

IMPACT OF PROJECTS MANAGEMENT OFFICE ON IMPROVING PROJECTS RESULTS

تأثير مكتب إدارة المشروعات على تحسين نتائج المشروعات

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المستخلص:

نظرة عامة: تواجه المنظمات تعقيدًا متزايدًا في نطاق المشروع. يتم إنشاء مكاتب إدارة المشاريع لمواجهة هذه التحديات وتحسين نتائج المشروع. يستكشف هذا الملخص التأثير المحتمل لمكتب إدارة المشاريع على نتائج المشروع. تشير الدراسات إلى أن مكتب إدارة المشاريع يمكن أن يساهم في النجاح من خلال التطوير والتدريب على أفضل الممارسات، وإدارة الموارد ومراقبتها، ويمكن لمكتب إدارة المشاريع تقديم التوجيه والدعم في تخصيص الموارد ومراقبة المشاريع، وإدارة المعرفة، ويمكن لمكتب إدارة المشاريع تسهيل تبادل المعرفة والتقاط الدروس المستفادة من المشاريع السابقة. ومع ذلك، يسلط البحث الضوء أيضًا على أهمية الانشاء الفعال لمكتب إدارة المشاريع. قد تختلف الفوائد المحددة اعتمادًا على هيكل مكتب إدارة المشروع ومواءمته مع الاحتياجات التنظيمية. بشكل عام، يحمل مكتب إدارة المشاريع وعودًا بتعزيز أداء المشروع من خلال تعزيز الانضباط ونقل المعرفة والاستخدام الفعال للموارد.

الكلمات المفتاحية: مكتب إدارة المشروعات، إدارة المشروعات، الإدارة التشغيلية، خطط التشغيل، التخطيط الاستراتيجي

ABSTRACT:

Organizations face growing complexity in project Scopes, in addition to achieving required results as ROI. Project Management Offices are established to address these challenges and improve project Results. This abstract explores the potential impact of projects management office on project performance. Studies suggest projects management office can contribute to success through, Standardization and Best Practices Training and Development, Resource Management and Control, projects management office can offer guidance and support in resource allocation and project control, Knowledge Management, projects management office can facilitate knowledge sharing and capture lessons learned from past projects. However, research also highlights the importance of effective projects management office implementation. The specific benefits may vary depending on the project management office structure and its alignment with organizational needs. Overall, the projects management office holds promises for enhancing project performance by promoting discipline, knowledge transfer, and efficient resource utilization.

keywords: Projects Management Offices, Projects Management, Operational management, Operational Planning, Strategic planning

1- Research Overview

1.1 Introduction: The Importance of Project Management Offices in Project Success, Project management is the lifeblood of any organization, ensuring internal and external activities align with overall business goals. Enterprises establish project management strategies to boost productivity and achieve these goals effectively.

Challenges in Traditional Project Management While research has yielded numerous project management theories, practical implementation often falls short. Case study, on 2018 program for development of local services in Upper Egypt, highlight this. This program aimed to construct infrastructure services through projects like water treatment plants and network upgrades. However, the lack of efficient tools, such as a projects management office, led the governmental agency responsible for the project failing to achieve 50% of its targets by 2019.

Why PMOs Matter? This case study exemplifies the negative impact of unprofessional project implementation. To address this, the Project Management Office offers a structured approach to project success.

Benefits of a Project Management Office, Standardization and Best Practices, Project Management Office ensure consistent

methodologies across projects, fostering a unified and efficient approach.

Enhanced Skills and Knowledge: Training programs offered by PMOs elevate project management skills within the organization.

Resource Optimization: Project Management Office provides guidance on resource allocation, preventing overallocation and ensuring smooth project execution.

Improved Communication and Collaboration, Project Management Office promote clear communication channels between stakeholders, leading to better project coordination.

Effective Risk Management, by identifying potential risks and establishing mitigation strategies, the Project Management Office contributes to a more predictable project environment.

Knowledge Sharing and Lessons Learned Project Management Office facilitate knowledge transfer across projects, preventing past mistakes from being repeated.

Conclusion:

The 2018 program highlights the limitations of project management approaches. Establishing a well-equipped Project Management Office, with clear Key Performance Indicators (KPIs), offers a structured and data-driven approach to project execution. This can improve productivity, enhance project control, and lead to achieving organizational goals on an operational level.

This revised version clarifies the importance of PMOs, uses the case study to illustrate the consequences of unprofessional implementation, and highlights the specific benefits that a PMO can bring to project success.

1.2 Theis Purpose To describing, studying impact of implementing Project Management Office as tool and how the performance of projects can be affected and improve on both long and short term for developing enterprises and improve process of delivering products.

1.3 Theis Objectives Thesis investigation was descriptive and depends on the researcher to Answering four basic questions

What is Operational management?

What is project management?

What is the relation between Projects management office management and projects Success?

What's percentage of positive or negative impact for Establishing projects management office?

1.4 Case Study researcher describe case study details, Within the context of the GOE to promote sustainable local development and create productive employment in the most needy governorates, an agreement was signed between the Government of Egypt and the World Bank for co-financing the local development program in Upper Egypt, Qena Governorate and Sohag for 957 million US with partial funding from the World Bank (217 million\$) and Sohag (283

million\$), which aims to raise the competitiveness and economic efficiency of local units to provide basic services and provide infrastructure Services for citizens. Enterprise that is responsible for executing this program.

Event	Date
Signing programme agreement with World Bank	October-2016
Parliament approves programme agreement Officially	January-2017
launching programme by the Minister of Investment and International Cooperation and Minister of Trade and Industry	March-2017
Transfer of 1 st first installment of loan allocations by World Bank in amount of \$ 125 million	June-2017
A decision was issued to host the coordination office at the Ministry of Local Development after classifying the programme as "unsatisfactory" by the World Bank	October-2017
1 st first meeting of the Programme Steering Committee was held under leadership of excellency Prime Minister	December-2017
organizational structure of the programme was developed, and implementation began to be implemented by conducting financial transfer for the two governorates	March-2018
Finalizing the signing of interagency agreements with the implementing agencies and starting procurement process and implementation of projects	August -2018
Changing programme classification at the World Bank from "not satisfactory" to "moderately satisfactory"	February-2019
Finalizing preparation of the strategic medium-term plan 2019-2022 for the two governorates	August -2019
Programme Mid-term review	January-2020

Table 1 UELDP History and Background

2-Literature Review

2.1 Introduction:

Projects Management Offices: The Bridge Between Strategy and Operations in today's dynamic business environment, translating high-level enterprise strategies into tangible operational results is a critical challenge. This is where Project Management Offices play a pivotal role. Projects Management Offices act as a bridge, ensuring enterprises do not just define goals but actively pursue them through well-managed projects.

Projects Management Offices Support Strategic Application on the operational level of leadership.

