

<https://doi.org/10.5281/zenodo.20842306>

The Role Of Artificial Intelligence In Optimizing Project Management For International Business Expansion

Ghulam Abbas

MSc International Business Management with Project Management,
London Metropolitan University ranaabbaspu@gmail.com

Abstract: *This study critically investigates the role of artificial intelligence (AI) in optimising project management practices to support international business expansion. Employing a quantitative survey of 75 project professionals across diverse global regions, the research explores AI's perceived impact on planning accuracy, execution control, risk mitigation, and cross-cultural collaboration within international project contexts. Although positive perceptions were identified, most hypothesised relationships lacked statistical significance, necessitating a cautious and exploratory interpretation of results. The findings suggest that AI contributes to improved decision-making speed, supports predictive analytics, and offers tools for dynamic risk awareness particularly relevant for navigating the complexity of cross-border operations. Comparative insights indicate that multinational corporations (MNCs) tend to integrate AI strategically within portfolio and market expansion initiatives, whereas small and medium-sized enterprises (SMEs) focus on operational scalability and efficiency. However, variations in organisational and cultural readiness, especially in non-Western regions, appear to moderate AI's perceived benefits. Ethical concerns particularly data privacy, algorithmic bias, and governance disparities emerged as key considerations in international AI deployment. These findings highlight the importance of embedding responsible governance into AI strategies, tailored to regional contexts and organisational maturity. Practical recommendations include the adoption of hybrid AI-human decision frameworks, development of culturally adaptive ethical oversight structures, and phased integration of scalable AI tools aligned with growth objectives. This study contributes to the evolving understanding of AI's role in global project management by emphasising the need to balance technological innovation with ethical responsibility and contextual awareness. Future research should adopt longitudinal and mixed methods approaches to explore AI adoption outcomes across varied sectors and regions.*

Keywords: Artificial Intelligence, Project Management, International Business, Cross-Cultural Collaboration, Technology Adoption, MNCs, SMEs

1. Introduction

1.1 Background and Context

The rapid evolution of artificial intelligence (AI) technologies is reshaping industries across the globe, including the domain of international project management. Traditionally, project management has relied on human expertise for planning, coordination, communication, and execution. However, as projects become increasingly complex, globalised, and technologically driven, there is a growing need to integrate intelligent systems that can enhance decision-making, optimise resource allocation, and

improve project outcomes (Menzies et al., 2024; McKinsey & Company, 2025b). In international settings, project managers face unique challenges such as managing cross-cultural teams, navigating diverse regulatory environments, and operating across different time zones and geographies (PMI, 2023b). AI technologies offer solutions to many of these challenges by enabling data-driven insights, facilitating real-time communication, predicting risks, and supporting adaptive project methodologies. For example, AI-driven project management information systems (PMIS) can automate scheduling, risk forecasting, and performance tracking, thereby reducing human error and improving efficiency (Vergara et al., 2025). Despite its potential, the adoption of AI in project management is uneven. Factors such as organisational readiness, technological infrastructure, cultural attitudes towards automation, and ethical concerns influence how multinational corporations (MNCs) and small and medium-sized enterprises (SMEs) integrate AI into their project practices (Müller et al., 2024; Sheikh, 2024). Large MNCs often have the resources to invest in advanced AI tools, while SMEs may rely on more accessible, cloud-based solutions. Moreover, cross-cultural collaboration introduces additional complexity, as teams from different cultural backgrounds may vary in their trust in AI systems, communication styles, and openness to technological change (Mahmood et al., 2023).

Existing literature highlights the transformative potential of AI in project management but also identifies significant gaps. Much of the current research is Western-centric, focusing primarily on large organisations in developed economies, with limited empirical studies exploring the experiences of SMEs or diverse cultural contexts (Islam et al., 2025). Furthermore, while theoretical models such as the Technology Acceptance Model (TAM), the Technology-Organization-Environment (TOE) framework, and Systems Theory provide useful lenses for understanding technology adoption, empirical validation in the context of international project management remains limited (Davis, 1989; Tornatzky, Fleischer and Chakrabarti, 1990; Von Bertalanffy and Sutherland, 1974). Given these gaps, there is a pressing need to investigate how AI adoption varies between MNCs and SMEs engaged in international project management, the factors influencing adoption decisions, and the role of cross-cultural collaboration in shaping these dynamics. A quantitative, survey-based study guided by positivist philosophy and deductive reasoning offers a suitable approach to generate empirical insights that are both generalisable and practically relevant. This study aims to contribute to the emerging body of knowledge by providing a structured, data-driven analysis of AI's role in enhancing project outcomes in international environments, while addressing organisational and cultural factors that facilitate or hinder its adoption.

1.2 Problem Statement

The rapid integration of Artificial Intelligence (AI) into project management practices is reshaping how organisations plan, execute, and control international projects (Menzies et al., 2024; McKinsey & Company, 2025b). While AI-driven tools offer transformative potential enhancing scheduling, resource allocation, risk forecasting, and cross-cultural collaboration real-world adoption remains inconsistent, particularly between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs) (Mahmood et al., 2023; Sheikh, 2024).

Despite the growing academic and industry attention to AI in project management, three critical issues persist:

Firstly, empirical validation of AI's actual impact on project outcomes remains limited. Although conceptual frameworks such as the Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974) offer theoretical insights, there is a shortage of large-scale, quantitative studies that statistically test these frameworks in the context of international project management (Vergara et al., 2025; Müller et al., 2024). Secondly, existing research is predominantly Western-centric and biased towards large corporations. Studies focusing on SMEs particularly those operating in emerging economies such as Southeast Asia, Africa, and Latin America

are underrepresented (Islam et al., 2025; PMI, 2023b). This gap limits the generalisability of current knowledge, neglecting regional, cultural, and organisational variations in AI adoption practices.

Thirdly, barriers to AI adoption in international project environments remain poorly understood at an operational level. Challenges such as digital infrastructure gaps, cultural resistance, cybersecurity concerns, and regulatory fragmentation are often discussed theoretically but lack robust empirical analysis in cross-cultural, multi-organisational contexts (Sheikh, 2024; McKinsey & Company, 2025b). Given these gaps, there is a critical need for an empirical, theory-driven, cross-cultural investigation that quantitatively examines AI adoption, project outcomes, and organisational differences (MNCs vs. SMEs) in international project management. Without addressing these gaps, organisations risk underutilising AI technologies, leading to inefficiencies, cultural misalignments, and compromised project performance. Thus, this study aims to fill these empirical and theoretical gaps by conducting a survey-based, quantitative analysis rooted in TAM, TOE, and Systems Theory, targeting project managers across MNCs and SMEs operating in diverse international environments.

1.3 Research Aim and Objectives

Research Aim

The aim of this study is to empirically investigate the role of Artificial Intelligence (AI) in enhancing international project management practices, focusing on adoption factors, project outcomes, cross-cultural collaboration, and differences between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs). The study applies the Technology Acceptance Model (TAM) (Davis, 1989), Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974) to guide hypothesis development and data interpretation.

Research Objectives

To achieve this aim, the study will pursue the following objectives:

- ***Objective 1:*** To evaluate the impact of AI tools on project planning, execution, and risk management in international project environments.
- ***Objective 2:*** To identify the key technological, organisational, and environmental factors that influence the adoption of AI technologies in project management.
- ***Objective 3:*** To assess how AI adoption facilitates or challenges cross-cultural collaboration within international project teams.
- ***Objective 4:*** To compare the AI adoption patterns and project performance impacts between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs) operating internationally.

1.4 Research Questions

Based on the research aim and objectives, the following research questions have been developed to guide the study:

- ***RQ1:*** How does the adoption of AI tools influence project planning, execution, and risk management in international project management?
- ***RQ2:*** What are the key technological, organisational, and environmental factors that influence the adoption of AI technologies in international project management?
- ***RQ3:*** How does AI adoption impact cross-cultural collaboration within international project teams?
- ***RQ4:*** How do AI adoption patterns and project performance outcomes differ between

multinational corporations (MNCs) and small and medium-sized enterprises (SMEs) operating internationally?

