

Decoding Success in IT projects: a Multi-Stakeholder Perspective

Haider Ali ¹

Author's Affiliation:

¹Ph.D. Scholar, Institute of Management and Administrative Sciences, The Islamia University of Bahawalpur, Pakistan

Article History:

Submitted: January 19, 2024

Revised: March 24, 2024

Accepted: March 27, 2023

Published online: March 30, 2023

Corresponding author(s):

Haider Ali

s21bmgmt4m01014@iub.edu.pk

ABSTRACT

Purpose—This study evaluated how effectively key stakeholders (project managers, team members, and clients) could predict I.T. project success. Every stakeholder had an independent perspective on the project's success, which made it possible to evaluate the project's success by considering all the stakeholders' points of view.

Study Design/Methodology/Approach—Two focus groups studied how project managers, teams, and clients could determine I.T. project success. The study focused on assessing I.T. project success from various perspectives. Five to six stakeholders from different sectors with personal experience in I.T. projects participated in that study.

Findings – The results suggested that successful I.T. projects that met business goals, improved operational efficiency, and produced significant returns on investments depended upon communication and teamwork, and equal participation by all stakeholders, the project success would be improved.

Practical Implications – The research implications for project management strategies are that organizations could enhance their capacity to work together and achieve project goals by incorporating multiple stakeholder perspectives. This approach promoted creativity and encouraged IT solutions that aligned with business objectives.

Originality/Novelty – Project managers monitored I.T. project execution to balance corporate goals with technology demands. Project teams produced high-quality deliverables and communicated well to overcome difficulties. Clients preferred I.T. solutions that met their company objectives, improved operational efficiency, and provided significant ROI.

Keywords: IT projects, Project success, IT projects-success, project managers, teams, clients, multi perspective frameworks, outcomes, multi-stakeholder perspective.

JEL Classification: M1, L2

1 | INTRODUCTION

Projects involving information technology (IT) facilitate organizational change and expansion. Annual worldwide investments in IT are steadily rising. In 2024, global IT expenditures are expected to reach \$5.1 trillion, up 8% from 2023, according to the most recent prediction ([Gartner-Inc, 2024](#)). For many years, Pakistan's IT sector has been among the fastest growing in the world and is currently expanding. In the first five months of the fiscal year 2023–24, Pakistan's information technology (IT) sector reported generating US

\$1,151.956 million in revenue from various IT services, marking a significant milestone. The most recent data from the Pakistan Bureau of Statistics (PBS) shows a notable gain of 5.89%, above the US \$1,087.929 million generated during the previous fiscal year ([Profit, 2024](#)). Pakistan's remarkable 78% annual growth rate makes it the fourth fastest-growing country globally ([Raza, 2023](#)). Most IT projects in Pakistan are outsourced from other nations, and because labor costs are low here, many multinational corporations have set up their offshore operations ([Rehman et al., 2023](#)). Globally, countries are attempting to create policies that will maximize the potential of their IT sectors. The Pakistani government is aware of the potential and encourages the growth of the global outsourcing industry's IT sector. These include income tax exemption for IT exports until June 2024, 100% repatriation of capital and dividends, and 100% equity ownership. The purpose of these investments is to help the business accomplish its goals and objectives. Organizations may experience multidimensional IT-based change because of IT, and these changes are becoming more project-based or configuration-based ([Pumplun et al., 2019](#)). Considering improvements in project management methods and strategies, a substantial percentage of IT projects fail. Over time, the rate of IT failure has remained high ([Flyvbjerg, 2021](#)). According to a KPMG study, 70% of firms have seen at least one project failure throughout the year ([Lim, 2020](#)). Only 16.2% of projects were finished on schedule, under budget, and with all the promised features ([Friedrich & Quick, 2024](#)). The remaining 31.1% of projects were canceled or abandoned, while 52.7% went over budget, were late, or failed to deliver on promised features. The PwC Global Project Management Survey included 10,640 projects from 200 organizations across 30 countries ([Cohen, 2019](#)). Just 2.5% of them achieved complete success. What happens to the remaining 97.5% of organizations? Either way, the deadlines and budget were missed, or the goals and scope needed to be fulfilled. To date, no empirical research or evidence has looked at the perspectives of the project manager, project team, and project clients to explore their differing viewpoints and determine whether or not they lead to success ([de Oliveira & Rabechini, 2019](#)). It is a crucial viewpoint since research indicates that stakeholder expectations and requirements, which often diverge from project management expectations, lead to the feeling of success ([Turner, 2009](#)). According to Tereso et al. ([2019](#)), project methods and frameworks have improved project outcomes and helped to solve low success rates by utilizing project-related knowledge.

In IT projects, the input received from teams, clients, and managers determines the duration, efficacy, and success; it includes more than the project's budget and timeliness ([Iriarte & Bayona, 2020](#)), as in today's rapidly changing IT world, a growing number of aspects, such as system functioning, user satisfaction, alignment with business goals, and realizing expected benefits, should be considered when determining success ([Muneeb et al., 2019](#)). To ensure the project's success, project managers manage problems, encourage teamwork, and coordinate technical requirements with business goals ([Ghorbani, 2023](#)). In any organization, project managers play a critical role in influencing customers perceptions of the success of IT projects by delivering outcomes that meet client expectations and addressing limitations, which need a diverse team with a range of skills and knowledge must collaborate to develop a plan for achieving the most significant outcomes for a project to be successful ([Cândido Da Silva et al., 2023](#)). Each project team member is essential for success by providing efficient results, clear communication, and effective problem-solving. The team's success is significantly impacted by its cohesiveness, abilities, and motivation ([DeLone & McLean, 2003](#)). When a client

hires I.T. projects to meet specific needs or opportunities, they have their unique viewpoint on the success of those projects, and then success is measured by how well the solution meets their needs ([Nagireddy, 2023](#)). Client success in project appraising will depend on usability, reliability, and system investment return ([Josyula et al., 2023](#)). I.T. projects must recognize and consider the diverse viewpoints of numerous stakeholders that play a vital role in promoting collaboration, innovation, and successful delivery of I.T. solutions within an organization ([Hussain et al., 2021](#)). Therefore, it becomes essential to consider stakeholders because they can directly or indirectly impact and influence the proceedings and success of the project ([Tell et al., 2016](#)). It is imperative to use good stakeholder managing practices and ensure all participants' communication requirements are met to ensure their support and association, which increases the chance of project success ([Siems & Seuring, 2021](#)). The researchers acknowledged that different stakeholders are involved in projects and that as time passes, perceptions may change. As such, the project manager must deal with these issues. In order to obtain insight into how success might be perceived beyond project completion, they examined success months and years after the project's conclusion, going beyond the confines of the traditional project lifecycle ([Alvarenga et al., 2019](#)). The study found that stakeholder management and involvement are essential to project success based on critical success factors.

This research aims to present a comprehensive methodology grounded on literature that lowers the project failure rate by aligning stakeholder views. Like critical path analysis, project management is frequently criticized for being practitioner-oriented and rigorous because of its heavy reliance on technology tools ([Turner, 2009](#)). In addition to identifying views from project managers, project teams, and stakeholder groups regarding projects, this study offers a more thorough knowledge of project success. There is a need for empirical study into the perspectives of various stakeholder groups, as seen by the disagreement among these three groups' assessments of project success determinants. The strategy was chosen by combining a theme analysis, coding framework, and rigorous literature research ([Jupir et al., 2022](#)). When analyzing perceptions of success, it is pronounced using thematic analysis that success components and procedures need to be looked at and improved. Despite visible failures, project management is characterized by an increasing number of professional bodies, standards, processes, and tools. Many resources have been invested in novel approaches to improve project success ([Olawumi & Chan, 2019](#)). Therefore, the goal of this article is to examine the success factors that project stakeholders believe are crucial to the notion of "project successes." how various stakeholders define success (the various criteria), the various elements they consider crucial to success, and the various perspectives they have about the project's progress. Gaining an improved understanding of how project success perceptions may be assessed can help stakeholders develop a common perspective on how to raise the project success rate.