Projects Management Offices translate broad enterprise strategies into actionable project objectives. They break down strategic goals into manageable chunks, ensuring projects directly contribute to the organization's overall direction.

Projects Management Offices prioritize and select projects that best align with strategic priorities. By meticulously managing project portfolios, they ensure resources are directed towards initiatives with the highest strategic impact.

Projects Management Offices establish key performance indicators (KPIs) that track progress towards strategic objectives. This ongoing monitoring allows for course correction and ensures projects remain aligned with the evolving strategic landscape.

Projects Management Offices facilitate communication between various departments involved in strategic initiatives. This fosters collaboration, breaks down silos, and ensures everyone is working towards the same strategic goals.

Projects Management Offices capture lessons learned from past projects and share best practices across the organization. This knowledge base strengthens future project execution and contributes to achieving strategic goals more effectively.

Projects Management Definition Project management is the art and science of applying knowledge, skills, tools, and techniques to efficiently plan, execute, monitor, and control projects to achieve specific goals within defined constraints of scope, time, and budget.

Projects Management history concept of project management predates the term itself. Long before formalized methodologies, wonders like the Egyptian pyramids, the Roman Pantheon, and ancient aqueducts stand as testaments to humanity's ability to organize and execute large-scale endeavors. While the discipline of project management is a recent development, its roots run deep. The codification of project management practices, exemplified by the Gantt chart and the Agile Manifesto, allows us to identify key milestones in its evolution.

The Pre-History of Project Management Long before project management became a defined profession, humankind undertook incredible feats of construction. The pyramids of Egypt, built around 2500 BC, stand as a testament to this early project management. While the exact methods remain shrouded in some mystery, historical records reveal the presence of dedicated managers overseeing each of the pyramid's four sides. Similarly, the Great Wall of China, construction of which began in 208 BC, demonstrates pre-historic project planning. Records indicate meticulous organization of the workforce, divided into groups of soldiers, commoners, and even criminals. Millions participated in this colossal undertaking, highlighting the need for some form of resource allocation and scheduling.¹

The 19th century saw a growing emphasis on structure in construction, manufacturing, and transportation. This period marked the dawn of project management as we recognize it today. The building of the Transcontinental Railroad and the reconstruction of the American South after the Civil War exemplify these advancements. While formal task management, scope definition, and workload considerations might not have been explicitly documented, these projects undoubtedly involved leadership, budgeting (even if flexible), and some form of

¹ Watenga, E. K., & Kaburu, K. (2024). Project control and project performance of irrigation projects in Embu County, Kenya.

scheduling. Through experience, these early endeavors laid the groundwork for the formalized processes and refinements that define modern project management.

Projects Management developments and best practices

Effective project management requires a holistic view. It necessitates aligning project goals with the overall business strategy and considering how various project tracks interrelate. Successful project execution hinges on managing constructive collaboration across teams while acknowledging their interdependencies. Communication remains paramount, playing a critical role in program success. In recent years, a diverse range of methodologies and practices have emerged to address the increasingly dynamic nature of projects and evolving customer requirements²

PMI Practice Body of knowledge the widespread adoption of project management methodologies underscores the impact of applying knowledge, processes, skills, tools, and techniques on project success. The Project Management Institute (PMI) has established the PMBOK® Guide as a reference point for "good practices" in project management. These practices are widely recognized as valuable and applicable to most projects. However, the PMBOK® Guide is not a rigid rulebook. Project teams and

² Vilventhan, A. (2023). Analysis of project complexity factors and their interdependencies in metro rail projects.

organizations have the flexibility to adapt these practices based on specific project needs.

Establishing a Common Language and Ethical Framework

The PMBOK® Guide promotes a common vocabulary within the project management profession, fostering clear communication and collaboration. Additionally, the PMI Lexicon of Project Management Terms [1] provides a foundational set of terms used by project managers, program managers, and other stakeholders.

Standards and Flexibility: A Powerful Combination While the PMBOK® Guide offers foundational principles, it does not dictate a single methodology. Project managers can leverage various methodologies, like Agile, Waterfall, or PRINCE2, within the overall project management framework to achieve optimal results.

The Importance of Ethical Conduct

Beyond technical expertise, the Project Management Institute Code of Ethics and Professional Conduct [2] sets clear expectations for professional conduct. This code emphasizes core values like responsibility, respect, fairness, and honesty. Project managers are expected to uphold ethical standards, comply with relevant laws and regulations, and treat all stakeholders with respect. This code ensures a professional and ethical environment

for project management across diverse backgrounds and cultures. "PMPBOK 6th EDITION".

Project Governance. ensures that project objectives are aligned with the organization's overall strategy. The project sponsor and team play a crucial role in achieving this alignment. Project governance also considers how the project fits within a broader program or the organization's strategic goals. It is distinct from organizational governance, which focuses on broader organizational structures and policies.³

Organizational Governance. Organizational governance sets the strategic direction and performance benchmarks for an enterprise. These established criteria can impact projects, especially those delivering services subject to stringent organizational governance rules.

In the age of digital transformation, organizations are increasingly reliant on applications to achieve strategic goals. These applications, ranging from enterprise resource planning (ERP) systems to customer relationship management (CRM) platforms, form the backbone of various business functions. However, simply deploying applications is not enough. To maximize their value and ensure alignment with organizational

³ Howell, G., & Ballard, G. (2015). Implementing Lean Construction: Understanding and Action.

objectives, effective application strategy management (application of strategic management) becomes crucial.

This comprehensive literature review delves into the impact of application strategy management on various aspects of an organization. It explores the current research landscape, analyzing studies that examine how application of strategic management influences key performance indicators, fosters innovation, facilitates decision-making, and enhances security. Furthermore, the review identifies challenges associated with implementing successful application of strategic management practices and explores potential areas for future research.

2.2 Defining impact of Projects Management Office on operational level of leadership

Operational Leadership: Translating Plans into Action, in an organizational hierarchy, the operational level refers to the frontline positions personally responsible for carrying out the day-to-day tasks and activities that deliver the organization's products or services.

The operational level is all about execution. Individuals in these roles are focused on efficiently and effectively completing the core tasks that keep the organization running.

Operational level typically includes employees like production line workers, customer service representatives, cashiers, nurses,

or teachers, their responsibilities involve following established procedures, meeting performance targets, and directly contributing to the organization's outputs.

Operational level employees are typically supervised by middle managers who provide guidance and direction.

The operational level forms the organization's foundation, success directly impacts the organization's ability to deliver its value proposition.

Individuals in operational roles often have specialized skills and knowledge required to perform their tasks effectively.

The Projects Management Office provides resources (personnel, budget, tools) for project execution. Operational leaders then utilize these resources to manage their teams and deliver project activities.

Projects Management Office establishes KPIs to track project progress. Operational leaders monitor these KPIs and communicate them to their teams, ensuring alignment with project goals.