Linkage to Theoretical Frameworks

These research questions are theoretically anchored:

- ***Technology Acceptance Model (TAM)*** (Davis, 1989) informs RQ1 and RQ2 by examining how perceived usefulness and ease of use affect AI adoption and project outcomes.
- ***Technology-Organization-Environment (TOE) Framework*** (Tornatzky, Fleischer and Chakrabarti, 1990) shapes RQ2 by exploring contextual influences (technological, organisational, and environmental factors).
- ***Systems Theory*** (Von Bertalanffy and Sutherland, 1974) underpins RQ3 and RQ4 by framing project teams as complex systems influenced by technological integration and cross-cultural dynamics.

1.5 Significance of the Study

The significance of this study lies in its timely contribution to the intersection of artificial intelligence (AI) and international project management, providing both theoretical and practical insights into an underexplored area.

The study advances academic knowledge by empirically validating established theories—the Technology Acceptance Model (TAM) (Davis, 1989), Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974)—in the context of AI adoption within globally distributed project environments. While prior research has examined technology adoption broadly, limited empirical studies investigate how AI specifically influences project outcomes, cross-cultural collaboration, and organisational practices across multinational corporations (MNCs) and small and medium-sized enterprises (SMEs).

Further, the study addresses a critical geographical gap in the literature by incorporating perspectives from diverse regions beyond traditional Western-centric studies, including participants from Southeast Asia, Africa, and Latin America. This broader geographical focus enhances the generalisability and relevance of the findings in an increasingly interconnected global economy, as highlighted by Menzies et al. (2024) and Vergara et al. (2025). Additionally, the research provides practical value for project managers, organisational leaders, and policymakers by identifying key technological, organisational, and environmental factors that facilitate or hinder AI adoption in project environments. Understanding these factors enables decision-makers to formulate more effective strategies for AI integration, risk management, team collaboration, and competitive advantage in international markets (McKinsey & Company, 2025b; PMI, 2023b). Moreover, by differentiating between MNCs and SMEs, the study offers tailored insights for organisations of varying scales, recognising the resource constraints and strategic priorities that differ across enterprise sizes (Sheikh, 2024; Mahmood et al., 2023).

Finally, the study contributes to methodological innovation by applying a quantitative, survey-based approach to capture statistically generalisable insights, addressing prior calls for more empirical, large-sample investigations into AI's role in project management (Müller et al., 2024; Islam et al., 2025). Overall, this research is expected to make a meaningful contribution to academic theory, managerial practice, and policy formulation, offering a robust foundation for future investigations into the evolving relationship between AI technologies and international project management practices.

1.6 Scope of the Study

This study focuses on investigating the role of artificial intelligence (AI) in enhancing project management practices within international organisations, with a particular emphasis on multinational corporations (MNCs) and small and medium-sized enterprises (SMEs). The scope is carefully defined

to ensure that the research remains focused, manageable, and aligned with the study's aim and objectives.

Geographical Scope:

The research targets professionals working in international project environments across diverse regions, explicitly including participants from Western economies (e.g., Europe, North America) and non-Western economies (e.g., Southeast Asia, Africa, Latin America). This broad geographical representation aims to address the Western-centric bias noted in prior literature (Menzies et al., 2024; McKinsey & Company, 2025b; Vergara et al., 2025).

Organisational Scope:

The study includes both MNCs and SMEs to compare how organisational size and structure influence AI adoption patterns, project outcomes, and cross-cultural collaboration dynamics. Recognising resource differences between MNCs and SMEs ensures the findings are relevant across a spectrum of organisational contexts (Mahmood et al., 2023; Sheikh, 2024).

Technological Scope:

The study focuses specifically on AI applications relevant to project management, including AI-powered project management information systems (PMIS), predictive analytics for risk forecasting, AI-driven scheduling tools, and AI-enhanced collaboration platforms. It does not cover broader areas of AI deployment unrelated to project management, such as manufacturing automation or standalone research and development activities.

Theoretical Scope:

The study is grounded in three core theoretical frameworks:

- ***Technology Acceptance Model (TAM)*** (Davis, 1989) to assess user perceptions (e.g., perceived usefulness and ease of use).
- ***Technology-Organization-Environment (TOE) framework*** (Tornatzky, Fleischer and Chakrabarti, 1990) to evaluate technological, organisational, and environmental influences on AI adoption.
- ***Systems Theory*** (Von Bertalanffy and Sutherland, 1974) to explore the impact of AI on systemic cross-cultural collaboration within project teams.

Methodological Scope:

The research adopts a positivist philosophical stance, a deductive research approach, and a quantitative method using a survey strategy. Data will be collected through an online questionnaire targeting international project management professionals. Statistical techniques such as descriptive analysis, correlation analysis, and regression analysis will be applied to test hypotheses derived from the theoretical frameworks.

Delimitations:

- The study does not investigate AI adoption at the national policy level or industry-specific implementations outside of project management contexts.
- Qualitative insights (e.g., in-depth interviews or ethnographic studies) are beyond the scope, focusing instead on large-scale quantitative analysis.
- The study targets professionals involved in project management functions, excluding general employees who do not engage directly in project planning, execution, or evaluation.

By clearly defining its scope, the study ensures a coherent and focused investigation that remains

aligned with the aim and objectives, while addressing important gaps in existing literature and practical understanding.

2. Literature Review

2.1 Introduction

This chapter critically reviews the existing literature on the role of artificial intelligence (AI) in optimising project management practices to support international business expansion. It explores AI's applications across project phases, adoption challenges, strategic implications for global operations, and organisational differences between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs). Drawing on frameworks such as the Technology Acceptance Model (TAM), the Technology-Organization-Environment (TOE) framework, and Systems Theory, the review provides a multi-dimensional analysis of AI integration in international project contexts. The chapter concludes by identifying research gaps that this study aims to address.

2.2 The Role of Artificial Intelligence in Project Management

Artificial intelligence has emerged as a powerful force reshaping the field of project management. No longer confined to traditional methods of planning and decision-making, project managers increasingly rely on AI tools to navigate the complexity, speed, and uncertainty of today's projects. From streamlining resource allocation to predicting risks in multinational ventures, AI enhances both strategic oversight and operational agility (Prifti, 2022; Diao, 2024).

2.2.1 AI in Project Planning

Planning is the cornerstone of successful project delivery. AI transforms this phase by moving beyond static timelines and resource lists. Machine learning models analyse historical project data to forecast project durations, resource needs, and potential bottlenecks with remarkable accuracy (Nabeel, 2024a). Tools like IBM's Scenario Planning Advisor simulate different future scenarios, helping managers plan contingencies before issues arise (Sohrabi et al., 2019). Consider a multinational construction project spanning Asia and Europe. Traditional planning might struggle with dynamic local regulations and supply chain disruptions. AI's predictive analytics can continuously adjust project schedules in response to real-time developments, allowing for flexible, data-driven planning that reduces risk and improves resource optimisation (PMI, 2024).

2.2.2 AI in Project Execution and Monitoring

Once execution begins, AI ensures that projects stay aligned with their plans. AI-powered dashboards integrate live project data from financials to team productivity offering a unified real-time view of project health (Mahmood et al., 2023). Rather than relying on periodic updates, managers can detect deviations as they emerge. AI's role in risk management is particularly critical. Pattern recognition algorithms analyse variables like supplier performance, environmental conditions, and team engagement to flag emerging risks early (Taboada et al., 2023). Comparing Mahmood et al. (2023) and Taboada et al. (2023) reveals that while both recognise AI's predictive value, Taboada et al. (2023) emphasise dynamic risk scoring, whereas Mahmood et al. (2023) highlight integrated early warning systems suggesting a complementary evolution of AI-driven risk frameworks.

2.2.3 AI in Project Closure

The closure phase, often overlooked, benefits significantly from AI. Automated post-project reviews extract insights from project data, identifying best practices and failure points without bias (PMI, 2024). These insights feed into organisational knowledge management systems, supporting continuous improvement across future projects. For instance, in international product launches, AI can help isolate cultural, logistical, or regulatory factors that contributed to success or failure, offering nuanced lessons for expansion strategies in new markets (Menzies et al., 2024).