2 | LITERATURE REVIEW

Research has demonstrated that assessments of the literature help determine a project's effectiveness ([Jugdev & Müller, 2005](#); [Turner & Zolin, 2012](#)). Industry perceptions of project failures indicate that further study is necessary to guide practice ([Kanski & Pizon, 2023](#)). The complexity of IT projects makes it challenging to define "success" because stakeholders may have differing opinions about the significance of

various criteria and how well a project performs in comparison to them ([Rodney et al., 2009](#)). For a thorough understanding, it is necessary to investigate the viewpoints of key stakeholders (project managers, teams, and clients) from multiple perspectives.

2.1 | Project managers perspective to Project Success

The success of a project is significantly influenced by the project manager's capacity to apply diverse leadership philosophies in various situations and project kinds, making the project manager's efficiency dependent on various circumstances and team characteristics ([Chughtai et al., 2023](#); [Khan et al., 2024](#); [Knights, 2021](#)). Project managers must be adaptable in order to choose the best leadership style in response to changes in specific scenarios if they are to succeed ([Chughtai et al., 2023](#); [Naseer et al., 2023](#); [Pankratz & Basten, 2014](#)). In I.T. projects from different industry-based organizations, the project manager plays a vital role in thinking that success is only associated with time, scope, and budget, as defined by Atkinson ([1999](#)). The perception of project managers was grouped into a recurring theme in which budget and cost were considered as factors in measuring project success ([Barclay & Osei-Bryson, 2010](#)), schedule and time ([Jugdev & Müller, 2005](#)), and quality ([Tukel & Rom, 2001](#)). The iron triangle (time, cost, quality) was used to assess success in previous studies. Having a focus on stakeholders (customers, team members, and end users, ([Müller & Turner, 2007](#); [Tukel & Rom, 2001](#)) and being 'people-oriented' ([Huang & Wang, 2006](#); [Turner & Müller, 2005](#)) are themes that are also consistent with the data in the previous sections. Regardless of whether the technology works, implementing the software ([Barclay & Osei-Bryson, 2010](#); [Belassi & Tukel, 1996](#)) was the last recurring theme. Several research areas were explored once, including cooperation among project team members ([Cooke-Davies, 2002](#)), establishing goals, product suitability, market feasibility ([Barclay & Osei-Bryson, 2010](#)), managerial and emotional competence ([Müller & Turner, 2007](#)), and commercial success of a project ([Barclay & Osei-Bryson, 2010](#)), the support of top management, client consultation, the availability of resources, agreement on success criteria between the project manager and end users ([Belassi & Tukel, 1996](#)), impact on customers, business and direct success, and strategic potential ([Jugdev & Müller, 2005](#)). Iriate and Boyana ([2020](#)) explain that client satisfaction, system performance, information reliability, and individual effect are all included in the methodology. Amies et al. ([2024](#)) also highlight the importance of stakeholder satisfaction and organizational performance for IT project success and Ghobrani ([2023](#)) explains that project managers frequently have different ideas about what defines success. Beyond set objectives, they could additionally take into consideration team contentment, creativity, and contribution to corporate learning, and their assessments of success are also impacted by the nature of the project, their values, and the atmosphere inside the organization ([Davis, 2014](#); [Pinto & Slevin, 1988](#); [Turner, 2009](#)).

2.2 | Project teams' perspective to Project Success

The study by Cooke-Davies ([2002](#)) found that the team can assess the project's success based on collaboration within the team ([Barclay & Osei-Bryson, 2010](#); [Cheng et al., 2021](#)). However, the owner only recognized the need for communication, not collaboration, in the user/end-user/client/consumer/customer stakeholder theme ([Long, 2024](#)). The study suggests that stakeholder groups need to work together to define project success, which may account for the disparities in definitions of success throughout stakeholder groups ([Loss et al., 2020](#)). Project Success, from a team viewpoint, extends beyond achieving project objectives as

DeLone and McLean (2003) state that team members prioritize excellent information, user satisfaction, and personal effect and emphasize the significance of information and system quality, user happiness, and individual impact. Achievement, team relationships, and collaboration are essential factors in how they view success, and the team's significance is frequently disregarded in the quest for project success (Davis, 2014). It also highlights the importance of team relationships, teamwork, and a feeling of accomplishment. An influential team culture promotes collaboration, minimizes misunderstandings, and collaborates efficiently to conquer obstacles and accomplish shared objectives, and an environment that encourages creativity and supports learning fosters growth (Edmondson, 2018; Ghorbani, 2023; Turner, 2009). Empowering and motivating teams to excel in IT projects involves shifting focus from technical aspects to acknowledging the significance of team dynamics, communication, and personal development (Josyula et al., 2023).

2.3 | Project client's perspective to Project Success

Clients view project success as achieving their business objectives and tangible outcomes. As Ika and Pinto (2022) highlight, achieving tangible business objectives and showing how this reduces costs, improves decision-making, and ultimately increases productivity is imperative (Barclay & Osei-Bryson, 2010). Increasing efficiency, cost savings, improved decision-making, and meeting predefined requirements contribute to client project success (Iriarte & Bayona, 2020). The primary themes were communication (Belassi & Tukel, 1996) and client perception of stakeholder satisfaction (acceptance and meeting needs) (Müller & Turner, 2007; Pinto & Prescott, 1990; Turner et al., 2009). According to Munns and Munns and Bjeirmi (1996), there was just one other recurrent pattern, and that was the client using the result. Turner et al. (2009) considered repeat business, as well as time and cost (Bryde & Robinson, 2005). According to the users (including end users, consumers and customers), quality (defined as meeting user needs) was the most recurrent theme (Jugdev & Müller, 2005; Munns & Bjeirmi, 1996; Turner et al., 2009). Another recurring theme was close co-operation/interaction (Cooke-Davies, 2002; Tukel & Rom, 2001). In addition to perceived values (Jugdev & Müller, 2005), the project was well accepted by users (Lim & Mohamed, 1999). Users utilized the finished product or project (Munns & Bjeirmi, 1996), and the project was sold to its intended consumer (Pinto & Prescott, 1990). It also satisfied the functional and technical requirements (Tishler et al., 1996), offered the asset's benefit, and yielded benefits in terms of availability, dependability, maintainability, cost, and time (Turner et al., 2009). The project must demonstrate tangible value to the client (Ghorbani, 2023). Clients can assess the project's impact and return on investment (ROI) by monitoring specific, achievable outcomes (DeLone & McLean, 2003) and guaranteeing project outcomes meet customers' expectations; it is crucial to comprehend how clients define and pursue success. As a result, clients may struggle to manage change, align internal stakeholders, and measure the true impact of the project (Ghorbani, 2023). Despite these challenges, there are opportunities for adopting a broader definition of success, encouraging collaboration, and leveraging technology to help stakeholders achieve a common goal (Berrone et al., 2023). I.T. projects are successful when project managers, teams, and clients understand their perspectives (Unegbu et al., 2022). Implementing a comprehensive approach that acknowledges the interrelated nature of different views can achieve success in I.T. projects.

2.4 | Research Questions

RQ1. *What do project managers consider when assessing IT project success?*

RQ2. *Do IT project teams have different definitions of IT project success?*

RQ3. *How do clients evaluate the IT project's success?*

2.5 | Contingency and Stakeholder Theories

Based on contingency and stakeholder theories, we know that different stakeholders may have different perceptions of the project outcomes for different projects ([Davis, 2018](#)). The project manager (a senior manager in charge) may have a different perspective than the project funder or client ([Zwikael & Meredith, 2019](#)). The contingency theory was derived from systems theory ([Aragón-Correa & Sharma, 2003](#); [Galbraith, 1974](#); [Lawrence & Lorsch, 1967](#)). It proposes that the present and future demands dictate each project's structure. The use of the contingency theory in project management ([Anbari, 1985](#); [Bredillet, 2007](#); [Söderlund, 2002](#)). The project managers, senior managers, end users, and those receiving and utilizing the final output are the stakeholder groups typically identified in the project management literature as being utilized to evaluate project success. The conceptual frameworks used to study project success are similar, according to a review of the literature on projects supported by contingency theory, in that they depend on a variety of accepted contingencies (like "time," "cost," "quality," "performance," "safety," "benefits," "financial," "internal business processes," "learning and growth," and "customer satisfaction") across the organization. However, the success or failure of the project is determined by the project manager's perception of these contingencies ([Morris et al., 2011](#)). As an outcome, Turner et al. (2010) developed the "contingency perspective." Stakeholder groups' changing characteristics for specific projects are a highly common contingency to manage, meaning that practices must always be adjusted ([Anbari, 1985](#); [Bredillet, 2007](#); [Söderlund, 2002](#)). The fact that project managers are assigned to every project may help to explain why they are frequently the only stakeholder group addressed when determining the success of a project. The utilization of diverse stakeholders' perspectives of project success has received minimal investigation, possibly because this element lacks a framework for measurement.