The Projects Management Office identifies potential risks and suggests mitigation strategies. Operational leaders then implement these strategies within their teams to minimize disruptions and ensure project success, Projects Management Office sets clear project goals and deliverables, providing

operational leaders with a roadmap for success, Projects Management Office offers guidance and best practices to operational leaders. This empowers them to make informed decisions while ensuring consistency across projects.⁴

Operational leaders provide the Projects Management Office with real-time insights from project execution. This feedback loop allows the Projects Management Office to adjust project plans and support strategies to address any emerging challenges.

This collaborative relationship between PMOs and operational leadership fosters a culture of accountability and results in, improved Operational Efficiency: Focusing resources on strategic projects directly contributes to overall organizational goals, Enhanced Project Delivery: Clear communication, defined expectations, and robust support from the PMO contribute to successful project execution, strategic Agility: The feedback loop allows for adjustments to projects based on real-time operational insights, ensuring the organization remains adaptable in a dynamic environment.

In conclusion, the Projects Management Office and operational leadership work together to bridge the gap between strategy and execution. By establishing clear direction, providing resources,

⁴ Nyman, H. J., & Öörni, A. (2023). Successful projects or success in project management: Are projects dependent on a methodology?

and facilitating communication, this partnership drives operational excellence and the achievement of the organization's strategic vision.

2.3 Empowering the Frontlines: How Project Management Tools Support Operational Leadership

The success of any organization rests on the shoulders of its operational leaders – the individuals who translate strategic plans into daily tasks and directly oversee the frontline workforce. In today's complex and dynamic business environment, equipping these leaders with the right tools is essential for maximizing their effectiveness and achieving organizational goals. Project management tools emerge as a powerful solution, bridging the gap between strategy and execution by empowering operational leadership to drive successful project delivery at the ground level.

2.4 The Challenges Faced by Operational Leaders:

- **Information Overload:** Operational leaders juggle multiple projects simultaneously, managing a constant flow of information from various team members, stakeholders, and external sources. This information overload can hinder clear decision-making and delay project progress.
- **Resource Constraints:** Operational leaders often face limited resources – personnel, budget, equipment – and need to optimize their utilization across projects. Traditional

methods of resource allocation can be inefficient and lead to bottlenecks or underutilized resources.

- **Communication Silos:** Effective communication is vital for ensuring everyone on the team is on the same page. However, operational leaders may face challenges with communication flow within their teams or across different departments involved in projects. This lack of transparency can lead to confusion, delays, and missed deadlines.
- **Risk Management:** Unforeseen issues and challenges are inevitable in any project. Operational leaders lack the tools to effectively identify and mitigate potential risks, leaving projects vulnerable to disruptions and delays.

How Project Management Tools Empower Operational Leadership:

- **Improved Visibility and Control:** Project management tools provide operational leaders with a centralized platform to track project progress, resource allocation, task completion, and deadlines. This real-time visibility empowers them to make informed decisions, identify potential problems early on, and take corrective action before they escalate.
- **Enhanced Resource Management:** These tools allow operational leaders to create resource pools, assign personnel and equipment to tasks, and track their utilization across

projects. This promotes efficient resource allocation, minimizes overallocation, and ensures the right resources are available at the right time for each task.⁵

- **Streamlined Communication and Collaboration:** Project management tools facilitate communication by providing a single platform for team members to share updates, collaborate on documents, and discuss project-related issues. This fosters transparency, improves information flow, and reduces the risk of misunderstandings.
- **Risk Management and Mitigation:** Many tools offer features for risk identification, assessment, and mitigation planning. Operational leaders can use these tools to proactively identify potential risks, prioritize them based on their impact and probability, and develop contingency plans to minimize their impact on the project schedule and budget.

2.5 Benefits for Operational Leaders and the Organization:

- **Increased Efficiency and Productivity:** By streamlining processes, optimizing resource allocation, and improving communication, project management tools empower operational leaders to complete tasks more efficiently and meet project deadlines consistently. This translates to

⁵ Howell, G., & Ballard, G. (2015). Implementing Lean Construction: Understanding and Action.

increased team productivity and improved overall project performance.

- **Enhanced Decision-Making:** Real-time data and insights provided by project management tools enable operational leaders to make data-driven decisions. They can analyze performance metrics, identify areas for improvement, and adjust project plans as needed to maximize success.
- **Improved Stakeholder Engagement:** These tools facilitate regular communication with stakeholders, keeping them informed of project progress and potential risks. This transparency fosters trust and collaboration, ensuring everyone is aligned with project goals.
- **Reduced Project Costs:** By optimizing resource utilization, preventing rework due to communication gaps, and proactively mitigating risks, project management tools can contribute to significant cost savings for the organization.⁶

⁶ Nyman, H. J., & Öörni, A. (2023). Successful projects or success in project management: Are projects dependent on a methodology?

2.6 Choosing the Right Project Management Tools:

The vast array of project management tools available can be overwhelming. When selecting the right tool for your needs, consider the following:

- **Organizational Size and Complexity:** Choose a tool that scales with your organization's needs. Smaller teams may benefit from simpler tools, while larger organizations might require more sophisticated solutions.
- **Project Types:** Consider the specific needs of the types of projects typically undertaken by your operational teams. Some tools are better suited for agile methodologies, while others excel in managing traditional, waterfall projects.
- **Integration Capabilities:** Ensure the chosen tool integrates seamlessly with existing systems used by your organization, such as CRM, accounting, or communication platforms.

2.7 Empowering Operational Leadership for Sustainable Success:

Investing in project management tools and training operational leaders on their effective use is not just a technological upgrade; it's a strategic investment in the organization's future success. By equipping these frontline leaders with the right tools, you empower them to make informed decisions, optimize resource utilization, mitigate risks, and ultimately, deliver projects on

time, within budget, and to a high standard. This empowers a culture of efficiency, accountability, and continuous improvement that drives the organization towards achieving its long-term goals.⁷

2.8 Construction Industry overview

Egypt's construction sector is a powerhouse of the national economy, experiencing phenomenal growth since the 1980s. While its global ranking dipped slightly from 33rd in 1998 to 36th in 2000, the sector's size impressively surged by 23%. This translates to a significant impact, contributing a hefty 4.7% to Egypt's GDP in 2001/2002 and employing a substantial 8.3% of the workforce. Construction investments during that same period were equally impressive, reaching a staggering 48.2% of the country's total investment.

2.9 Key Drivers of Construction Industry Growth

Several factors contribute to the Egyptian construction industry's success. They can be broadly categorized into five areas:

⁷ Project Management Institute. (2017). A Guide to the Project Management Body of Knowledge (PMBOK Guide) (Sixth Edition).