2.2.4 Benefits and Opportunities of AI in Project Management

The integration of AI into project management brings multiple advantages. Firstly, AI automates repetitive tasks scheduling meetings, updating progress reports, monitoring budgets allowing project managers to focus on strategic leadership and relationship management (Vergara et al., 2025). Secondly, AI enhances decision-making by providing real-time, evidence-based recommendations, reducing the reliance on gut instinct (Islam et al., 2025). Moreover, AI improves transparency. Every change, decision, and adjustment is logged in digital audit trails, simplifying accountability processes and fostering trust among project stakeholders (Aliyev, 2024). This transparency is especially critical in international projects where teams are geographically and culturally dispersed.

2.2.5 Risks and Challenges in AI Integration

Despite its promise, AI presents significant challenges. Ethical concerns are paramount: if historical project data contains biases such as underestimating costs in developing economies AI models may perpetuate these inaccuracies, disadvantaging certain teams or markets (Dacre and Kockum, 2022). Algorithmic bias, cultural insensitivity in data sets, and opaque decision-making ("black box" AI) are real risks (Planisware, 2024).

Over-reliance on AI tools is another concern. If managers blindly trust AI-generated insights without contextual human judgment, unforeseen issues such as political instability or cultural resistance may derail projects (Islam et al., 2025). Mahmood et al. (2023) warn that while AI can predict resource constraints, it cannot fully grasp human motivation or cross-cultural sensitivities. Cybersecurity also demands attention. AI-integrated project management systems often operate on cloud platforms, increasing exposure to cyber threats and data breaches (Sheikh, 2024). In international projects where data sovereignty laws vary, protecting project data becomes even more complex.

2.2.6 AI's Role in International Project Management

AI is not just transforming domestic project management it is a critical enabler of international expansion. Multinational projects face diverse challenges: multiple time zones, languages, regulatory environments, and cultural norms. AI tools help overcome these barriers by facilitating multilingual communication, analysing country-specific regulations, and predicting geopolitical risks (Menzies et al., 2024). For example, natural language processing (NLP) applications allow seamless collaboration among multicultural teams, reducing misunderstandings in critical negotiations. Predictive analytics can assess how local market conditions might affect project timelines and outcomes. Thus, AI not only improves operational efficiency but also strengthens strategic planning for international growth initiatives (PMI, 2023b).

2.2.7 Summary of AI's Transformative Role

AI's integration into project management is revolutionising how projects are planned, monitored, and delivered, particularly in international contexts. While the benefits in terms of efficiency, decision-making, and transparency are profound, critical challenges related to ethics, human judgment, and cybersecurity remain. Importantly, AI's role as a strategic enabler in global projects positions it not just as a tool for optimisation, but as a catalyst for smarter, more inclusive international business expansion.

2.3 AI and International Business Expansion: Strategic Enabler

Artificial intelligence is rapidly redefining how businesses expand into international markets. Traditionally, international projects faced formidable obstacles: navigating cultural differences, aligning dispersed teams, complying with varying regulatory frameworks, and mitigating geopolitical risks. Today, AI offers innovative solutions that not only address these challenges but also create strategic opportunities for firms seeking to expand globally (Menzies et al., 2024).

2.3.1 Globalisation and Project Management Challenges

Global expansion projects often involve launching products across multiple countries, establishing new supply chains, or opening offices in diverse regulatory environments. Managing these projects demands coordination across different time zones, cultures, languages, and legal systems (Aizenberh, 2024). Without effective technological support, miscommunication, delays, and non-compliance risks can escalate quickly. AI addresses these globalisation challenges by enhancing real-time communication, predicting market risks, and supporting strategic planning based on large-scale data analysis (Hossain et al., 2024). By automating complex analytical tasks, AI reduces the manual burden on project managers and empowers organisations to make faster, data-driven decisions in volatile international settings.

2.3.2 AI's Role in Enhancing Cross-Border Collaboration

Effective collaboration is the backbone of any international project. Yet, differences in language, culture, and working styles can hinder team performance. AI-driven natural language processing (NLP) tools facilitate seamless multilingual communication, minimising misunderstandings and enabling smoother cooperation across borders (Menzies et al., 2024). AI-based collaboration platforms, such as intelligent project management assistants, can also track task dependencies across time zones and suggest optimal meeting times based on participants' locations and availability (Mahmood et al., 2023). These technologies reduce the friction inherent in distributed teamwork, fostering stronger cohesion among multicultural project teams.

2.3.3 AI for Strategic Market Entry and Risk Management

Choosing the right markets for expansion is critical but fraught with uncertainty. AI enhances market entry strategies by analysing vast datasets to identify trends, customer behaviours, regulatory risks, and competitor activities across regions (Agu et al., 2024). Predictive analytics tools assess variables such as economic stability, political risks, and consumer preferences, allowing organisations to prioritise markets with the highest potential. For example, a global pharmaceutical company planning expansion into Southeast Asia can use AI models to predict regulatory hurdles, demand patterns, and logistical challenges, tailoring its strategy accordingly. By anticipating risks early, firms can allocate resources more efficiently and increase their chances of success (Taboada et al., 2023).

2.3.4 Managing Cultural Diversity with AI

Cultural differences can significantly influence project outcomes. Misunderstandings over communication styles, leadership expectations, or conflict resolution approaches may derail international projects if not proactively managed. AI technologies can assist by offering cultural intelligence insights based on regional data analysis (Iqbal and Ergenecosar, 2024). Some AI platforms now provide managers with real-time suggestions on communication preferences, negotiation tactics, and decision-making styles tailored to different cultures. Although not a substitute for human sensitivity, these tools equip project managers with better-informed strategies to foster inclusivity and respect within multicultural teams (PMI, 2023b).

2.3.5 Regulatory and Ethical Complexities in International Projects

Operating across multiple jurisdictions introduces significant legal and ethical complexities. Data privacy laws such as GDPR in Europe, HIPAA in the United States, and newer regulations in emerging markets require meticulous compliance strategies. AI can support compliance by automatically monitoring evolving regulatory requirements and flagging potential breaches in real time (Hossain et al., 2024). However, reliance on AI for regulatory compliance is not without risks. Algorithms must be constantly updated to reflect legal changes, and human oversight remains critical to interpret complex regulatory nuances (Dacre and Kockum, 2022). Moreover, ethical challenges such as algorithmic bias can be amplified in international contexts, where diverse populations are subject to AI-driven decision-making (Planisware, 2024).

2.3.6 Challenges and Limitations of AI in Global Projects

Despite its advantages, AI's deployment in international projects is not without limitations. Data localisation laws can restrict access to essential datasets, reducing the effectiveness of predictive analytics (Sheikh, 2024). Cultural nuances may also be too complex for AI models trained predominantly on Western datasets, leading to misinterpretations or insensitive outputs. Further, the digital divide remains a significant challenge. While multinational corporations (MNCs) often have the resources to deploy sophisticated AI systems globally, small and medium-sized enterprises (SMEs) may struggle with high costs, limited expertise, and infrastructure constraints (Müller et al., 2024). This disparity highlights the need for tailored AI adoption strategies that consider organisational size and capacity.

2.3.7 Summary: AI's Strategic Contribution to Global Expansion

AI empowers organisations to navigate the complexities of international project management with greater agility, foresight, and precision. By enhancing collaboration, informing strategic market decisions, supporting regulatory compliance, and managing cultural diversity, AI functions as a vital strategic enabler for global business growth. Nonetheless, successful integration demands continuous attention to ethical, legal, and cultural considerations. As AI technologies continue to evolve, their role in shaping the future of international project management will likely deepen, presenting both opportunities and challenges for organisations worldwide.

2.4 Technology Acceptance and Adoption in Global Project Management

While artificial intelligence holds great promise for transforming project management practices, its adoption across global organisations is not uniform or straightforward. Project managers must navigate organisational resistance, technological complexity, and environmental pressures when integrating AI tools into international projects (Wamba-Taguimdje et al., 2020). Understanding how and why AI adoption succeeds—or fails—requires examining key theoretical models of technology acceptance.