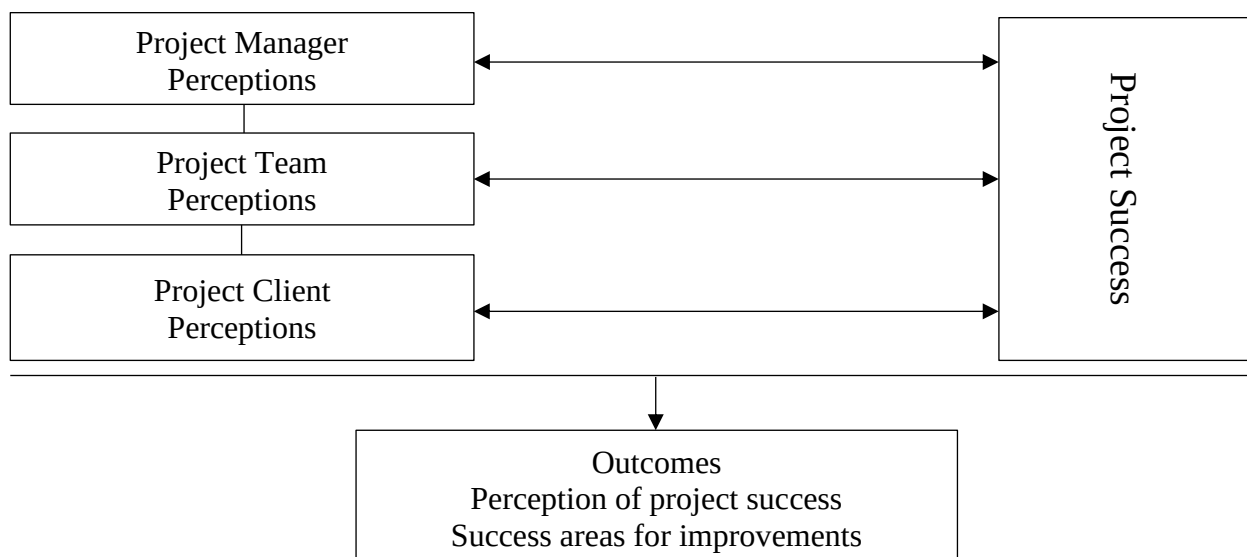
The stakeholder theory came into psychology ([Mitroff, 1983](#)). Afterward, Freeman and Moutchnik (2013) expanded and applied it to organizational strategy and strategic management. Thus, stakeholder participation and involvement greatly enhance the effectiveness of the organization. Therefore, according to the stakeholder theory, various organizations and individuals, including project managers, teams, users, others, and anyone else who can influence the project's progress, success, and end, would be considered project actors ([Freeman, 2010](#)). The theory focuses on how stakeholder groups within an organization manage their interests and the power and influence that are attributed to them. Since the organization needs to generate a profit for its investors and prioritize their needs, shareholders are traditionally seen as significant. In the stakeholder theory, value should be generated for all parties that have the potential to impact the business, such as suppliers and consumers ([Freeman et al., 2010](#)). Because it informs project managers on how to boost stakeholder involvement and participation in any project, which may result in project success, stakeholder theory may thus also be used in project management. The key to success could include stakeholders at every project life cycle

step, particularly during planning and requirement analysis. The chance of the project's success can be increased by explaining to project stakeholders the project's goal and strategy and how stakeholder management and engagement may lead to success.

The three stakeholder groups selected for the study are shown in Figure 1, along with their impact and link to the outcome. That suggests that the interactions between individuals working at various hierarchical organizational levels impact achievement. Empirical research evaluates the interactions between the project manager, project team, and project client stakeholder groups by looking at the similarities and contrasts in their perspectives of project success. The results will show which groups have tremendous success in common, if industrial success is consistent with that found in academic literature, and whether there are any specific areas where the three stakeholder groups' perceptions of success differ significantly. The current study suggests that several stakeholders should be included and questions the idea that a small group of stakeholders, typically only the project manager, can decide whether a project is successful or unsuccessful. In addition, it investigates the potential for creating a novel multiple-stakeholder theoretical model, which would allow for monitoring and evaluating a project's success or failure from the standpoint of several stakeholders instead of just the project manager.

Figure 1

Stakeholders for Project Success Model



3 | METHODOLOGY & DESIGN

This research investigated project success from the perspectives of project managers, teams, and clients using focus groups. Three main themes emerged from these focus group data thematic analysis (manual). In order to better understand the success of information technology projects, this study investigated the viability and validity of a model employing focus group studies (FGS) ([Subiyakto et al., 2015](#)), also used a theme analysis and coding methodology research to examine project success variables and stakeholders ([Davis, 2014](#)).

3.1 | Research Design

This study examined various perspectives of teams, clients, and project managers about the success of I.T. projects. The researcher examined essential stakeholders' different standards and expectations to understand how project success was defined and perceived in the context of I.T. projects. It employs a qualitative and exploratory strategy, focusing on these critical stakeholders' expectations and standards. Understanding human perspectives in their natural settings was a common strategy necessary for qualitative research to present a complete picture of the situation ([Creswell & Creswell, 2017](#)). Also, some other researchers explain that making connections and developing new theories was much easier using this approach ([Smith & McGannon, 2018](#)) before deciding on the qualitative technique, which helps delve further into the data and comprehend the value individuals attach to their experiences. Numerous qualitative traditions, including contexts of inquiry, examine participants' understanding of the topic under study ([Gibbs, 2014](#)).

3.1 | Sample and Sampling Techniques

A two-group (five to six critical stakeholders experience within the I.T. projects) was carried out which were selected through a purposive sampling method to find out how project managers, teams, and clients can determine the success of I.T. projects ([Campbell et al., 2020](#); [Etikan et al., 2016](#)). Purposive sampling techniques steer clear of random sampling and ensure that some instances of individuals who may be included are included in the research study's final sample. Using a purposive strategy is justified by the presumption that, in light of the study's goals and objectives, specific categories of individuals may have significant and divergent opinions regarding the concepts and problems under investigation, necessitating their inclusion in the sample ([Mason, 2017](#); [Robinson, 2014](#)).

This varied group supported in-depth and focused conversations because every group was the same, and people never felt pressured to fit in. Focus groups can be conducted individually to acquire different perspectives from stakeholders ([Gregory et al., 2020](#)). Scholars used focus groups to bring people together for discussion who have similar traits or experiences ([Krueger & Casey, 2015](#)). The focus group study employed a purposive sampling technique described by ([Palinkas et al., 2015](#)). Participants were selected based on their expertise in I.T. projects, specific roles (project manager, team member, or client), and availability. The data collection persisted until no new information or topics arose ([Guest et al., 2006](#)). A semi-structured interview guide facilitated open-ended focus group discussions with project managers, teams, and clients; the conversations were documented and converted into written form for examination. A thematic analysis (manual) was conducted based on the information obtained from the focus groups to identify themes and patterns ([Braun & Clarke, 2006](#)). It provided perspectives on the key factors contributing to the success of projects from project managers, teams, and clients involved in I.T. projects.