- **Construction enterprises:** A robust network of public and private contracting firms ensures a skilled and capable workforce.⁸
- **Government policies and strategies:** Official forecasts predict the construction sector to outpace overall GDP growth, with an anticipated average annual growth rate of 8.3% between 2002/2003 and 2006/2007. Additionally, government initiatives like the National Social Housing Project demonstrate a commitment to infrastructure development and meeting the needs of the population.
- **Available resources:** Egypt boasts a strategic location and a burgeoning population, projected to double in the next 25 years. This creates a continuous demand for housing, infrastructure, and commercial spaces.
- **Institutional backing and supporting industries:** Favorable trade agreements, competitive tax rates, and a thriving manufacturing sector for essential construction materials like steel and cement all contribute to a supportive environment.

2.10 Opportunities for Foreign Investors

⁸ Mousa Elshamly, A. B. (2013). Developing a strategic framework in small and medium sized enterprises (SMEs) [Unpublished master's thesis, The University of Gloucestershire].

The Egyptian construction market presents exciting prospects for international companies. Here are some key areas of opportunity:

- **Embracing Innovation:** There's a strong demand for sustainable and smart design solutions, where foreign expertise can play a valuable role.
- **Diverse Project Landscape:** From high-end real estate and tourist destinations to large-scale infrastructure projects and social housing initiatives, there's a plethora of diverse projects seeking qualified partners.
- **Public-Private Partnerships (PPPs):** The government actively encourages PPPs to finance public sector projects, creating openings for collaboration on schools, hospitals, and vital infrastructure.

2.11 Entering the Market: Partnering for Success

To successfully navigate the Egyptian construction market, finding a local agent or partner is highly recommended. This can provide several advantages:

- **Navigating Bureaucracy:** Local partners can help navigate administrative hurdles and expedite processes.
- **Bidding on Government Tenders:** Foreign companies often require a local agent to participate in government tenders.

- **After-Sales Service:** A local partner can provide crucial after-sales support, enhancing customer satisfaction and building long-term relationships.

2.12 Summary

Egypt's construction industry offers a compelling mix of a growing domestic market, a strategic location, and a government committed to infrastructure development. By embracing innovative solutions, partnering strategically, and capitalizing on these opportunities, foreign companies can be well-positioned to share in the sector's continued success.

3- Methodology

3.1 Introduction—Collecting and evaluating data from the UELDP program (case study), which is related to the thesis study factors. researcher describe case study details, Within The context of the GOE to promote sustainable local development and create productive employment in the most needy governorates, an agreement was signed between the Government of Egypt and the World Bank for co-financing the local development program in Upper Egypt, Qena Governorate and Sohag for 957 million US with partial funding from the World Bank (217 million\$) and Sohag (283 million\$), which aims to raise the competitiveness and economic efficiency of local units to provide basic services

and provide infrastructure Services for citizens. enterprise QWWC that responsible for executing this program UELDP.

Improving working environment and enhance the government's ability to provide high quality infrastructure services in Upper Egypt governorates	Program Development Objective
Five years from 2016-2021	Agreement Duration
957 million \$ (500 million \$ World Bank + 457 million \$ local component)	Program Budget
217 million \$ for Total Program Fund	WB Fund for QENA GOV

Table 2 UELDP Data

Case study on one of the program components which is infrastructures projects and improvement of services to locale deprived areas citizen in those governorates

Retenderin g	Contract s Under Signing	Under Construction	Tendering Process Projects NO.	PROJEC TS NO.	PROJECTS
0	0	10	10	10	Potable Water
6	2	3	10	11	Waste Water
6	2	13	20	21	SUM

Table 3 Infrastructure Projects Data

Projects Discription (House Connections – Gravity Networks – Pump Stations – Force Lines – WWTP (Wastewater Treatment Plant))

Projects Target The project serves 8 villages in (North Qena, Quoss, Abu Test) three clustering.

Execution of wastewater projects for villages in addition to the establishment of a WWTP with capacity of 29,000 m³ / day

3.2 Measurements Methodology to execute and proceed implementation of projects without Establishing the Structure of Projects Management Office negatively impacts results on the programme Targets.

This study is a descriptive study to be able to find the impact Projects Management Office, on projects management performance and how to link and indicates the direct relations between Establishing the Structure of Projects Management Office and the negative or positive impact, which reflected on achieving required level of performance case study.

Collecting history data related to projects owned to case study, to clear the role of Establishing the Structure of Projects Management Office as independent variable on projects management performance as dependent variable in both (private – public) sectors.

Projects history Researcher study case work on one of the program components which is infrastructures projects and

improvement of services to locale deprived areas citizen in those governorates the true start of those projects may-2018

Retendering	Contracts Under Signing	Under Construction	Tendering Process Projects NO.	PROJECTS NO.	PROJECTS
0	0	10	10	10	Potable Water
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Table 4 Projects Data

- **Projects Discerption** (House Connections – Slope Networks – Pump Stations – Force Lines – WWTP)
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- **Execution of wastewater projects** for villages in addition to the establishment of a WWTP with capacity of 29,000 m3 / day

3.3 H1: case study governmental agency will continue to execute and proceeding implementation of projects without establishing projects management office on the operational level and the negative impacts results by this method statement.

3.3.1 Statics for the project's component year 2018-2019 as follow: -

Items	Statistics	% for results
Completed contracts	3 projects out of 21	14.28%
Disbursement values	135 million EGP (Egyptian Pounds) out of 1003.35 million EGP	13.54 %
Physical progress	from May-2018 till May-2019	58%
Contracts contractual period	12 months	May-2018 expected end date May-2019

Table 5 H1 Results

According to the above Statics researcher shall illustrate reasons led those projects to fail and the impact of not establishing projects management office as supporting, controlling structure. **Table below** explaining forecasting results according to obtained statics and inaction of establishing projects management office, period from May-2019 to May-2021

Sr.	Item	Required	Findings till May-2021
1	Time	36 months	>48 months (about 4 years)
2	cost	100 %	>140 %
3	risk	low 0.5	high 1.00
4	Scope	Not finished	Major areas of scope creep unaccepted
5	Customer satisfaction	Not obtained	Not obtained

Table 6 H1 Findings

H1 Summary

- **Reasons that lead to failure in achieving targets according to: -**

- **Strategic management methodology and principals.**

Setting up Objectives: Objectives from projects are not defined as they must be internal or external. And according above H1 statistics this no assessment for recourses applied.

Fixation of Goals: Goals had not been defined, time-based points of measurement, goals of projects not included to enterprise goals

Policies: A policy encompasses the formulation and by not establishing objectives or including projects to enterprise strategy is missing.

Analysis of Environment: Business environment for this project had not been studied and described before starting, taking responsibility to execute this component.

Formulation: sub-strategies or alternative strategies were not available from top management.

Implementation of Strategies: Poor-designed strategies with missing parts to including new component led to failure in implementation.