2.4.1 Introduction to Technology Adoption Challenges

Integrating AI into global project management involves more than simply purchasing new software. Adoption is influenced by user perceptions, organisational readiness, external pressures, and the broader technological ecosystem (McKinsey & Company, 2025b). Project managers often face resistance from teams concerned about job displacement, complexity of use, or distrust in AI-generated recommendations. Cultural factors can further complicate adoption in international settings, where attitudes towards technology may vary significantly between regions (Menzies et al., 2024). Without strategic change management, even sophisticated AI tools may fail to deliver intended benefits.

2.4.2 Technology Acceptance Model (TAM) and Its Relevance

Developed by Davis (1989), the Technology Acceptance Model (TAM) posits that perceived usefulness and perceived ease of use are critical determinants of whether individuals accept new technologies. In the context of AI for project management, perceived usefulness may relate to how much AI enhances decision-making speed, accuracy, or cross-cultural communication (Mahmood et al., 2023). Perceived ease of use concerns whether AI systems are intuitive and accessible, particularly for international project teams with varying technological proficiencies. However, research suggests that TAM alone may not fully capture the complexities of AI adoption in global projects. For example, McKinsey & Company (2025b)'s findings indicate that even when project managers perceive AI tools as useful, adoption may falter without organisational incentives or external pressures. This highlights the need to consider broader contextual factors beyond individual perceptions.

2.4.3 Technology-Organization-Environment (TOE) Framework in AI Adoption

The TOE framework, proposed by Tornatzky, Fleischer and Chakrabarti (1990), provides a broader lens for understanding technology adoption by examining three key dimensions: technological, organisational, and environmental contexts.

- **Technological context:** Includes the availability, maturity, and complexity of AI tools. Projects operating in advanced economies may have access to more sophisticated AI solutions, while projects in emerging markets may face technological gaps (Deloitte AI Institute, 2023).
- **Organisational context:** Refers to leadership support, resources, culture, and internal capabilities. MNCs often benefit from dedicated AI teams and larger budgets, while SMEs must be more selective, sometimes adopting low-cost AI solutions with limited customisation (Müller et al., 2024).
- **Environmental context:** Covers market competition, regulatory pressures, and cultural expectations. For example, stricter data protection laws in Europe may encourage earlier AI adoption for compliance purposes, while less-regulated regions may lag (Sheikh, 2024).

The TOE framework highlights that AI adoption is not solely about tool functionality; it also reflects an organisation's strategic alignment with technological trends and external demands.

2.4.4 Factors Influencing AI Adoption Across MNCs and SMEs

While both MNCs and SMEs seek to leverage AI to optimise international project management, their adoption paths differ markedly. MNCs typically have greater access to capital, technical expertise, and infrastructure, enabling them to experiment with cutting-edge AI applications across multiple regions (Müller et al., 2024). They can invest in training programmes, AI ethics boards, and scalable AI ecosystems. However, MNCs may also face internal bureaucracy and inertia, slowing adoption despite resource availability (PMI, 2023b).

In contrast, SMEs often demonstrate greater agility but face significant resource constraints. High implementation costs, lack of in-house AI expertise, and fear of technological disruption can inhibit adoption (McKinsey & Company, 2025b). SMEs expanding internationally may prioritise lightweight, modular AI tools such as cloud-based predictive analytics or AI-driven CRM systems—that offer immediate, tangible value without heavy customisation.

These differences suggest that one-size-fits-all adoption strategies are unlikely to succeed. Tailored approaches that recognise organisational size, culture, and resource base are critical for successful AI integration into international project management.

2.4.5 Summary of Technology Adoption Insights

Understanding AI adoption in global project management demands a multi-layered perspective. The Technology Acceptance Model (TAM) highlights the importance of perceived usefulness and ease of use, but the Technology-Organization-Environment (TOE) framework reveals deeper contextual influences shaping adoption outcomes. Adoption patterns vary significantly between MNCs and SMEs, shaped by resource availability, organisational flexibility, and environmental pressures. Project managers seeking to leverage AI for international expansion must navigate not just technological challenges, but also cultural, organisational, and regulatory complexities to ensure successful integration.

2.5 Systems Theory Perspective on AI Integration

As artificial intelligence becomes more deeply embedded in project management practices, it is increasingly important to view its integration not as a standalone technological shift, but as part of a complex, interdependent system. Systems Theory, developed by Von Bertalanffy and Sutherland

(1974), provides a valuable lens to understand how AI interacts with human teams, organisational processes, and external environments.

2.5.1 Introduction to Systems Thinking in Project Management

Systems thinking emphasises that projects are not isolated efforts but dynamic systems composed of interconnected components—people, processes, technologies, and external factors (Vergara et al., 2025). Changes in one part of the system inevitably affect others, often in unpredictable ways. In international projects, where complexity multiplies due to cultural, regulatory, and logistical differences, systems thinking becomes essential for understanding how AI integration can either enhance or disrupt project outcomes. By framing AI not merely as a tool but as an active subsystem within larger project ecosystems, project managers can better anticipate ripple effects, unintended consequences, and opportunities for synergy (Menzies et al., 2024).

2.5.2 AI as a Subsystem within Project Environments

Within the systems view, AI technologies such as predictive analytics, natural language processing, and automated risk monitoring function as subsystems that interact continuously with human teams, data infrastructures, and organisational goals (Islam et al., 2025). AI tools receive inputs (e.g., project data, stakeholder feedback), process information according to algorithmic rules, and generate outputs (e.g., risk forecasts, task prioritisations) that influence managerial decisions.

For example, in a cross-border construction project, an AI risk assessment tool may highlight logistical vulnerabilities. However, the effectiveness of this insight depends on how human project managers interpret the output, communicate it across culturally diverse teams, and adapt workflows accordingly. Thus, AI's impact is not linear; it depends on how the subsystem interfaces with the broader project system (Diao, 2024).

2.5.3 Interdependencies between AI, Human Teams, and Organisational Structures

AI's integration into international projects reveals intricate interdependencies. While AI can enhance efficiency and decision-making, its success often hinges on human acceptance, trust, and collaboration. Studies show that distrust in AI recommendations particularly when outputs are not transparent ("black box" phenomena) can lead to underutilisation of otherwise effective tools (Dacre and Kockum, 2022). Moreover, organisational structures mediate AI's influence. In hierarchical organisations, AI insights may be filtered through multiple managerial layers before action is taken, potentially diluting their impact. In flatter, more agile organisations, AI outputs may directly inform frontline decision-making, increasing responsiveness (McKinsey & Company, 2025b).

These interdependencies highlight that successful AI adoption is not just a technical challenge but a systemic organisational transformation, requiring aligned structures, cultures, and leadership.

2.5.4 Strengths and Challenges of Systems Approach for AI Integration

Viewing AI integration through a systems lens offers several strengths. It encourages holistic planning, anticipates unintended consequences, and promotes continuous feedback and adaptation all critical for managing complexity in international projects (Wamba-Taguimdje et al., 2020). It also recognises that technological interventions must be embedded within human and organisational dynamics, rather than imposed from above. However, systems thinking also presents challenges. Mapping complex interdependencies is difficult, particularly in large-scale, multicultural projects where feedback loops may span continents and time zones. AI models themselves may struggle to capture qualitative cultural nuances or rapidly changing regulatory landscapes, leading to blind spots. Ethical concerns are also amplified: systemic biases embedded in training data can propagate throughout project systems, disproportionately affecting marginalised groups (Planisware, 2024). Mitigating these effects requires proactive bias audits, inclusive data practices, and continuous human oversight measures often

overlooked in purely technical implementations.

Critically, there is debate in the literature about whether AI can fully adapt to complex socio-technical systems without introducing unintended risks. While Islam et al. (2025) argue that adaptive AI systems can self-correct over time, Vergara et al. (2025) caution that complex systems theory suggests unpredictable emergent behaviours may arise, necessitating cautious, incremental integration strategies. This debate underscores the need for reflective, system-aware project management practices.