Table 1*Focus Group 1: Project Managers, Team Members, and Clients*

Interviewee	Role	Industry	Years of Experience	No of projects
PM-1	Project manager 1	Information Technology	10	15 (Managed)
PM-2	Project manager 2	Software Development	8	12 (Managed)
TM-1	Team Member 1	Information Technology	5	8 (Involved)
TM-2	Team Member 2	Data Analytics	20	10 (Involved)
C-1	Client 1	Telecommunications	5	3 (Engaged In)
C-2	Client 2	E-commerce	8	5 (Engaged In)

Table 2*Focus Group 2: Project Managers, Team Members, and Clients*

Interviewee	Role	Industry	Years of Experience	No of projects
PM-3	Project manager 3	Cybersecurity	12	20 (Managed)
PM-4	Project manager 4	Cloud Computing	9	13 (Managed)
TM-3	Team Member 3	Information Technology	11	18 (Involved)
TM-4	Team Member 4	Designer	8	17 (Involved)
C-3	Client 3	Automotive	4	5 (Engaged In)
C-4	Client 4	Healthcare	6	7 (Engaged In)

3.2 | Data collection

Data collection from a focus group study on IT project success involves several steps to ensure valuable insights were obtained and use purposive sampling to select participants with IT project experience as project managers, team members, or clients to ensure diversity in roles, experiences, and project types. To maintain a conducive environment that was comfortable, private, and minimally distracting. This semi-structured interview guide explores the different perspectives concerning stakeholders (project manager, teams, and client) to success. Audio-visual equipment captured verbal responses, non-verbal cues, and group dynamics. The data was then accurately transcribed and analyzed, and critical points, participant interactions, and any observations that could not be captured using an audio-visual recording were recorded. The purpose of the study, confidentiality measures, and data usage were clearly explained. Identify patterns, themes, and ideas related to project success from the perspectives of stakeholders, project managers, teams, and clients. It was done through transcription and analysis of audio recordings. Participant confidentiality, privacy, and autonomy were maintained throughout the data collection ([Kitzinger, 1995](#)).

3.3 | Data coding and analysis

It was essential to convert unprocessed qualitative data into insightful findings in order to analyze correctly and code the focus group results ([Palinkas et al., 2015](#)) and also to build fundamental knowledge;

the method was a thematic analysis (manual) entails attentively immersing oneself in the material through a comprehensive transcript study. First, the codes were used to record important concepts, words, and themes without restrictions, enabling an in-depth examination. Then, axial code was used to group these initial classifications into more comprehensive categories, making organizing the data into comprehensible portions easier. Secondly, creating key categories that capture evolving major themes allows for further refining and provides a more in-depth examination; also, the study contrasts and analyzes various data segments, revealing connections between codes, categories, and topics and helping to improve the coding structure. Creating a memo to record observations and theories helps to promote a better understanding and goes hand in hand with this procedure. In addition, looking for recurrent themes and links among instances, codes, and categories reveals underlying themes and linkages and adds to a thorough data synthesis. In order to strengthen the validity of interpretations, validation was subsequently guaranteed by reviewing the initial data and requesting participant input ([Iriarte & Bayona, 2020](#)).

4 | RESULTS AND ANALYSIS

The project goals and objectives needed to be clear, and everyone involved needed to be on the same page; any inconsistency resulted in higher expenses, disputes, and rework. In the project, the teams working together, and a robust communication channel are deemed crucial for the successful completion of the project. Poor leadership causes lower productivity, uncertainty, and a lack of direction. The success of an I.T. project depends on both human and technological aspects, which obtain the best outcomes; project managers need to strike a balance between technical competence and soft abilities. The purposive sampling, focus groups, and thematic analysis contributed to the study's conclusions and made this study more significant. A successful I.T. project requires technical and interpersonal attention to achieve the best results; project managers need to balance hard and soft capabilities, and to enhance its credibility further, participant checks were used to authenticate the results.

Figure 2
Manual Thematic Analysis

Aggregate Dimensions	1st Order Concepts	Participant	Reply
Project Manager	Team satisfaction and engagement	F1-PM1	In my experience, team satisfaction and engagement are absolutely crucial for achieving successful project outcomes. A team that is motivated, engaged, and feels valued is more likely to be productive, innovative, and adaptable throughout the project lifecycle.
	Fostering innovation and learning	F1-PM2	In today's rapidly evolving technological landscape, fostering innovation and learning is no longer a "nice to have" in IT projects; it's a critical driver of success.
	Contributing to organizational goals	F2-PM4	While ensuring the project meets its immediate goals (time, budget, scope) is crucial, I believe a successful IT project goes beyond that. It's equally important to ensure that the project aligns with and contributes to the broader strategic goals of the organization
Teams	Information and system quality	F2-TM-3	From my perspective as a team member, information and system quality are absolutely critical for successful project outcomes. When the information we work with is accurate, complete, and readily available, and the system we're building functions as intended, it makes a significant difference in our ability to deliver a successful project.
	User satisfaction and adoption	F1-TM-2	In my experience, user satisfaction and adoption are paramount for a successful IT project. While delivering a technically sound system is crucial, ultimately, its value lies in how well it meets the needs and expectations of the users.
	Individual impact and growth	F1-TM-1	In my opinion, individual impact and growth are intimately connected to successful IT project outcomes. When team members feel they've contributed meaningfully and developed their skills and knowledge throughout the project, it has a positive impact on both individual motivation and the overall project success.
Client	Alignment with strategic objectives	F1-C-1	From my perspective, alignment with strategic objectives is absolutely critical for successful IT projects. Ultimately, IT projects are investments we, as clients, make to achieve specific business goals. If the project doesn't contribute directly to our organization's strategic objectives, it can be considered a failure, regardless of meeting its immediate deliverables.
	Tangible business outcomes and value creation	F1-C-2	From my perspective, achieving tangible business outcomes and value creation is the ultimate measure of success for any IT project commissioned by a client. While meeting deadlines, budgets, and technical specifications is important, the true success lies in demonstrably improving our business operations and generating value for the organization.
	Return on investment (ROI) and long-term impact	F2-C-3	From my perspective, demonstrating a positive return on investment (ROI) and achieving a lasting long-term impact are the hallmarks of a truly successful IT project for a client. While meeting deadlines, budgets, and technical specifications is essential, the true measure of success lies in quantifiably improving our organization's financial position and future prospects.

Figure 3
Project Success World Cloud



4.1 | Project Managers' Perspective

Project managers are prioritized, and successful results are delivered. Their goals go beyond time, budget, and scope to include team satisfaction, innovation, and organizational goals. Also, a successful project manager always meets objectives within the budget, timeline, and scope ([Bannerman, 2008](#)).

“In my experience, team satisfaction and engagement are absolutely crucial for achieving successful project outcomes. A team that is motivated, engaged, and feels valued is more likely to be productive, innovative, and adaptable throughout the project lifecycle.” (PM-1)

“In today's rapidly evolving technological landscape, fostering innovation and learning is no longer a "nice to have" in IT projects; it's a critical driver of success.” (PM-2)

“While ensuring the project meets its immediate goals (time, budget, scope) is crucial, I believe a successful IT project goes beyond that. It's equally important to ensure that the project aligns with & contributes to the broader strategic goals of the organization.” (PM-4)

4.2 | Project Teams' Perspective

Teams perceive success as meeting technical milestones and fostering effective collaboration. They focus on user satisfaction, information quality, and individual impact. Teams also value a transparent communication system, learning opportunities, and recognition of contributions ([Bannerman, 2008](#)).

“From my perspective as a team member, information and system quality are absolutely critical for successful project outcomes. When the information we work with is accurate, complete, and readily available, and the system we're building functions as intended, it makes a significant difference in our ability to deliver a successful project.” (TM-2)

“In my experience, user satisfaction and adoption are paramount for a successful IT project. While delivering a technically sound system is crucial, ultimately, its value lies in how well it meets the needs and expectations of the users.” (TM-3)

“In my opinion, individual impact and growth are intimately connected to successful IT project outcomes. When team members feel they've contributed meaningfully and developed their skills and knowledge throughout the project, it has a positive impact on both individual motivation and the overall project success.” (TM-1)

4.3 | Clients' Perspective

Clients evaluate project success based on value delivery, business objectives, and ROI. They focus on achieving strategic objectives, delivering tangible business results, and creating long-term value. Their priorities are aligned with their business goals. Efforts are prioritized based on organizational goals, competitive advantage, and end-user requirements ([Bannerman, 2008](#)).