Evaluation: the one of the Functions of projects management office, evaluating metrics after implementing plans. The projects management office should evaluate whether there is profit maximization or cost minimization or achievement of long term

or short-term goal whatever it may be. ("Strategic Management Process - Stages of Strategic Management") those elements neither been executed as per the projects nor updated to measure and evaluating procedures and percentages of mission accomplished

▪ **Projects management office methodology and principals: -** the unavailability of projects management office affects the execution of projects (time, cost, quality, scope, risk, resources & customer satisfaction).to analyze statics found on May-2019 and results according to hypothesis were found as below: -

Scope: according to poor strategy and not including the projects into enterprise strategy it led to poor define for projects scope and missing procedures in B.O.Q for potable water projects with huge quantities of V.O (Variation Order) (Variation Order)

Time: as projects included in enterprise strategy, strategic objective will transfer to Projects goals. And as Scope of the Projects clearly identified and synchronized with strategic objective. Projects goals decomposed into multiple manageable tracks for effective management and focus. The plan needs to be revisited and updated periodically. Adherence to Minor Serious Severe Major Catastrophic Almost Certain Likely Possible Unlikely Rare Extreme High Significant Moderate Low Mitigation action needed Manage carefully Manage routinely Legend Probability Severity Escalate to Steering committee Immediate action plan needed plan ensures predictability in

outcomes with following those steps senior management will grantee that all projects will end on contractually periods as it well planned, and time controlled

Cost: Budgeting involves taking the raw cost data from the estimating step, deciding which cost options to use, calculating their implication, and finally assigning cost codes to work packages. The project cost plan will also need to be structured in a way that is compatible with how the funds are being disbursed and it will need to be compatible with the enterprise's own accounting system. ("Project Cost Management - Online PMO")

Cost control is concerned with answering the questions: -

- 1) Are the projects on track in terms of cost to date?
- 2) Does it look as if this will continue?
- 3) if not, what action can be taken to remedy the situation?

Planned and Actual Costs concerned with answering the questions: -

- 1) The planned costs
- 2) The actual costs
- 3) Why they differ (assuming they do)
- 4) What you can do about it

The process of determining the difference between the planned costs and the actual costs is straightforward and there are several tools that can be used to quantify any 'variance'. A project

manager must report exactly where a project is in terms of costs against the planned budget. ("Managing Project Costs - free-management-ebooks.com") You will normally be expected to produce a variance report for the project sponsor detailing these figures.

One of the functions of a project management office is to be able to identify problems and to address them as soon as possible, before they become too big to fix. ("Managing Project Costs - free-management-ebooks.com")

The cost plan clearly defines how the costs on a project will be managed throughout the project's lifecycle. It sets the format and standards by which the project costs are measured, reported, and controlled. ("Managing Project Costs - free-management-ebooks.com") This plan identifies who is responsible for managing costs and who can approve changes to the project or its budget. It also specifies how cost performance is quantitatively measured and details report formats, frequency and to whom they are presented. ("Cost Management Plan Template - Free Management eBooks")

The work breakdown structure (WBS) is the basis for the cost plan because the costs are totaled or "rolled up" from the costs for the individual work packages in the WBS. ("Cost Management Plan Template - Free Management eBooks") "You can check out the complete range of project management pdf

eBooks free from this website.” (“Principles of Project Management Project Skills - Academia.edu”)⁹

Developing the cost plan may involve choosing strategic options to fund the projects such as: (“Managing Project Costs - free-management-ebooks.com”)

- Self-funding,
- Funding with equity, or
- Funding with debt.

The cost plan may also detail ways to finance project resources such as making, purchasing, renting, or leasing. These decisions, like other financial decisions affecting the project, may affect project schedule and/or risks. (“7.1.1 Plan Cost Management: Inputs”)

Plan Cost Management Finance Options: enterprise policies and procedures may influence which financial techniques are employed in these decisions. Techniques may include payback period, return on investment, internal rate of return, discounted cash flow, and net present value. (Chapter 7 - PMP Flashcards | Quizlet”) Forecasting list for V.O 40 % cost change from the estimated to true contractual values and while implementation

⁹ Newtown Square, PA: Project Management Institute. Savla, S. (2021). Effective Program Management Practices

Risk management activities in case of corrective actions taken in strategy and projects management. All risks be identified, analyzed, and mitigated to increase the probability of success for the program. Addressing risks helps in preventing surprises. For effective Risk management, some of the best Practices include:

- Enable Risk scoring framework to effectively measure the exposure of risks with respect to probability, impact, and costs of mitigation. Risk scoring also helps to escalate high risks to the steering committee for further action.
- Factor the risks (and rewards) in estimation models while working on a program. (“Effective Program Management.
- Identify risk triggers to take proactive action. Pitfalls to Avoid: Program manager should be aware about following pitfalls to avoid: (“Effective Program Management Practices
- Program managers should take input from all stakeholders along with review of historical risk logs. There is tendency to cloud the real risks by unilaterally managing risks based on own experience.
- Prepare Risk management plan at the start of the program. Risk management needs periodic monitoring as there is a high chance that impact, and probability of risks will change over different tracks and life cycles in the program.

- Confusions between Risks, Issues, Assumptions, and dependencies needs to be differentiated¹⁰

Resources: as strategic management principals been followed, required resources to reach targets will be available for no long-term resources, short-term forecasting to enterprise with all requirements that make resources active and enrollment in implementation project(program)

Quality: strategic management methodology insures on policies and updating this polices, vision while evaluation process will be done according to including component of projects in strategy and quality minor deviation will be approved by sponsor

Customer Satisfaction: impotency of this element during execution to end of delivering products customer satisfaction will be advantage to projects for study case according to procedures of strategic management that been updated and well application of professional projects management procedures

3.4 H2: case Study enterprise will hold on to execution for time (30 days) to establishing projects management office on the operational level and applying projects management methodology to support, leading projects and align it with the

¹⁰ United Nations Convention to Combat Desertification (UNCCD). (2016). Monitoring and Evaluation How to develop M&E plans [Workshop report]. Ouagadougou, Burkina Faso.

principals of projects management to achieving targets and minimizing negative impacts.

3.4.1 Statics for the project's component year 2018-2019 as follow: -

1- Items	Statistics	% for results
Completed contracts	15 projects out of 21	71.5%
Disbursement values	760 million EGP (Egyptian Pounds) out of 1003.35 million EGP	75.5 %
Physical progress	from May-2018 till May- 2019	78%
Contracts contractual period	12 months	May-2018 expected end date May-2019

Table 7 H2 Results

According to the above Statics researcher will starting applications of strategic management procedures and methodology according to below steps and assumed the impacts on projects study case and the results between two hypotheses will be compared and describing effects and purpose of thesis.

According to the above Statics researcher shall illustrate the impact of establishing projects management office as supporting, controlling structure.