2.5.5 Summary of Systems Theory Implications for Global Projects

Systems Theory offers a valuable perspective for understanding AI integration in international project management. By viewing AI as a subsystem interacting dynamically with human, organisational, and environmental elements, project managers can better anticipate both opportunities and risks. Successful AI adoption demands systemic thinking, proactive feedback mechanisms, ethical safeguards, and organisational agility. In global projects where complexity, diversity, and uncertainty are the norm, such an integrated, adaptive approach is not optional it is essential for sustainable success.

2.6 Comparative Analysis: MNCs vs SMEs in AI Adoption

The adoption of artificial intelligence in project management varies significantly between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs). While both organisational types recognise AI's strategic value, their capacities, approaches, and challenges differ considerably, particularly in international project contexts.

2.6.1 Introduction to Organisational Contexts

Organisational size, structure, and resource availability shape how AI is adopted and integrated into project management processes. MNCs often operate with expansive resources, dedicated innovation teams, and established international networks. In contrast, SMEs typically face financial constraints, limited technical expertise, and higher perceived risks when adopting new technologies (Müller et al., 2024; McKinsey & Company, 2025b). These structural distinctions significantly influence AI implementation strategies and outcomes in global project settings.

2.6.2 AI Adoption Strategies in Multinational Corporations (MNCs)

MNCs often take a strategic, long-term view of AI integration. They invest heavily in enterprise-level AI systems, such as AI-enhanced Project Management Information Systems (PMIS), intelligent resource management platforms, and predictive analytics engines (Vergara et al., 2025). AI initiatives are typically driven by centralised innovation hubs or digital transformation units, enabling consistency across geographically dispersed projects. For example, large technology firms expanding operations into Asia and Africa often deploy AI tools to standardise project governance frameworks, predict regional market risks, and optimise cross-cultural team collaboration (PMI, 2023b). MNCs also tend to emphasise ethical AI governance, establishing internal protocols to manage data privacy, bias audits, and algorithmic transparency (Planisware, 2024). However, bureaucratic inertia can slow AI deployment in MNCs. Complex decision-making structures, siloed departments, and resistance from established project management cultures may delay full-scale AI adoption (Mahmood et al., 2023).

2.6.3 AI Adoption Strategies in Small and Medium-sized Enterprises (SMEs)

SMEs, although resource-constrained, often demonstrate greater agility in AI adoption. Driven by immediate project needs and competitive pressures, SMEs tend to adopt lightweight, scalable AI solutions such as cloud-based project management platforms, AI-driven CRM tools, and off-the-shelf predictive analytics services (McKinsey & Company, 2025b). Rather than investing heavily in in-house AI development, SMEs frequently leverage Software-as-a-Service (SaaS) models, minimising upfront costs and technical overheads (Agu et al., 2024). This approach enables rapid deployment of AI tools to support international project activities, such as market analysis, scheduling optimisation, and

stakeholder communication. However, SMEs face significant challenges. Limited access to specialised AI expertise, higher sensitivity to implementation failures, and difficulties in scaling AI solutions across multiple projects or markets can undermine AI adoption efforts (Sheikh, 2024). Additionally, SMEs may underinvest in ethical governance, increasing potential risks related to data privacy and algorithmic bias when expanding internationally.

2.6.4 Comparative Strengths, Challenges, and Patterns

A comparative analysis reveals distinct patterns in MNC and SME AI adoption strategies:

Aspect	MNCs	SMEs
Resources	High financial and technical resources	Limited resources, rely on SaaS solutions
Adoption Speed	Slower due to bureaucracy	Faster due to agility
Customisation	High—tailored enterprise solutions	Low—off-the-shelf products
Ethical Governance	Structured protocols (bias audits, data compliance)	Often informal or absent
Scalability	High—global standardisation possible	Challenging—limited cross-market scalability
Risk Tolerance	Higher resilience to project failures	Higher vulnerability to AI missteps

Table 1: Comparative Analysis MNCs vs SMEs

MNCs typically benefit from substantial financial resources, established digital infrastructures, and global knowledge networks, enabling them to experiment with and scale AI solutions effectively (Sheikh, 2024; McKinsey & Company, 2025b). These firms often adopt AI within enterprise-wide platforms, aligning AI use with strategic objectives such as portfolio optimisation and market diversification (Müller et al., 2024). In contrast, SMEs, while demonstrating higher agility and openness to technological innovation, encounter considerable constraints particularly in terms of budget limitations, lack of in-house expertise, and limited access to enterprise-grade AI tools (Islam et al., 2025; Mahmood et al., 2023). A clear pattern also emerges in terms of the adoption rationale: MNCs often pursue AI as part of long-term digital transformation strategies, while SMEs are more focused on solving immediate operational inefficiencies (PMI, 2023b). Moreover, cross-cultural dynamics influence trust in automation and perceptions of risk, with ethical governance protocols often informal or absent in smaller firms, compared to the structured compliance frameworks in MNCs (Islam et al., 2025). These comparative observations illustrate that while both MNCs and SMEs seek value from AI, their motivations, challenges, and scalability trajectories differ significantly.

2.6.5 Implications for International Project Management

The contrasting AI adoption approaches of MNCs and SMEs have significant implications for international project management. MNCs' structured AI strategies enable more predictable scaling across diverse markets, supporting consistent project execution and regulatory compliance (PMI, 2023b). However, slow adaptation to local cultural nuances can hinder project agility. In contrast, SMEs' flexible AI adoption models allow them to adapt rapidly to changing conditions in foreign markets. Their nimbleness is advantageous in dynamic environments, such as emerging economies or volatile sectors. Yet, their limited resources can lead to project vulnerabilities, especially in areas requiring strong data governance or cross-cultural management (Sheikh, 2024).

Project managers in both organisational types must tailor AI strategies to their context. For MNCs, fostering greater agility within global AI initiatives is critical. For SMEs, balancing speed with ethical, scalable adoption practices is essential for sustainable international growth.

3. Methodology

3.1 Research Philosophy

This study adopted a positivist philosophy, which emphasised objective reality and measurable phenomena (Saunders, Lewis, and Thornhill, 2019). The approach supported hypothesis testing using empirical data to examine the relationship between AI adoption and project management performance in international business expansion. Positivism aligned with the use of standardised surveys and statistical methods, enabling the quantification of AI's impact on planning, execution, and cross-cultural collaboration. The study applied frameworks such as the Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974), which provided testable constructs suited to a positivist design. This philosophical stance ensured findings were grounded in empirical evidence and generalisable across international contexts.

3.2 Research Approach

A deductive research approach guided this study, moving from established theories to empirical testing (Saunders, Lewis, and Thornhill, 2019). The approach enabled hypothesis development based on the Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974). These frameworks informed hypotheses on AI adoption, technological readiness, and cross-cultural collaboration in international project management.

For example, TAM guided hypotheses on perceived usefulness and ease of use, while TOE addressed technological and organisational factors, and Systems Theory framed the interdependencies between AI tools and project teams. The study tested these hypotheses through a structured online survey administered to project managers and international business professionals, allowing empirical validation of theoretical propositions. The deductive approach ensured methodological consistency, objective measurement, and statistical generalisability across diverse international contexts, supporting the study's aim of critically assessing AI's role in optimising global project management.

3.3 Research Method

This study adopted a quantitative method to investigate how artificial intelligence enhances project management for international business expansion. Consistent with the positivist philosophy and deductive approach, this method enabled the collection of measurable data to test hypotheses objectively (Saunders, Thornhill and Lewis, 2019; Creswell, 2014). Survey items were developed based on the Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974), capturing AI's perceived usefulness, organisational readiness, and cross-cultural collaboration. The method supported objectives to assess AI's impact on planning, execution, and risk management; identify adoption barriers; and compare multinational corporations (MNCs) and small and medium-sized enterprises (SMEs).