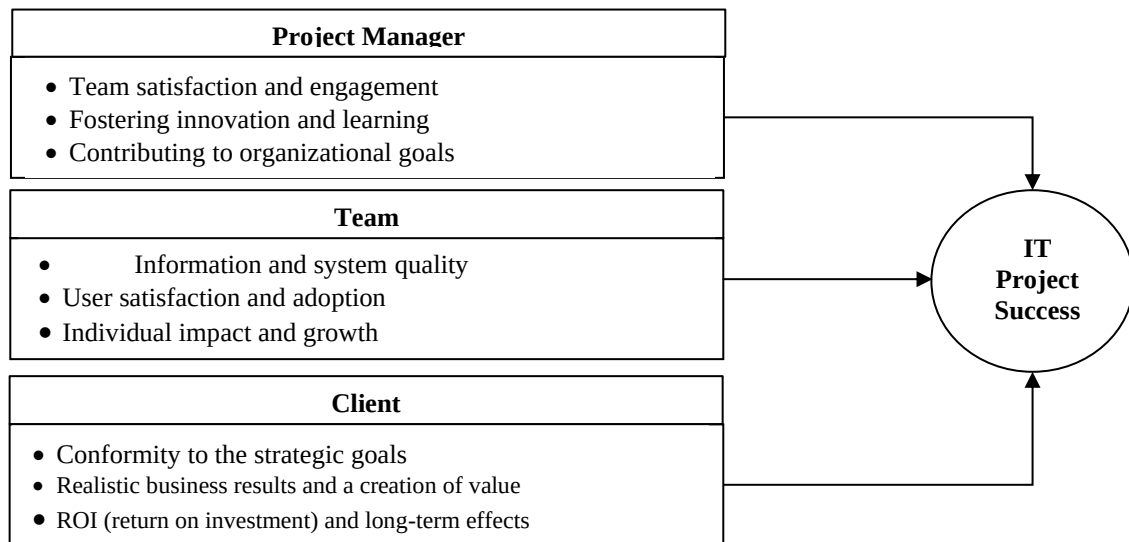
“From my perspective, alignment with strategic objectives is absolutely critical for successful IT projects. Ultimately, IT projects are investments we, as clients, make to achieve specific business goals. If the project doesn't contribute directly to our organization's strategic objectives, it can be considered a failure, regardless of meeting its immediate deliverables.” (C-1)

“From my perspective, achieving tangible business outcomes and value creation is the ultimate measure of success for any IT project commissioned by a client. While meeting deadlines, budgets, and technical specifications is important, the true success lies in demonstrably improving our business operations and generating value for the organization.” (C-2)

“From my perspective, demonstrating a positive return on investment (ROI) and achieving a lasting long-term impact are the hallmarks of a truly successful IT project for a client. While meeting deadlines, budgets, and technical specifications is essential, the true measure of success lies in quantifiably improving our organization's financial position and future prospects.” (C-3)

Figure 4

Framework of I.T Project Success according to Multi-Stakeholder Perspective



5 | DISCUSSION

In I.T. projects, project success is multifaceted. Managing I.T. projects requires understanding diverse perspectives from project managers, teams, and clients, as well as implementing strategies to communicate, collaborate, and measure after comparing to the traditional definition of project success, which focuses only on time, budget, and scope (the iron triangle), the study's findings explain a broader spectrum of outcomes in I.T. project success ([Yadav & Panda, 2022](#)). A project manager takes control of everything, such as encouraging creativity, promoting team contentment, and providing output for organizational growth. It helps project managers succeed and deliver sustainable and impactful results ([Maurer et al., 2021](#)). On the other hand, the team members prioritize individual efficiency, customer satisfaction, and the quality of the information related to the project, and the customer focuses on high priority on accomplishing goals, measurable results, and long-term value creation between the other stakeholders ([Fortino et al., 2020](#)). The multiple points of view or perceptions can help create collaboration technology and communication strategies that cater to the needs of particular stakeholders. Also, projects conducted with transparency, mutual understanding, and trust produce more significant results ([Yates et al., 2021](#)). Customizing stakeholder management strategies also ensures risk minimization, productive dialogues, and open communication to prevent future conflicts resulting from differing views on success. Every individual point of view in the organization matters, and to achieve multifaceted success in I.T. projects, companies need to foster a culture of cooperation, open communication, and ongoing learning ([Rusconi, 2019](#)).

5.1 | Conceptual Framework

The objective of this framework was to represent the perspectives of project managers, teams, and clients in the complex nature of successful I.T. projects with greater emphasis on stakeholder participation, cooperation, and accomplishing goals above technical delivery, going beyond the conventional iron triangle of time, budget, and scope. I.T. project success in this framework, considering stakeholders' points of view,

such as encouraging ownership, cooperation, and communication, was addressed, and it encouraged a comprehensive approach. The multi-perspective project success framework is a helpful and informative starting point for I.T. project success. Researchers determine that different stakeholders may have varying perspectives on the project successes for different projects based on stakeholder and contingency theories, pointing out that the client or project investor might see the project from an entirely different perspective than the project manager ([Mashali et al., 2023](#)). By recognizing stakeholders' divergent perspectives, emphasizing teamwork, and using a comprehensive assessment methodology, project managers may effectively negotiate the complex aspects of information technology projects and ensure successful outcomes for every stakeholder.

5.2 | Implications

This research was grounded in contingency and stakeholder theory, which emphasizes the significance of fulfilling stakeholder needs ([Harrison et al., 2010](#); [Leisyte & Westerheijden, 2014](#)) and acknowledges that there are multiple approaches to project management ([Anbari, 1985](#); [Bredillet, 2007](#); [Söderlund, 2002](#)). When project managers use contingency theory, they have to cope with contradictory feedback from various stakeholders, which can make the project appear unsuccessful. It is suggested to create a new multiple-stakeholder theoretical model with stakeholder opinion at its core, one in which project success is measured using hitherto unexplored dimensions that have developed from the opinions of experts and practitioners. Because the concept is based on anonymity, it prevents conflict amongst stakeholders while allowing their opinions to be expressed and considered for the best possible project conclusion. The agreement to exploit the success of specific initiatives will be made possible by compiling opinions by an unbiased third party. To support the assertion that it would be stakeholder-centered, the model will employ a viewpoint that all stakeholders acknowledge as essential to project success rather than a perspective obtained from a single stakeholder group. As a result, by changing how success is perceived, this method will improve the dynamic involvement of stakeholders and the capacity to adapt to potentially shifting goals of various stakeholders. It is suggested that by utilizing the model, organizations can select success perceptions more precisely, resulting in better decision-making, employee motivation, and, ultimately, a more productive organizational culture, all of which will support the successful completion of projects. There is no single documented stakeholder-centered approach in the project management literature. When creating KPIs to ensure success perceptions are satisfied, the model will include divergent opinions from various stakeholders, as demonstrated by the interview findings.

The research uses contingency theory to demonstrate how effective project management relies on understanding how internal and external elements will impact the ultimate result and how they may alter during the project. According to this notion, successful project managers use their interpersonal talents to provide stakeholders accountability and structure. The results of this study revealed evident differences in the views of project management, project core team, and project client stakeholder groups on success. However, this will only ensure success. The qualitative study's findings show that each stakeholder group prioritized distinct project performance indicators and validated common assumptions among practitioners. That will develop a multiple-stakeholder theoretical model based on the empirical data-driven perceptions of project success. The model will be used to create a platform that allows stakeholders to work together, capture and manage

expectations, maintain their participation, and enable the tracking of the objectives of each stakeholder group. According to preliminary testing results, using it throughout the project lifetime will raise the consensus about project success rather than failure. The different perspectives of teams, clients, and project managers on the success of IT projects have significant consequences in theoretical, practical, and contextual areas. Multiple perspectives require a comprehensive approach considering long-term impact, customer value, and team satisfaction. Thus, a comprehensive yet detailed perspective on project success is possible for this purpose. The study suggests the contingency theory to project management aligns with the understanding that different people may have quite different definitions of success, and upon the specifics of the project, including the company's culture, stakeholder objectives, and best practices, and by examining these distinctions from several angles can help enhance contingency theory. Different industry-specific prerequisites for success differ, and project managers can customize their strategy to the requirements of their organization by employing a multi-perspective approach. In information technology project-based organizations, various strategies contribute to improved communication, teamwork, and overall project success, which also help recognize the interdependence of technologies and can assist them in achieving their respective successes as they develop.