Table below explaining findings results according to collected data, statics and establishing projects management office, period from May-2019 to May-2021

Sr.	Item	Required	Findings till May-2021
1	Time	36 months	< 39 months (about 3 and a half years)
2	cost	100 %	< 105 %
3	risk	Extremely low 0.5	Moderate 0.7
4	Scope	Completed 71.5%	Minor areas of scope creep accepted
5	Customer satisfaction	Obtained 75%	Obtained 100%

Table 8 H2 Results

3.4.2 H2 Summary

Projects management methodology and principals: -

As study case enterprise in construction sector researcher applicate PMI concept and principals limiting factor that affects the execution of a project (program, portfolio) (time, cost, quality, scope, risk, resources & customer satisfaction).to analyze statics found on May-2019 and results according to hypothesis were found as below: -

Scope: according to implementing sub-strategy and strategic procedures by including projects in to projects management office it will lead to well-define for projects scope and required procedures, minimizing factors of false B.O.Q and V.O will be controlled and ensures a project's scope is accurately defined and mapped and enables project managers to allocate the proper labor

and costs necessary to complete the project. “This is primarily concerned with what is and is not part of the scope.” (“Why Project Scope Is So Important - Planview Blog”) Processes involved in project scope management

Time: no true calculations had been done to required contractual periods required to implement projects and lead waste of time effects on all parts starting by procurement till contractors start implementation with neglect of updating strategy timeline with short-term objectives

Cost: by identify poor scope and missing strategy lead to scope creep and weak establishing true estimated values for projects and no updating in the stage of formulation with no forecasting list for V.O 40 % cost change from estimated to true contractual values and while implementation

Risk: An uncertain event or condition and according to statics analysis pure risk occurred as negative high impact and probability as below

- Contracts will end on time
- Cost will overrun regarding the estimated by 130%
- Scope creep will be available regarding false B.O.Q
- Customer satisfaction will not be obtained

Resources: as strategic management principals not been followed, required resources to reach targets will not be available for no long-term resources, short-term forecasting to enterprise

Quality: strategic management methodology insures on policies and updating this polices, vision while evaluation process cannot be done according to missing component of projects in strategy and quality reduction will not be approved by sponsor

Customer Satisfaction: impotency of this element during execution to end of delivering products customer satisfaction will be disadvantage to projects for study case according to missing procedures of strategic management and poor application of professional projects management procedures

4- Findings and data analysis

4.1Results Studying the theories of projects management office and established projects management office, the researcher collected data sourced through the use of questionnaires applied in various type of enterprises employees basically in construction industry and other enterprises such as educational, FMG and pharma sample reached 64 Person, led to conclusion as it will show in details that the percentage of failure highly increased in absence of projects management office role and clearing positive impact for using establishing projects management office in any type of enterprises to improve projects success and how to link projects

management office with projects management and the exchange impact for each variables.

4.1.1 Quantitative analysis

Structure of questionnaire and results

Personal information: the researcher collects jobs and positions information to segment the sample into groups which can indicate the effect of knowledge of practicing background