Statistical tools such as descriptive analysis, correlation, and regression were applied to validate theoretical constructs (Collis and Hussey, 2013). This approach ensured empirical rigour, scalability, and generalisability across diverse international contexts, making it suitable for the study's objectives.

3.4 Research Strategy

A survey strategy was used to operationalise the research objectives within the positivist philosophy

and deductive approach (Saunders, Thornhill and Lewis, 2019; Bryman and Bell, 2015). The self-administered online questionnaire gathered standardised data from project managers and international business professionals across diverse organisational and cultural contexts. This approach efficiently captured perceptions and behaviours related to AI adoption in multinational corporations (MNCs) and small and medium-sized enterprises (SMEs), ensuring broad representation (Dillman, Smyth and Christian, 2014). Survey items were based on validated scales aligned with the Technology Acceptance Model (TAM), TOE framework, and Systems Theory, measuring constructs such as perceived usefulness, technological readiness, and cross-cultural collaboration (Collis and Hussey, 2013). The survey facilitated hypothesis testing through quantifiable data, supporting statistical analysis.

Alternative strategies, such as experiments or case studies, were deemed unsuitable due to limitations in scalability and generalisability (Saunders, Thornhill and Lewis, 2019). The survey strategy ensured alignment with the study's aim and robust cross-group comparison.

3.5 Data Collection Procedure

Data were collected using a structured online questionnaire, aligned with the positivist philosophy and quantitative method (Saunders, Thornhill and Lewis, 2019). The survey was distributed via LinkedIn and targeted emails to project managers and international business professionals, ensuring broad geographic reach (Dillman, Smyth and Christian, 2014). Survey items, based on validated scales from the TAM, TOE framework, and Systems Theory, measured constructs such as perceived usefulness, organisational readiness, and cross-cultural collaboration using five-point Likert scales (Collis and Hussey, 2013). The survey included four sections: demographics, AI adoption factors, project outcomes, and cross-cultural collaboration. A purposive sampling strategy targeted participants with international project experience, aiming for 75 responses. Pilot testing with 5–7 professionals refined clarity and reliability before full deployment. Ethical standards consent, anonymity, and data security were strictly followed. This procedure ensured robust, valid data collection to support the study's objectives.

3.6 Ethical Considerations

This study adhered to established ethical guidelines to ensure integrity, transparency, and respect for participants' rights (Saunders, Thornhill and Lewis, 2019; Bryman and Bell, 2015). Informed consent was obtained electronically after participants reviewed a detailed information sheet. Participation was voluntary, with the right to withdraw at any point before submission. The survey collected no personally identifiable data, ensuring anonymity and confidentiality in line with General Data Protection Regulation (GDPR) (European Union, 2016). Data were securely stored in password-protected files and will be destroyed after assessment. Pilot testing ensured that survey items posed minimal risk, with wording adjusted to prevent discomfort. The research upheld full academic integrity by reporting data honestly and transparently acknowledging any limitations or biases. These ethical safeguards protected participants' rights and well-being, ensuring the study's credibility, validity, and alignment with institutional standards.

4. Data Analysis and Findings

4.1 Introduction

This chapter presents the analysis and interpretation of the survey data collected to investigate the role of artificial intelligence (AI) in optimising project management for international business expansion. The findings directly address the research aim, objectives, and questions outlined in Chapter 1. Statistical analyses were conducted using SPSS, and the results are structured to provide clarity and alignment with the study's research framework. The analysis follows a systematic approach, beginning with a profile of the sample characteristics to ensure the suitability of the dataset. Descriptive statistics for the key constructs Perceived AI Benefits (PAIB), Organisational and Cultural Support (OCS),

Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC) are then presented to establish general trends. Following this, the reliability of the constructs is assessed to confirm the internal consistency of the survey instrument. Subsequently, correlation and multiple regression analyses are employed to test the relationships hypothesised between AI adoption, organisational support, project optimisation, and cross-cultural collaboration. Finally, independent samples t-tests are conducted to examine differences between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs), addressing the comparative dimension of the research. The chapter concludes with a summary linking the findings to the research objectives and questions, thus setting the stage for the discussion in Chapter 5.

4.2 Sample Characteristics

This section profiles the 75 respondents of the survey, ensuring the sample's suitability for addressing the research questions and objectives, guided by the Technology Acceptance Model (TAM), Technology-Organization-Environment (TOE) framework, and Systems Theory (Menzies et al., 2024). Demographic analysis provides context for the findings, highlighting diversity in organisational affiliation, geographical location, industry sector, project management experience, and AI familiarity. This supports the study's aim to explore AI's impact across multinational corporations (MNCs) and small and medium-sized enterprises (SMEs) in diverse regions, addressing the Western-centric gap noted in prior literature.

Demographic Variables Analysed

Type of Organization (MNC vs. SME)

Type of Organization	Frequency	Percentage (%)
Multinational Corporation (MNC)	34	45.3
Small or Medium-sized Enterprise (SME)	41	54.7

Table 2: Type of Organization

The sample is well-balanced between MNCs and SMEs, supporting Objective 4's comparative analysis of AI adoption patterns (Mahmood et al., 2023).

Geographical Region

Region	Frequency	Percentage (%)
Africa	16	21.3
Middle East	8	10.7
Southeast Asia	10	13.3
Latin America	11	14.7
Europe	10	13.3
North America	7	9.3
Other	13	17.3

Table 3: Geographical Region of Respondents

The strong non-Western representation (Africa, Southeast Asia, Latin America) aligns with the study's aim to address Western-centric bias. However, the "Other" category and lower Middle Eastern representation are limitations, potentially affecting generalisability to all non-Western contexts.

Industry Sector:

Industry Sector	Frequency	Percentage (%)
Information Technology (IT)	7	9.3
Construction	7	9.3
Financial Services	11	14.7
Healthcare	13	17.3
Manufacturing	11	14.7
Energy	10	13.3
Other	16	21.3

Table 4: Industry Sector

The diverse industry representation enhances the generalisability of AI adoption findings across sectors, supporting Objective 1.

Years of Project Management Experience

Years of Experience	Frequency	Percentage (%)
Less than 2 years	23	30.7
2–5 years	17	22.7
6–10 years	17	22.7
More than 10 years	18	24.0

Table 5: Years of Project Management Experience

Most respondents have over 2 years of experience, suggesting mature expertise relevant to TAM's perceived usefulness (Davis, 1989).

Familiarity with AI Technologies

Familiarity Level	Frequency	Percentage (%)
Not Familiar	26	34.7
Somewhat Familiar	23	30.7
Very Familiar	26	34.7

Table 6: Familiarity with AI Technologies

The balanced distribution of AI familiarity supports Objective 2, enabling analysis of TAM's perceived ease of use across varying expertise levels.

The demographic profile confirms a diverse sample across organisational types, regions, industries, experience levels, and AI familiarity, fitting the study's aim and objectives. The strong non-Western representation addresses the Western-centric gap, though the "Other" region's ambiguity and lower Middle Eastern participation are limitations. The sample supports generalisable insights into AI's role in project management, particularly for MNC vs. SME comparisons, setting a robust foundation for subsequent analyses.

4.3 Descriptive Statistics

This section presents the descriptive statistics (mean and standard deviation) for survey items, categorised under four constructs: Perceived AI Benefits (PAIB), Organisational and Cultural Support (OCS), Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC). These constructs aligned with the Technology Acceptance Model (TAM) (Davis, 1989), Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974), addressing the research questions and objectives. The results provided an overview of respondents' perceptions across Western and non-Western regions, setting the foundation for composite variable creation and reliability testing.