5.3 | Recommendations and Future Research

It was noted that the literature examined for this study is mainly restricted to project management literature that identified areas in which stakeholder groups may be involved in development. Further research may integrate the findings with the literature on stakeholder management in mainstream management theory and other recently developed project conceptualizations, including networks, power dynamics, accountability, globalization, instability, corporate social responsibility, and evolving work organizational models. This study suggests doing more in-depth interviews and using an action research technique with a larger audience in more public and private organizations. Only 12 qualitative interviews were conducted since the information gathered helped shape the survey instrument that was eventually developed. Given that the stakeholder perception of success was the focus of the research questions related to collecting and interpreting empirical data, this indicates that a sufficient number of participants in the quantitative survey stage of the study is required to enable group comparisons. The qualitative study's conclusions will be expanded into a quantitative analysis to determine if the preliminary results are held for a more significant sample of stakeholders. An idealized multi-stakeholder model will be developed using the findings of the two studies, considering all the critical factors determining a project's success.

This study gives the backdrop for a suggested collection of articles. These findings have been published ([Davis, 2014](#)). It gives the "what" (the success dimensions and stakeholders' opinion of these), the "who" (the identified stakeholders), and the "when" (reviewing the success dimensions literature across time). The "how" (by looking at the ways that project success factors are currently measured) ([Davis, 2016](#)). This article tackles the "where" (by empirically investigating stakeholders in both public and private companies) and the "why" (empirical research to design and evaluate a suggested approach to determine why the selected dimensions are acknowledged as significant by the different stakeholder groups). Further areas will tackle the "so what" aspect to understand better how project success perceptions can be assessed. It will enable a common stakeholder

perspective on project success since a successful project stimulates motivation, enhances communication, fosters better teamwork, and boosts productivity.

This study provides a clear picture regarding how difficult it is for I.T. projects to be successful, considering the different stakeholder viewpoints highlighted and the need for additional study and helpful recommendations. The project management success indicators must consider the needs and expectations of teams, clients, and project managers. The iron triangle and factors like long-term profitability, employee motivation, and customer satisfaction may be considered. In all project life cycles, from start to end, managers should prioritize having regular, understandable, and clear communication with team members, enabling proactive demand adjustments, expectation management, and transparency. Collaborative platforms can improve stakeholder interaction and information exchange during the entire life cycle process. On that basis, team members and project managers must prioritize strong team dynamics and a culture of continuous improvement. Also, possible remedies include team-building activities, information-sharing sessions, and opportunities for team members to pick up new skills. On the other hand, cooperation between project teams and clients is essential to match customer needs with project goals.

Understanding the needs and expectations of the client and constantly assessing the project's value contribution is essential, as the work environment influences different stakeholder groups' perceptions of project success, and different cultures may prioritize different success elements differently, which is something to be investigated via research. Research is required to investigate success frameworks that are industry- or project-specific, considering the impact of several aspects such as user demographics, project complexity, and regulatory environment. Examining long-term value generation, user adoption, and contributing to client strategic goals are crucial aspects of project success that should be considered. A multi-perspective approach may help assess a project's progress utilizing technology and data analytics. Novel methods and tools for compiling and integrating data from different stakeholder groups may be developed, allowing for more in-depth and data-driven project assessment. These recommendations may be implemented, and further study might be conducted to learn more about the factors contributing to I.T. projects' success. It will result in a more value-driven, effective, and efficient approach.

6 | CONCLUSION

This study filled a knowledge gap by comparing the viewpoints of various stakeholder groups to encourage better understanding. The distinctive addition to academic knowledge enhances the rigor of research on project management, identifying the characteristics of project success as seen by various stakeholder groups. The body of knowledge has expanded due to the discovery that various stakeholder groups with differing viewpoints in the literature value different vital aspects; hence, not all stakeholders place equal value on them to achieve project success. Through empirical study, new areas of improvement for [Pinto and Slevin \(1987\)](#) instrument to examine stakeholder perceptions of project success are identified, adding to the body of knowledge. Project managers increasingly use a stakeholder approach ([Littau et al., 2010](#)). Stakeholders' contributions may be seen in the project's ability to grow, share responsibilities, and attain sustainability. During the critical decision-making stages of a project's inception, planning, and execution,

stakeholders might be helpful. states that stakeholders are crucial in project needs, resource allocation, and budgetary management. With their support, projects can advance and succeed. Establishing long-term relationships with project stakeholders ensures customer satisfaction, and building integrity and trust leads to organizational growth and achieving end-user objectives. Any project's flexibility to incorporate stakeholders improves change management as it moves forward ([Kelly, 2015](#)). Finally, the most critical components of a successful project are customer and stakeholder satisfaction. Therefore, it becomes crucial for enterprises to include stakeholders, create efficient lines of communication with them, and inform them regularly about any developments. Project success is attained by comprehending the role of stakeholders at each stage of the project life cycle as well as their worries and expectations ([Lohrey, 2020](#)).

Acknowledgment: The authors would like to express their sincere thanks to the editor and the anonymous reviewers for their helpful comments and suggestions.

Author Contributions: Conceptualization, H.A.; methodology, H.A.; software, H.A.; validation, H.A., and H.A.; investigation, H.A.; data curation, H.A.; writing—original draft preparation, H.A.; writing—review and editing, H.A. All authors have read and agreed to the published version of the manuscript.

Declaration of Conflicting Interest: The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

Copyright: This is an open-access article, free of all copyright, and may be freely reproduced, distributed, transmitted, modified, built upon, or otherwise used by anyone for any lawful purpose. This work is published under the license “[Creative Commons Attribution 4.0 International License](#)”.

Funding: The author(s) received no financial support for the research, authorship, and/or publication of this article.

Data Availability Statement: Data that supports the findings of this study are available on request from the corresponding author.

Plagiarism Statement: This article was scanned by the plagiarism program. No plagiarism was detected.

Disclaimer/Publisher’s Note: The statements, opinions, and data contained in all publications are solely those of the individual author(s) and contributor(s) and not of publisher “AGASR” and/or the editor(s). The Publisher AGASR and/or the editor(s) disclaim responsibility for any injury to people or property resulting from any ideas, methods, instructions, or products referred to in the content.

REFERENCE

- | | |
|--|--|
| <p>Alvarenga, J. C., Branco, R. R., Guedes, A. L. A., Soares, C. A. P., & da Silveira, W. (2019). The project manager core competencies to project success. <i>International Journal of Managing Projects in Business</i>, 13(2), 277-292.</p> | <p>Amies, P., Jin, X., & Senaratne, S. (2024). Critical Success Factors Over Lifecycle of Dam Engineering Projects. <i>Engineering Management Journal</i>, 1-15.</p> <p>Anbari, F. T. (1985). A systems approach to project evaluation. <i>Project management journal</i>, 16(3), 21-26.</p> |
|--|--|