GENDER TYPE	MALE	FEMALE	TOTAL NO. OF SAMPLE
	30	4	34

Table 9 gender type results

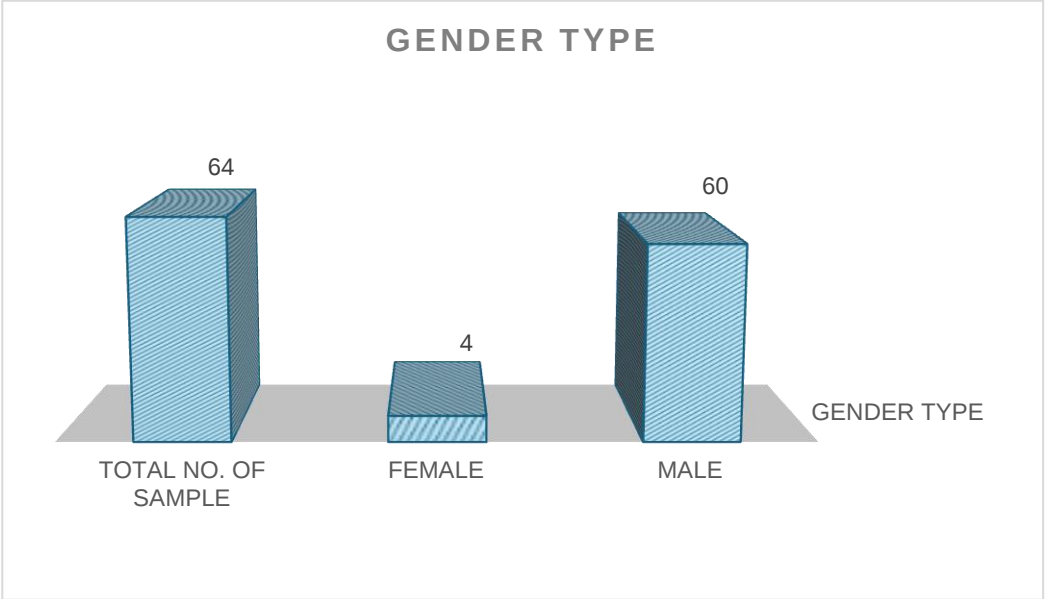


Figure 1 GENDER TYPE

ENTERPRISE SECTOR TYPE	PRIVATE SECTOR	PUBLIC SECTOR
	29.40%	70.60%

Table 10 Sector

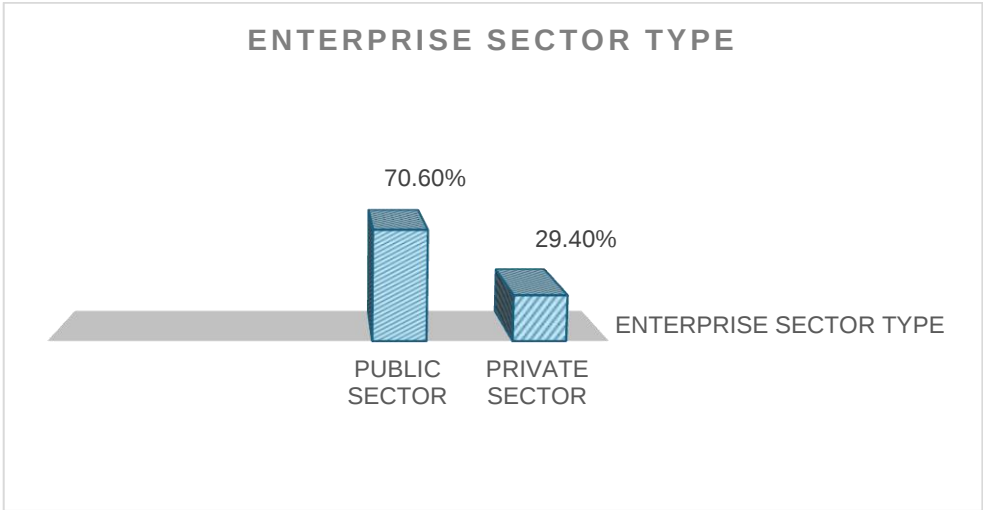


Figure 2 ENTERPRISE SECTOR TYPE

ENTERPRISE INDUSTRY TYPE	CONSTRUCTION SECTOR	EDUCATIONAL SECTOR	OTHER SECTOR S
	73.50%	11.80%	14.70%

Table 11 ENTERPRISE INDUSTRY TYPE

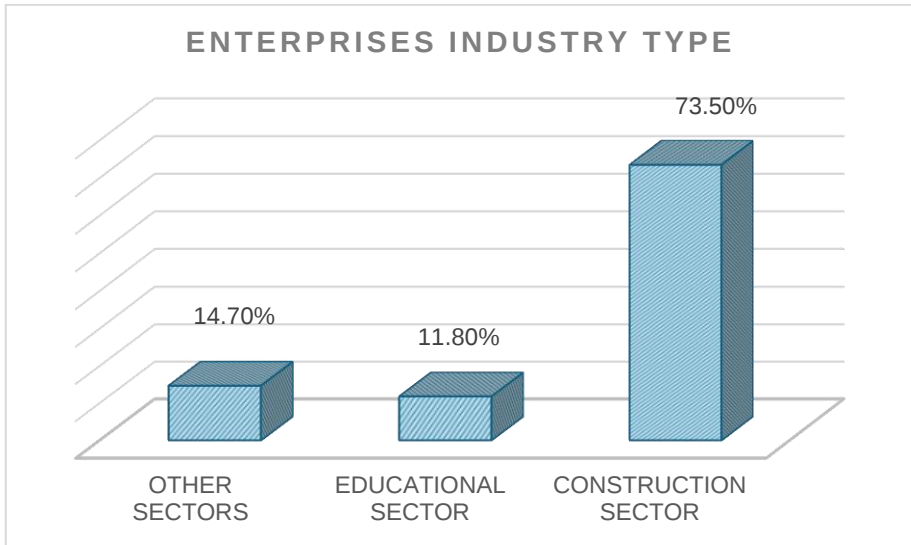


Figure 3 ENTERPRISES INDUSTRY TYPE

1. **Group 2 type** Application of Projects management through in your organization
2. **Group 3 type** link between Operational management and projects management
3. **Group 4 type** project management range of application and ability to implementation

GROUPS	ANSWERS %		
	YES	NO	MAYBE
TYPE 2 Application of Projects management through in your organization	64.80%	17.60%	17.60%
	47.00%	26.50%	26.50%
	64.70%	23.50%	11.80%
	47.10%	35.30%	17.60%
	32.40%	52.90%	14.70%
Group AVG	51.20%	31.16%	17.64%
TYPE 3 link between Operational management and projects management	52.90%	26.50%	20.60%
	23.50%	26.50%	50.00%
	47.10%	23.50%	29.40%
	47.10%	23.50%	29.40%
	52.90%	29.40%	17.70%
	79.40%	2.90%	17.70%
	41.20%	20.60%	38.20%
	41.20%	20.60%	38.20%
Group AVG	48.16%	21.69%	30.15%
TYPE 4 project management range of application and ability to implementation	58.80%	14.70%	26.50%
	32.40%	29.40%	38.20%
	61.80%	8.80%	29.40%
	91.20%	5.90%	2.90%
	44.10%	8.80%	47.10%
	58.80%	17.60%	23.60%
	55.90%	2.90%	41.20%
	55.90%	20.60%	23.50%
Group AVG	56.87%	13.39%	29.74%

Table 12 questionnaire answers %

4.2 Positive Impact of establishing Project management Office on operational leadership level: -

Increased Project Success Rates: Organizations with a PMO report a higher success rate in meeting project objectives. Studies suggest a jump from around 67% to as high as 92%.

Reduced Project Costs and Overruns: PMOs can help identify and mitigate risks, leading to better cost control. Studies indicate a potential reduction in cost overruns by up to 20%.

Improved Project Delivery Timelines: PMOs promote standardized processes and clear communication, potentially reducing project delays by up to 10%.

Enhanced Resource Utilization and Allocation: PMOs help organizations optimize resource allocation across projects, leading to increased efficiency and productivity.

Improved Stakeholder Satisfaction: Effective PMOs ensure clear communication and manage expectations, fostering a more positive experience for stakeholders involved in projects.

5- Conclusion and Recommendations

5.1 Main objective is to study the impact of projects management office on improving project management performance. To carry out research on this topic, the research question was based on looking at defining and explaining the impact of projects management office. The aim was to confirm if project management performance was affected was affected by the need of project management office due to the unlimited resources and the competitive environment. It was clear that every enterprise is aimed at creating value and obtaining a competitive advantage, the quantitative and qualitative techniques were used. Much theoretical work was also included in this research, including quoted topics from previous research, books.

Culture of projects management exists for more than **50%** of employees. Application and implementation of projects management methodology and establishing projects management office on the operational level, follow professional methods to achieving targets.

Impact of projects management office on projects performance in enterprises is a crucial factor to affects positively and more than **68 %** of employees aware of this impact and the importance of linking projects management office with the operational level of

leadership for short-term and long-term, improving the projects performance.

no Establishing of projects management office and linking this structure with operational level for the short and long-term objectives to projects had negative impact reach – **60 %** of all programme projects and facing the program to fail in to reach targets.

using a Project Management Office (PMO) to improve project management performance:

Strategic Alignment and Governance: Clearly Define Objectives: Articulate the specific goals you want the PMO to achieve. Is it reducing project costs, improving on-time delivery, or enhancing project quality?

Align with Organizational Strategy: Ensure the PMO's activities directly support the organization's overall strategic objectives. Prioritize projects that contribute most to achieving the strategic vision.

Establish a Governance Structure: Define clear roles and responsibilities for the PMO and project teams. This ensures accountability and fosters a culture of collaboration.

Standardization and Best Practices: Implement Standardized Methodologies: Develop and implement standardized project

management methodologies tailored to your organization's needs. This ensures consistency and reduces variability across projects.

Develop and Maintain Templates: Create templates for project documentation, such as plans, schedules, and risk assessments. These templates save time and promote consistency.

Promote Knowledge Sharing: Facilitate knowledge sharing between project teams. Capture lessons learned and best practices to inform future projects.

Project Management Support and Resources: Provide Training and Development: Equip project managers and team members with the necessary skills and knowledge through training programs and certification opportunities, offer Project Management Tools and Technology: Invest in project management software and tools to support planning, execution, and monitoring of projects.

Resource Management and Allocation: Develop a central resource pool and establish processes for allocating resources across projects to avoid overallocation.

Effective Communication and Performance Measurement:

Establish Clear Communication Channels: Ensure clear communication between the PMO, project teams, and stakeholders throughout the project lifecycle.

