2	1.5	2.25
	TOTAL	**20.495**										

APPENDIX 9: PHILOLOGIST APPROVAL LETTER

NELMARIE N. BURNS
San Ignacio, Cayo • nburns@shc.edu.bz • 501-621-7549

June 19th 2018

TO WHOM IT MAY CONCERN

Referencing the Final Graduation Project of the Master's in Project Management for the Universidad Para la Cooperacion Internacional produced by Mr. Manuel Matus

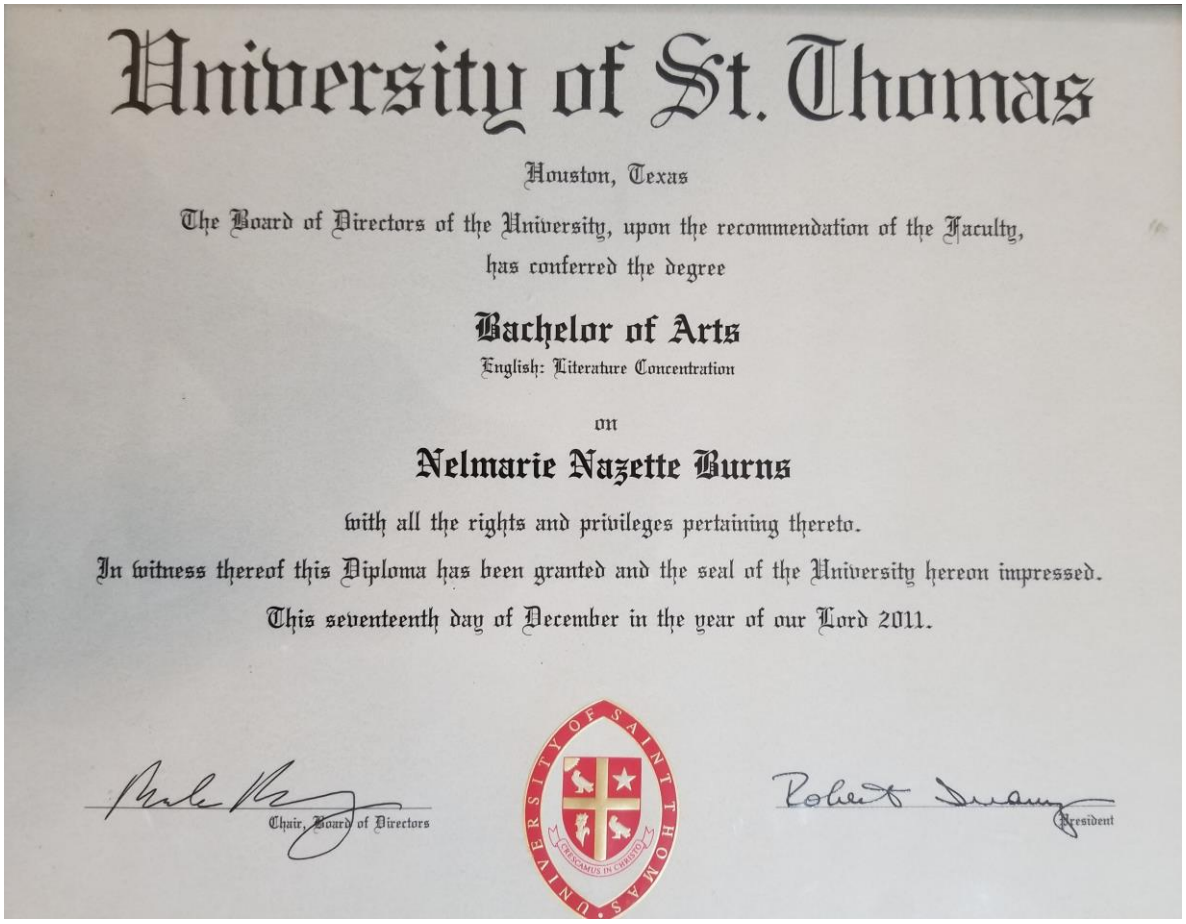
Dear Sir/Madam.

I have reviewed the Final Graduation Project entitled "Development of a Project Management Office Proposal for the Ministry of Agriculture" produced by Manuel. I have worked closely with Manuel editing grammar, style and structure to provide the necessary feedback to ensure the document meets a Master Degree level standard. I hereby certifiy that he has made necessary changes and improvements to meet the requirements of the Final Graduation Project.

Sincerely,

Nelmarie Burns, M.Ed.

Appendix 10: BACHELOR OF ARTS FROM THE UNIVERSITY OF ST. THOMAS HOUSTON, TEXAS



University of St. Thomas

Houston, Texas

The Board of Directors of the University, upon the recommendation of the Faculty, has conferred the degree

Bachelor of Arts

English: Literature Concentration

on

Nelmarie Nazette Burns

with all the rights and privileges pertaining thereto.