- Aragón-Correa, J. A., & Sharma, S. (2003). A contingent resource-based view of proactive corporate environmental strategy. *Academy of Management Review*, 28(1), 71-88.
- Atkinson, R. (1999). Project management: cost, time and quality, two best guesses and a phenomenon, its time to accept other success criteria. *International Journal of Project Management*, 17(6), 337-342.
- Bannerman, P. L. (2008). Defining project success: a multilevel framework. Proceedings of the Project Management Institute Research Conference,
- Barclay, C., & Osei-Bryson, K.-M. (2010). Project performance development framework: An approach for developing performance criteria & measures for information systems (IS) projects. *International Journal of Production Economics*, 124(1), 272-292.
- Belassi, W., & Tukel, O. I. (1996). A new framework for determining critical success/failure factors in projects. *International Journal of Project Management*, 14(3), 141-151.
- Berrone, P., Rousseau, H. E., Ricart, J. E., Brito, E., & Giuliadori, A. (2023). How can research contribute to the implementation of sustainable development goals? An interpretive review of SDG literature in management. *International Journal of Management Reviews*, 25(2), 318-339.
- Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative research in psychology*, 3(2), 77-101.
- Bredillet, C. N. (2007). Project management: Achieving competitive advantage. In: JSTOR.
- Bryde, D. J., & Robinson, L. (2005). Client versus contractor perspectives on project success criteria. *International journal of project management*, 23(8), 622-629.
- Campbell, S., Greenwood, M., Prior, S., Shearer, T., Walkem, K., Young, S., Bywaters, D., & Walker, K. (2020). Purposive sampling: complex or simple? Research case examples. *Journal of research in Nursing*, 25(8), 652-661.
- Cândido Da Silva, E. A., Bizarrias, F. S., Penha, R., Silva, L. F. d., & Pedron, C. D. (2023). The customer perception of project value scale: development and validation. *European Business Review*, 36(3), 335-360.
- Cheng, X., Bao, Y., Yu, X., & Shen, Y. (2021). Trust and group efficiency in multinational virtual team collaboration: A longitudinal study. *Group Decision and Negotiation*, 30, 529-551.
- Chughtai, M. S., Khalid, Y., Guan, R., & Razzaq, T. (2023). When Does Leadership Humility Nurture Career Success: A Moderated Mediation Model of Career Adaptability and Proactive Personality. *Journal of Innovative Research in Management Sciences*, 4(1), 35-53.
- Chughtai, M. S., Syed, F., Naseer, S., & Chinchilla, N. (2023). Role of adaptive leadership in learning organizations to boost organizational innovations with change self-efficacy. *Current Psychology*, 1-20.
- Cohen, B. J. (2019). *Advanced introduction to international political economy*. Edward Elgar Publishing.
- Cooke-Davies, T. (2002). The "real" success factors on projects. *International journal of project management*, 20(3), 185-190.
- Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage publications.
- Davis, K. (2014). Different stakeholder groups and their perceptions of project success. *International journal of project management*, 32(2), 189-201.
- Davis, K. (2016). Identifying an appropriate measurement method for the perception of project success of different stakeholder groups. *International journal of project management*, 34 (3), 480-493.
- Davis, K. (2018). Reconciling the views of project success: A multiple stakeholder model. *Project management journal*, 49(5), 38-47.
- de Oliveira, G. F., & Rabechini, J., Roque. (2019). Stakeholder management influence on trust in a project: A quantitative study. *International Journal of Project Management*, 37(1), 131-144.
- DeLone, W. H., & McLean, E. R. (2003). The DeLone and McLean model of information systems success: a ten-year update. *Journal of Management Information Systems*, 19(4), 9-30.
- DeLone, W. H., & McLean, E. R. (2003). The DeLone and McLean Model of Information Systems Success: A Ten-Year Update. *Journal of Management Information Systems*, 19, 30 - 39.
- Edmondson, A. C. (2018). *The fearless organization: Creating psychological safety in the workplace for learning, innovation, and growth*. John Wiley & Sons.
- Etikan, I., Musa, S. A., & Alkassim, R. S. (2016). Comparison of convenience sampling and purposive sampling. *American journal of theoretical and applied statistics*, 5(1), 1-4.
- Flyvbjerg, B. (2021). Top ten behavioral biases in project management: An overview. *Project management journal*, 52(6), 531-546.
- Fortino, G., Messina, F., Rosaci, D., Sarné, G. M., & Savaglio, C. (2020). A trust-based team formation framework for mobile intelligence in smart factories. *IEEE Transactions on Industrial Informatics*, 16(9), 6133-6142.
- Freeman, E., & Moutchnik, A. (2013). Stakeholder management and CSR: questions and answers. *uwf UmweltWirtschaftsForum*, 21(1), 5-9.
- Freeman, R. E. (2010). *Strategic management: A stakeholder approach*. Cambridge university press.
- Freeman, R. E., Harrison, J. S., Wicks, A. C., Parmar, B. L., & De Colle, S. (2010). Stakeholder theory: The state of the art.
- Friedrich, C., & Quick, R. (2024). Do non-audit service failures impair auditor reputation? An analysis of KPMG advisory service scandals in Germany. *Critical Perspectives on Accounting*, 98, 102550.
- Galbraith, J. R. (1974). Organization design: An information processing view. *Interfaces*, 4(3), 28-36.

- Gartner-Inc. (2024). *Gartner Forecasts Worldwide IT Spending to Grow 8% in 2024*. <https://www.gartner.com/en/newsroom/press-releases/2023-10-18-gartner-forecasts-worldwide-it-spending-to-grow-8-percent-in-2024>
- Ghorbani, A. (2023). A review of successful construction project managers' competencies and leadership profile. *Journal of Rehabilitation in Civil Engineering*, 11(1), 76-95.
- Gibbs, G. R. (2014). Qualitative Analysis. *Qualitative Data Analysis*, 277.
- Gregory, P., Strode, D., Barroca, L., Sharp, H., & Taylor, K. (2020). Stakeholder perceptions of IT business value in a public sector IT digitalisation project.
- Guest, G., Bunce, A., & Johnson, L. (2006). How many interviews are enough? An experiment with data saturation and variability. *Field methods*, 18(1), 59-82.
- Harrison, J. S., Freeman, R. E., Wicks, A. C., Parmar, B. L., & De Colle, S. (2010). Stakeholder theory: The state of the art.
- Huang, C.-L., & Wang, C.-J. (2006). A GA-based feature selection and parameters optimization for support vector machines. *Expert systems with applications*, 31(2), 231-240.
- Hussain, A., Jamil, M., Farooq, M. U., Asim, M., Rafique, M. Z., & Pruncu, C. I. (2021). Project managers' personality and project success: moderating role of external environmental factors. *Sustainability*, 13(16), 9477.
- Ika, L. A., & Pinto, J. K. (2022). The "re-meaning" of project success: Updating and recalibrating for a modern project management. *International journal of project management*, 40(7), 835-848.
- Iriarte, C., & Bayona, S. (2020). IT projects success factors: a literature review. *International Journal of Information Systems and Project Management*, 8(2), 49-78.
- Josyula, S. S., Suresh, M., & Raghu Raman, R. (2023). How to make intelligent automation projects agile? Identification of success factors and an assessment approach. *International Journal of Organizational Analysis*, 31(5), 1461-1491.
- Jugdev, K., & Müller, R. (2005). A retrospective look at our evolving understanding of project success. *Project management journal*, 36(4), 19-31.
- Jupir, J., Ab Aziz, K., Rosdi, I. S., Yaakob, S., & Razavi, S. H. (2022). An exploratory investigation on the determinants of successful collaborative projects in the Malaysian construction industry. *F1000Research*, 11, 478.
- Kanski, L., & Pizon, J. (2023). The impact of selected components of industry 4.0 on project management. *Journal of Innovation & Knowledge*, 8(1), 100336.
- Kelly, C. (2015). Project Management: The Importance of Managing Stakeholders. *Geneva Business Review*. <https://www.projectmanager.com/blog/requirements-analysis-stakeholdersatisfaction>
- Khan, H. S. u. d., Chughtai, M. S., Ma, Z., Li, M., & He, D. (2024). Adaptive Leadership and Safety Citizenship Behaviors in Pakistan: The roles of Readiness to Change, Psychosocial Safety Climate and Proactive Personality. *Frontiers in Public Health*, 11, 1-12.
- Kitzinger, J. (1995). Qualitative research: introducing focus groups. *Bmj*, 311(7000), 299-302.
- Knights, D. (2021). Challenging humanist leadership: Toward an embodied, ethical, and effective neo-humanist, enlightenment approach. *Leadership*, 17(6), 674-692.
- Krueger, R. A., & Casey, M. A. (2015). Focus group interviewing. *Handbook of practical program evaluation*, 506-534.
- Lawrence, P. R., & Lorsch, J. W. (1967). Differentiation and integration in complex organizations. *Administrative science quarterly*, 1-47.
- Leisyte, L., & Westerheijden, D. F. (2014). Stakeholders and quality assurance in higher education. In *Drivers and barriers to achieving quality in higher education* (pp. 83-97). Brill.
- Lim, C., & Mohamed, M. Z. (1999). Criteria of project success: an exploratory re-examination. *International journal of project management*, 17(4), 243-248.
- Lim, R. (2020). 15 Fascinating Project Management Statistics. Hive. <https://hive.com/blog/project-management-statistics/>
- Littau, P., Jujagiri, N. J., & Adlbrecht, G. (2010). 25 years of stakeholder theory in project management literature (1984-2009). *Project management journal*, 41(4), 17-29.
- Lohrey, J. (2020). The Importance of Identifying Stakeholders in a Project. *Small Business*. <https://smallbusiness.chron.com/importance-identifyingstakeholders-project-74730.html>
- Long, Z. (2024). Book Review: The Sage Handbook of Qualitative Research in Organizational Communication. In: SAGE Publications Sage CA: Los Angeles, CA.
- Loss, J., Brew-Sam, N., Metz, B., Strobl, H., Sauter, A., & Tittlbach, S. (2020). Capacity building in community stakeholder groups for increasing physical activity: results of a qualitative study in two German communities. *International Journal of Environmental Research and Public Health*, 17(7), 2306.
- Mashali, A., Elbeltagi, E., Motawa, I., & Elshikh, M. (2023). Stakeholder management challenges in mega construction projects: critical success factors. *Journal of Engineering, Design and Technology*, 21(2), 358-375.
- Mason, J. (2017). Qualitative researching.
- Maurer, F., Cohn, M., Griffiths, M., Highsmith, J., Schwaber, K., & Kruchten, P. (2021). Agile project management. *Project Management, Planning and Control*.
- Mitroff, I. I. (1983). Archetypal social systems analysis: On the deeper structure of human systems. *Academy of management review*, 8(3), 387-397.