Define Key Performance Indicators (KPIs): Develop a set of KPIs to track project performance and progress towards objectives. These metrics should be measurable, relevant, and aligned with strategic goals.

Regular Reporting and Monitoring: Implement regular reporting cycles and dashboards to monitor project performance. Use these reports to identify issues and opportunities for improvement.

Continuous Improvement:

Gather Feedback: Regularly solicit feedback from project teams and stakeholders on the PMO's effectiveness.

Adapt and Improve Processes: Continuously evaluate and refine PMO processes based on feedback and emerging best practices.

Measure PMO Success: Track the impact of the PMO on project performance metrics like success rates, cost management, and timeliness.

Phased Implementation: Consider a phased approach to PMO implementation, starting with core functions and gradually expanding its reach.

Change Management: Obtain buy-in from stakeholders by clearly communicating the benefits of the PMO. Develop a

change management strategy to address concerns and ensure user adoption.

Maturity Model: Utilize a PMO maturity model to assess your current state and develop a roadmap for continuous improvement

5.2 The Indispensable Role of Project Management Offices (PMOs) in Driving Organizational Success

In today's dynamic business landscape, organizations face immense pressure to deliver projects on time, within budget, and to a high standard. This is where Project Management Offices (PMOs) emerge as a strategic asset, playing a critical role in ensuring project success and propelling organizational growth. This paper explores the multifaceted importance of PMOs, highlighting their impact on project management performance, strategic alignment, and overall organizational effectiveness.

Boosting Project Management Performance:

- **Standardization and Best Practices:** PMOs establish standardized methodologies and best practices for project execution. This ensures consistency across projects, reduces risk, and fosters a culture of excellence within project teams. Standardized templates for project documentation, such as plans, schedules, and risk assessments, streamline project initiation and ensure everyone is on the same page.

- **Enhanced Skills and Knowledge:** PMOs champion the development of project management skills and knowledge within the organization. Through training programs and certification opportunities, they equip project managers and team members with the necessary tools and strategies to navigate project complexities effectively.
- **Resource Optimization:** PMOs act as a central hub for resource management. By creating a central pool of resources and establishing processes for allocation, they prevent overallocation and ensure that the right resources are assigned to the right projects at the right time. This optimized utilization of resources leads to improved efficiency and cost savings.
- **Effective Risk Management:** PMOs proactively identify potential project risks and develop mitigation strategies. Through risk assessments and monitoring, they anticipate challenges and implement contingency plans to minimize disruptions and safeguard project success.
- **Improved Communication and Collaboration:** PMOs act as a communication bridge between stakeholders involved in projects. They facilitate clear communication channels, fostering collaboration and reducing silos. This ensures everyone is aligned with project objectives, informed of progress, and able to address issues promptly.

- **Knowledge Sharing and Continuous Improvement:** PMOs capture valuable lessons learned from past projects and facilitate knowledge sharing across the organization. This knowledge base helps project teams avoid repeating past mistakes and continuously improve project execution methodologies. By analyzing project performance data, PMOs identify areas for improvement and implement changes to enhance overall project management effectiveness.

Ensuring Strategic Alignment:

- **Translating Strategies into Action:** PMOs bridge the gap between high-level organizational strategies and operational realities. They translate broad strategic goals into actionable project objectives that directly contribute to the organization's desired outcomes. This ensures resources are directed towards projects with the highest strategic impact, enabling the organization to achieve its long-term vision.
- **Portfolio Management:** PMOs manage project portfolios strategically. They prioritize and select projects that best align with strategic priorities. This rigorous selection process ensures the organization is focusing its efforts on initiatives that deliver the most significant value in achieving its strategic goals.

- **Performance Measurement and Monitoring:** PMOs establish clear Key Performance Indicators (KPIs) for projects. These KPIs track progress towards strategic objectives and provide valuable insights into project performance. By monitoring these metrics, PMOs identify any deviations from the plan and facilitate course correction to ensure projects remain aligned with the evolving strategic landscape.

Empowering Organizational Excellence:

- **Improved Operational Efficiency:** PMOs contribute to increased operational efficiency by ensuring resources are directed towards strategically aligned projects with clearly defined goals. This focus eliminates wasteful activities and optimizes resource utilization, leading to enhanced operational performance.
- **Enhanced Stakeholder Satisfaction:** PMOs promote transparency and communication throughout the project lifecycle. By proactively managing stakeholder expectations and keeping them informed of progress, PMOs contribute to improved stakeholder satisfaction and a more positive project experience.
- **Increased Adaptability:** PMOs play a crucial role in enabling organizational agility. By continuously monitoring

project performance and tracking the evolving business landscape, PMOs can adjust project strategies to adapt to changing priorities and external factors. This flexibility ensures the organization remains competitive in a dynamic environment.

Beyond the Benefits: Implementing a Successful PMO

While the importance of PMOs is undeniable, their effectiveness hinges on proper implementation. Here are some key considerations for establishing a successful PMO:

- **Clearly Defined Objectives:** Articulate the specific goals you want the PMO to achieve.
- **Alignment with Organizational Strategy:** Ensure the PMO's activities directly support the organization's overall strategic objectives.
- **Phased Implementation:** Consider a phased approach to PMO implementation, starting with core functions and gradually expanding.
- **Change Management:** Obtain buy-in from stakeholders and develop a change management strategy to address concerns and ensure PMO adoption.

- **Maturity Model:** Utilize a PMO maturity model to assess your current state and develop a roadmap for continuous improvement.

Conclusion

In conclusion, PMOs are not just a project management tool; they are a strategic asset for organizations seeking sustained success. By promoting consistent project management practices, implementing a Project Management Office (PMO) can be a strategic decision with significant benefits for organizations seeking to elevate their project success rates. PMOs (Project Management Office) offer a centralized structure to standardize project management practices, cultivate a skilled workforce, and optimize resource allocation. This leads to improved project efficiency, increased control, and a greater likelihood of achieving project goals.

Recommendations The decision to establish a PMO should be based on a thorough assessment of your organization's project management maturity and specific needs. Here are some key considerations:

- **Clearly Define Objectives:** Articulating the desired outcomes establishing a projects management office shall

achieve to improve project delivery timeliness, reduce costs, and enhance project quality.

- **Select the Right PMO Model:** Different project management office models exist, each with varying levels of authority and scope. Choosing a model that aligns with organizational size and project complexity.
- **Invest in Resources:** Allocating sufficient resources for the projects management office operation, including skilled personnel, training programs, and project management tools.
- **Phased Implementation:** Considering a phased approach to projects management office implementation, starting with core functions, and gradually expanding its reach.
- **Change Management:** Obtaining buy-in from stakeholders across the organization. Effective communication and change management strategies are crucial for ensuring projects management office adoption and success.

Considering those recommendations and projects management office to organizations specific context, can leverage its potential to significantly improve project performance and drive organizational success.

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