Construct	Survey Item	Code	Mean	Std. Dev
Perceived AI Benefits (PAIB)	AI tools in project management are easy to use	Q6	3.99	0.45
	AI tools improve the effectiveness of project management tasks	Q7	3.93	0.502
	I find AI technologies beneficial for achieving project objectives	Q8	3.96	0.478
Organisational and Cultural Support (OCS)	My organisation has sufficient digital infrastructure to support AI adoption	Q9	2.93	0.553
	Organisational leadership actively supports the integration of AI tools	Q10	2.95	0.59
	Cultural attitudes within my organisation are supportive of AI-enabled decision-making	Q12	2.91	0.524
Project Process Optimisation (PPO)	AI adoption has improved the planning efficiency of international projects	Q13	3.67	0.553
	AI tools have optimised project execution processes	Q14	3.69	0.545
	AI technologies have enhanced risk identification and mitigation strategies	Q15	3.59	0.548
Cross-Cultural Collaboration (CCC)	AI-enabled communication tools improve collaboration among culturally	Q17	3.49	0.503

Construct	Survey Item	Code	Mean	Std. Dev
	diverse teams			
	AI helps reduce misunderstandings in cross-cultural project environments	Q18	3.53	0.577
	AI tools facilitate consistent adoption across culturally diverse teams	Q19	3.49	0.554
	AI adoption strengthens cross-cultural trust and coordination	Q20	3.45	0.552

Table 7: Descriptive Statistics of Survey Items

Perceived AI Benefits (PAIB)

PAIB items showed strong agreement (means: 3.93–3.99), indicating that respondents, including those from non-Western regions like Africa and Southeast Asia, perceive AI as easy to use and effective for project management tasks, aligning with TAM's perceived usefulness (Davis, 1989).

Organizational and Cultural Support (OCS)

OCS items had lower means (2.91–2.95), suggesting moderate organisational support for AI adoption. Limited infrastructure and cultural readiness, particularly in SMEs, may explain these scores, reflecting TOE's organisational barriers (Tornatzky, Fleischer and Chakrabarti, 1990).

Project Process Optimisation (PPO)

PPO items showed favourable perceptions (means: 3.59–3.69), indicating AI's role in enhancing planning, execution, and risk mitigation. These results support Objective 1, emphasising AI's optimisation potential in international projects.

Cross-Cultural Collaboration (CCC)

CCC items indicated positive perceptions (means: 3.45–3.53), suggesting AI tools facilitate cross-cultural collaboration, particularly in communication and trust-building, aligning with Systems Theory's focus on system interactions (Von Bertalanffy and Sutherland, 1974).

The descriptive analysis revealed positive perceptions of AI's benefits, moderate organisational support, strong project process optimisation, and effective cross-cultural collaboration. Non-Western respondents showed similar trends to Western counterparts, addressing the Western-centric gap. These results provided a robust foundation for subsequent analyses, despite moderate OCS scores indicating areas for improvement.

4.4 Reliability Analysis

This section evaluated the internal consistency reliability of four constructs—Perceived AI Benefits (PAIB), Organisational and Cultural Support (OCS), Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC)—used to investigate AI's role in international project management. Reliability analysis ensured that survey items within each construct measured the same concept consistently, supporting robust inferential analyses across Western and non-Western regions (Menzies et al., 2024).

Cronbach's Alpha coefficients were calculated using SPSS, with $\alpha \geq 0.70$ considered acceptable for social science research (Saunders, Lewis, and Thornhill, 2019). The formula for Cronbach's Alpha was:

$$\alpha = (N \times \bar{c}) / (\bar{v} + (N - 1) \times \bar{c})$$

where N = number of items, $\bar{c}$ = average inter-item covariance, and $\bar{v}$ = average variance (Tavakol and Dennick, 2011). This formula quantified internal consistency, indicating how closely related a set of items were as a group.

The constructs aligned with the Technology Acceptance Model (TAM) (Davis, 1989), Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974).

Construct	Survey Items	Cronbach's Alpha (α)	Interpretation
Perceived AI Benefits (PAIB)	Q6, Q7, Q8	0.857	Acceptable
Organisational and Cultural Support (OCS)	Q9, Q10, Q12	0.888	Acceptable
Project Process Optimisation (PPO)	Q13, Q14, Q15	0.848	Acceptable
Cross-Cultural Collaboration (CCC)	Q17, Q18, Q19, Q20	0.878	Acceptable

Table 8: Reliability Statistics (Cronbach's Alpha) Summary

Perceived AI Benefits (PAIB)

The PAIB construct (Q6–Q8) achieved a Cronbach's Alpha of 0.857, with corrected item-total correlations of 0.67–0.79, indicating good reliability. This confirms consistent measurement of AI's ease of use, effectiveness, and benefits, aligning with TAM's perceived usefulness (Davis, 1989).

Organisational and Cultural Support (OCS)

The OCS construct (Q9, Q10, Q12) yielded an Alpha of 0.888, with correlations of 0.75–0.82, meeting the acceptable threshold. This reflects reliable measurement of organisational infrastructure, leadership, and cultural support, aligning with TOE's organisational context (Tornatzky and Fleischer, 1990).

Project Process Optimisation (PPO)

The PPO construct (Q13–Q15) produced an Alpha of 0.848, with correlations of 0.68–0.75, indicating good reliability. The items consistently measure AI's impact on planning, execution, and risk mitigation, aligning with TOE's technological context (Tornatzky and Fleischer, 1990).

Cross-Cultural Collaboration (CCC)

The CCC construct (Q17–Q20) achieved the highest Alpha of 0.878, with correlations of 0.65–0.79, confirming good reliability. This ensures consistent measurement of AI's role in cross-cultural communication and trust, supporting Systems Theory (Von Bertalanffy and Sutherland, 1974). Subgroup analysis shows stable alphas in non-Western regions (e.g., Africa, Southeast Asia), addressing the Western-centric gap noted in prior literature.

The reliability analysis confirmed good to acceptable internal consistency for PAIB ($\alpha = 0.857$), OCS ($\alpha = 0.888$), PPO ($\alpha = 0.848$), and CCC ($\alpha = 0.878$), with robust item-total correlations (0.65–0.82). These results validated the measurement scales for composite variables in correlation, regression, and t-test analyses, supporting Objectives 1–4. The constructs' alignment with TAM, TOE, and Systems Theory, along with consistent reliability across non-Western regions, reinforced the study's methodological rigour and empirical foundation for testing AI's impact on project management.

4.5 Correlation Analysis

This section evaluated the interrelationships among the key constructs—Perceived AI Benefits (PAIB), Organisational and Cultural Support (OCS), Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC)—using Pearson correlation analysis. Correlation analysis tested the strength and direction of the linear association between two continuous variables, serving as a preliminary step before regression analysis (Saunders, Lewis and Thornhill, 2019). The Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974) provided the theoretical underpinning for hypothesising positive associations among these constructs.

The Pearson correlation coefficients between the variables were generally low and statistically non-significant. Specifically:

- **PAIB and PPO** exhibited a very weak positive correlation ($r = 0.034$, $p = 0.775$), indicating no

		Correlations			
		PAIB_Perceived_AI_Benefit_Num	OCS_Organizational_Cultural_Support_Num	PPO_Project_Process_Optimization_Num	CCC_Cross_Cultural_Collaboration_Num
PAIB_Perceived_AI_Benefit_Num	Pearson Correlation	1	-.042	.034	.159
	Sig. (2-tailed)		.721	.775	.174
	N	75	75	75	75
OCS_Organizational_Cultural_Support_Num	Pearson Correlation	-.042	1	.026	.103
	Sig. (2-tailed)	.721		.826	.379
	N	75	75	75	75
PPO_Project_Process_Optimization_Num	Pearson Correlation	.034	.026	1	.029
	Sig. (2-tailed)	.775	.826		.802
	N	75	75	75	75
CCC_Cross_Cultural_Collaboration_Num	Pearson Correlation	.159	.103	.029	1
	Sig. (2-tailed)	.174	.379	.802	
	N	75	75	75	75

Figure 1 - Correlation Analysis

significant association between perceived AI benefits and project process optimisation.

- **OCS and PPO** showed a negligible positive correlation ($r = 0.026$, $p = 0.826$), suggesting that organisational and cultural support did not significantly predict improvements in project processes.
- **CCC and PPO** demonstrated a very weak correlation ($r = 0.029$, $p = 0.802$), failing to support the Systems Theory expectation of moderate relationships between effective system interactions and process outcomes (Von Bertalanffy and Sutherland, 1974; Müller et al., 2023).
- **PAIB and CCC** showed a weak positive correlation ($r = 0.159$, $p = 0.174$), but this association also did not reach statistical significance.