- Morris, J. P., Hao, Y., Foxall, W., & McNab, W. (2011). A study of injection-induced mechanical deformation at the In Salah CO₂ storage project. *International Journal of Greenhouse Gas Control*, 5(2), 270-280.
- Müller, R., & Turner, R. (2007). The influence of project managers on project success criteria and project success by type of project. *European Management Journal*, 25(4), 298-309.
- Müller, R., & Turner, R. (2007). Matching the project manager's leadership style to project type. *International journal of project management*, 25(1), 21-32.
- Muneeb, F. M., Chughtai, M. S., Anjum, U., & Ma, J. (2019). Fostering Employee's Service Quality and Customer Satisfaction: Evidence from Emerging Pakistan. *Business Ethics and Leadership*, 3(3), 47-67.
- Munns, A. K., & Bjeirmi, B. F. (1996). The role of project management in achieving project success. *International Journal of Project Management*, 14(2), 81-87.
- Nagireddy, S. R. (2023). *Artificial Intelligence and Its Impacts on Project Management* University of the Cumberland[s].
- Naseer, S., Chughtai, M. S., & Syed, F. (2023). The Interactive Effects of HPWP and Adaptive Leadership on Readiness and Commitment to Change. *Academy of Management Proceedings*,
- Olawumi, T. O., & Chan, D. W. (2019). Building Information Modelling and Project Information Management Framework for Construction Projects. *Journal of Civil Engineering and Management*, 25(1), 53-75.
- Palinkas, L. A., Horwitz, S. M., Green, C. A., Wisdom, J. P., Duan, N., & Hoagwood, K. (2015). Purposeful sampling for qualitative data collection and analysis in mixed method implementation research. *Administration and policy in mental health and mental health services research*, 42, 533-544.
- Pankratz, O., & Basten, D. (2014). Ladder to success—eliciting project managers' perceptions of IS project success criteria. *International Journal of Information Systems and Project Management*, 2(2), 5-24.
- Pinto, J. K., & Prescott, J. E. (1990). Planning and tactical factors in the project implementation process. *Journal of Management studies*, 27(3), 305-327.
- Pinto, J. K., & Slevin, D. P. (1987). Critical factors in successful project implementation. *IEEE transactions on engineering management*(1), 22-27.
- Pinto, J. K., & Slevin, D. P. (1988). Critical success factors across the project life cycle.
- Profit. (2024). *Pakistan's IT services exports reach \$1.15bn, marking 5.89% growth in FY 2023-24 first five months*
<https://profit.pakistantoday.com.pk/2024/01/27/pakistans-it-services-exports-reach-1-15bn-marking-5-89-growth-in-fy-2023-24-first-five-months/>
- Pumplun, L., Tauchert, C., & Heidt, M. (2019). A new organizational chassis for artificial intelligence—exploring organizational readiness factors. 27th European Conference on Information Systems (ECIS), Stockholm & Uppsala, Sweden.
- Raza, M. (2023). *Freelancing Statistics in Pakistan* (2023): Trends & Insights.
<https://mohsinzox.com/blog/freelancing-statistics-in-pakistan/>
- Rehman, A., Radulescu, M., Ahmad, F., Kamran Khan, M., Iacob, S. E., & Cismas, L. M. (2023). Investigating the asymmetrical influence of foreign direct investment, remittances, reserves, and information and communication technology on Pakistan's economic development. *Economic Research-Ekonomska Istraživanja*, 36(2), 2131591.
- Robinson, O. C. (2014). Sampling in interview-based qualitative research: A theoretical and practical guide. *Qualitative research in psychology*, 11(1), 25-41.
- Rodney, T., J, Ledwith, A., & Kelly, J. (2009). Project management in small to medium-sized enterprises: A comparison between firms by size and industry. *International Journal of Managing Projects in Business*, 2(2), 282-296.
- Rusconi, G. (2019). Ethical firm system and stakeholder management theories: a possible convergence. *European Management Review*, 16(1), 147-166.
- Siems, E., & Seuring, S. (2021). Stakeholder management in sustainable supply chains: A case study of the bioenergy industry. *Business Strategy and the Environment*, 30(7), 3105-3119.
- Smith, B., & McGannon, K. R. (2018). Developing rigor in qualitative research: Problems and opportunities within sport and exercise psychology. *International review of sport and exercise psychology*, 11(1), 101-121.
- Söderlund, J. (2002). On the development of project management research: schools of thought and critique. *International Project management journal*, 8(1), 20-31.
- Subiyakto, A. a., Ahlan, A. R., Putra, S. J., & Kartiwi, M. (2015). Validation of Information System Project Success Model:A Focus Group Study. *Sage Open*, 5(2), 2158244015581650.
<https://doi.org/10.1177/2158244015581650>
- Tell, A. W., Henkel, M., & Perjons, E. (2016). A method for situating capability viewpoints. Perspectives in Business Informatics Research. 15th International Conference, BIR 2016, Prague, Czech Republic.
- Tereso, A., Ribeiro, P., Fernandes, G., Loureiro, I., & Ferreira, M. (2019). Project management practices in private organizations. *Project management journal*, 50(1), 6-22.
- Tishler, A., Dvir, D., Shenhar, A., & Lipovetsky, S. (1996). Identifying critical success factors in defense development projects: A multivariate analysis. *Technological forecasting and social change*, 51(2), 151-171.
- Tukel, O. I., & Rom, W. O. (2001). An empirical investigation of project evaluation criteria. *International Journal of Operations & Production Management*, 21(3), 400-416.

- Turner, J., Ledwith, A., & Kelly, J. (2009). Project management in small to medium-sized enterprises: A comparison between firms by size and industry. *International Journal of Managing Projects in Business*, 64(2(2)), 282-296.
- Turner, J. R. (2009). *The handbook of project-based management*. The McGraw-Hill Companies, Inc.
- Turner, J. R., & Müller, R. (2005). The project manager's leadership style as a success factor on projects: A literature review. *Project management journal*, 36(2), 49-61.
- Turner, R., Ledwith, A., & Kelly, J. (2010). Project management in small to medium-sized enterprises: Matching processes to the nature of the firm. *International journal of project management*, 28(8), 744-755.
- Turner, R., & Zolin, R. (2012). Forecasting success on large projects: developing reliable scales to predict multiple perspectives by multiple stakeholders over multiple time frames. *Project management journal*, 43(5), 87-99.
- Unegbu, H., Yawas, D., & Dan-Asabe, B. (2022). An investigation of the relationship between project performance measures and project management practices of construction projects for the construction industry in Nigeria. *Journal of King Saud University-Engineering Sciences*, 34(4), 240-249.
- Yadav, N., & Panda, S. P. (2022). A path forward for automation in robotic process automation projects: Potential process selection strategies. 2022 International Conference on Machine Learning, Big Data, Cloud and Parallel Computing (COM-IT-CON),
- Yates, A., Starkey, L., Egerton, B., & Flueggen, F. (2021). High school students' experience of online learning during Covid-19: the influence of technology and pedagogy. *Technology, Pedagogy and education*, 30(1), 59-73.
- Zwikael, O., & Meredith, J. (2019). Evaluating the success of a project and the performance of its leaders. *IEEE transactions on engineering management*, 68(6), 1745-1757.