In witness thereof this Diploma has been granted and the seal of the University hereon impressed.

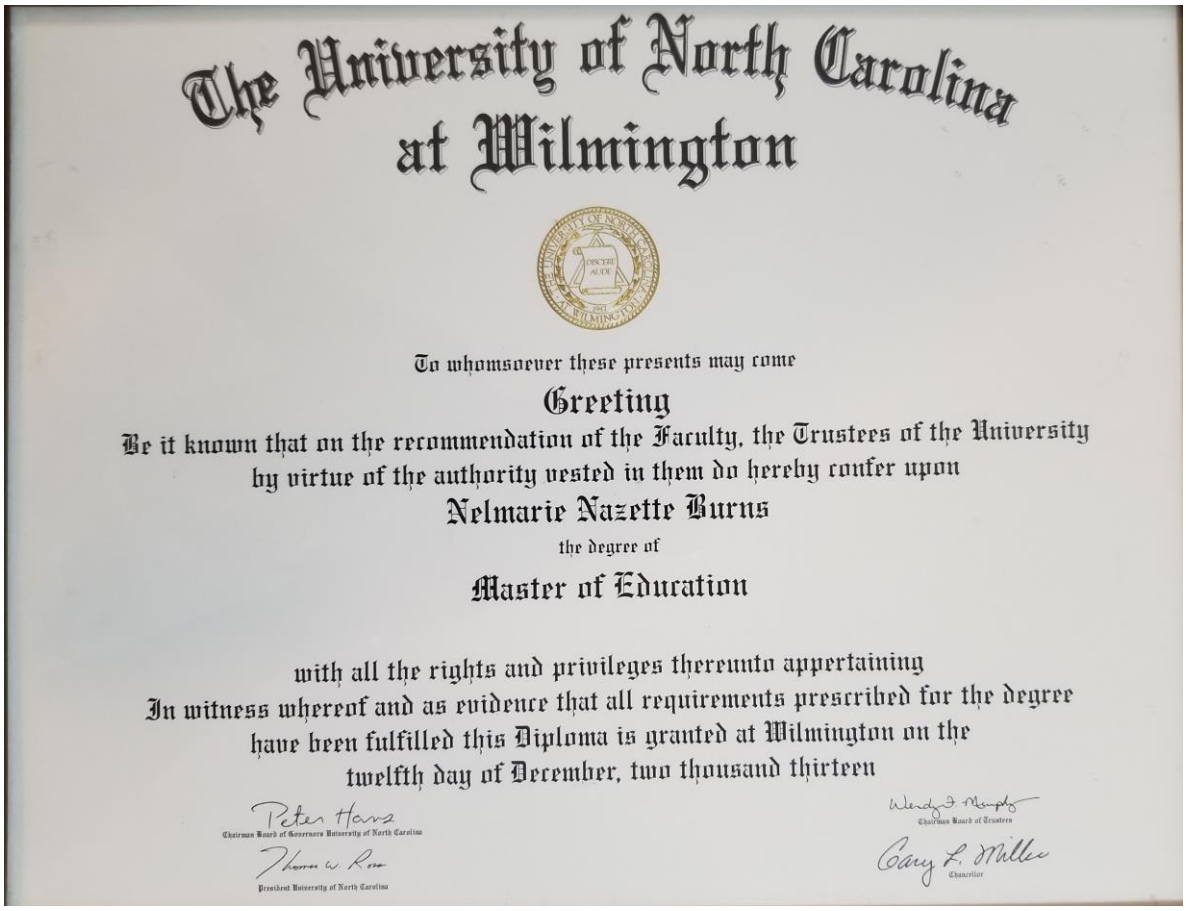
This seventeenth day of December in the year of our Lord 2011.

Chair, Board of Directors

President

(Bachelor of Arts)

Appendix 11: MASTER OF EDUCATION FROM THE UNIVERSITY OF NORTH CAROLINA AT WILMINGTON



The University of North Carolina at Wilmington

To whomsoever these presents may come

Greeting

Be it known that on the recommendation of the Faculty, the Trustees of the University by virtue of the authority vested in them do hereby confer upon

Nelmarie Nazette Burns

the degree of

Master of Education

with all the rights and privileges thereunto appertaining

In witness whereof and as evidence that all requirements prescribed for the degree have been fulfilled this Diploma is granted at Wilmington on the twelfth day of December, two thousand thirteen

Peter Hans
Chairman Board of Governors University of North Carolina

Thomas W. Ross
President University of North Carolina

Wendy J. Murphy
Chairman Board of Trustees

Gary L. Miller
Chancellor

(Master of Education)