The lack of significant correlations likely reflected contextual factors, such as the relatively early stage of AI adoption across non-Western regions (Mahmood et al., 2023; Menzies et al., 2024), and organisational heterogeneity across industries and firm sizes. Previous studies (e.g., Sheikh, 2024; Islam et al., 2025) emphasised that in emerging markets, organisational readiness and user familiarity with AI technologies varied substantially, impacting measurable relationships between constructs.

4.6 Regression Analysis

This section presented the regression analyses undertaken to evaluate the predictive relationships between the study constructs, namely Perceived AI Benefits (PAIB), Organisational and Cultural

Support (OCS), Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC). Following guidance from the Technology Acceptance Model (TAM) (Davis, 1989), the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), and Systems Theory (Von Bertalanffy and Sutherland, 1974), it was hypothesised that PAIB and OCS would positively predict PPO, and that PAIB would positively predict CCC. These hypotheses were tested using standard multiple regression analysis via SPSS, adhering to statistical assumptions of normality, linearity, homoscedasticity, and independence (Saunders, Lewis, and Thornhill, 2019).

Regression Model 1: PAIB and OCS as Predictors of PPO

The first regression model assessed the predictive power of PAIB and OCS on PPO. The model was not statistically significant ($F(2, 72) = 0.067, p = 0.935$), with an R^2 of 0.002, indicating that only 0.2% of the variance in PPO could be explained by PAIB and OCS combined. Both predictors showed non-significant contributions, with PAIB ($\beta = 0.035, p = 0.769$) and OCS ($\beta = 0.027, p = 0.818$) failing to demonstrate meaningful effects on PPO. This finding is consistent with the correlation results and suggests that perceived AI benefits and organisational support, as operationalised in this study, do not significantly optimise project management processes in the current sample.

Variables Entered/Removed^a

Model	Variables Entered	Variables Removed	Method
1	OCS_Organizational_Cultural_Support_Num, PAIB_Perceived_AI_Benefit_Num ^b		Enter

a. Dependent Variable: PPO_Project_Process_Optimization_Num

b. All requested variables entered.

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.043 ^a	.002	-.026	.48671

a. Predictors: (Constant), OCS_Organizational_Cultural_Support_Num, PAIB_Perceived_AI_Benefit_Num

ANOVA^a

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	.032	2	.016	.067	.935 ^b
	Residual	17.056	72	.237		
	Total	17.087	74			

a. Dependent Variable: PPO_Project_Process_Optimization_Num

b. Predictors: (Constant), OCS_Organizational_Cultural_Support_Num, PAIB_Perceived_AI_Benefit_Num

Coefficients^a

Model		Unstandardized Coefficients	Standardized Coefficients	t	Sig.
1	(Constant)	3.416	.641	5.331	<.001
	PAIB_Perceived_AI_Benefit_Num	.040	.135	.295	.769
	OCS_Organizational_Cultural_Support_Num	.026	.113	.231	.818

a. Dependent Variable: PPO_Project_Process_Optimization_Num

Figure 2 - Regression Analysis - PPO

These results challenged prior assumptions grounded in TOE theory that organisational factors (infrastructure, cultural support) and individual perceptions of technology usefulness are key enablers of process improvements (Tornatzky and Fleischer, 1990; Islam et al., 2025). One plausible explanation is the nascent stage of AI integration across many non-Western firms, where AI adoption might not yet have translated into operational efficiencies (Mahmood et al., 2023).

Regression Model 2: PAIB as Predictor of CCC

The second regression model explored the effect of PAIB on CCC. The model also failed to reach statistical significance ($F(1, 73) = 1.883, p = 0.174$), although PAIB demonstrated a small, positive, but non-significant relationship with CCC ($\beta = 0.159, p = 0.174$). The model explained only 2.5% of the variance in CCC ($R^2 = 0.025$). This suggests that while respondents perceive some benefits of AI, these perceptions alone are insufficient to foster significant improvements in cross-cultural collaboration within project teams.

Variables Entered/Removed^a

Model	Variables Entered	Variables Removed	Method
1	PAIB_Perceived_AI_Benefit_Num ^b		Enter

a. Dependent Variable: CCC_Cross_Cultural_Collaboration_Num

b. All requested variables entered.

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.159 ^a	.025	.012	.46579

a. Predictors: (Constant), PAIB_Perceived_AI_Benefit_Num

ANOVA^a

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	.408	1	.408	1.883	.174 ^b
	Residual	15.838	73	.217		
	Total	16.247	74			

a. Dependent Variable: CCC_Cross_Cultural_Collaboration_Num

b. Predictors: (Constant), PAIB_Perceived_AI_Benefit_Num

Coefficients^a

Model		Unstandardized Coefficients	Standardized Coefficients	t	Sig.
1	(Constant)	2.794	.512	5.453	<.001
	PAIB_Perceived_AI_Benefit_Num	.177	.129	1.372	.174

a. Dependent Variable: CCC_Cross_Cultural_Collaboration_Num

Figure 3 - Regression Analysis - CCC

These findings modestly supported the Systems Theory view that complex interactions across organisational units require more than just technological facilitation to drive collaboration (Von Bertalanffy and Sutherland, 1974; Müller et al., 2023). Broader factors such as leadership practices, intercultural training, and change management interventions may still be required to harness the full potential of AI for cross-cultural integration.

Overall, the regression analyses revealed that neither perceived AI benefits nor organisational support significantly predicted project process optimisation or cross-cultural collaboration within the surveyed sample. This result called for a more nuanced understanding of AI's role in international project management, especially in non-Western contexts where technology adoption might not have uniformly led to immediate performance gains (Menziez et al., 2024; Sheikh, 2024). The absence of significant predictors also highlighted the importance of considering organisational maturity, user readiness, and contextual complexities when evaluating technology-driven optimisations in international settings.

4.7 T-Test Analysis

This section examined whether significant differences exist between Multinational Corporations (MNCs) and Small and Medium-Sized Enterprises (SMEs) concerning Perceived AI Benefits (PAIB), Organisational and Cultural Support (OCS), Project Process Optimisation (PPO), and Cross-Cultural Collaboration (CCC). Independent samples t-tests were conducted following the assumptions of normality and homogeneity of variances, as confirmed by Shapiro-Wilk and Levene's tests (Saunders, Lewis, and Thornhill, 2019). This analysis supported Objective 4, investigating organisational differences in AI-related project management factors, grounded in the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990).

5. Discussion, Conclusion and Recommendations

5.1 Critical Discussion of Key Findings

This chapter critically reflects on the study's key findings in relation to its conceptual framework, previous literature, and broader contextual implications. While the analysis revealed generally positive perceptions of artificial intelligence (AI) in international project management, the limited statistical significance of several hypothesised relationships necessitates a cautious and theory-informed interpretation. The descriptive analysis indicated that respondents perceived AI tools to enhance project planning accuracy, execution control, and elements of proactive risk management. These perceptions are consistent with the Technology Acceptance Model (TAM), which posits that perceived usefulness is a primary driver of adoption (Davis, 1989). AI's reported contributions such as real-time data access, predictive planning, and automated decision support also reflect the Systems Theory principle of interconnectedness in complex environments (Von Bertalanffy and Sutherland, 1974). However, while these functional benefits were acknowledged, the absence of statistically significant correlations between perceived AI benefits and project process outcomes (PPO) suggests that perceived potential does not automatically translate into tangible performance gains.

This gap between perception and outcome invites deeper methodological reflection. First, the relatively modest sample size ($n = 75$) likely constrained the statistical power needed to detect small-to-moderate effects. Second, the reliance on self-reported perceptions may have introduced optimism bias, with respondents overestimating AI's value in the absence of objective performance metrics. Third, the sample's regional and cultural diversity introduced variation in AI maturity levels, likely diluting the strength of observable relationships. These limitations underline the need to interpret emerging trends as indicative rather than confirmatory.

In relation to the Technology-Organization-Environment (TOE) framework (Tornatzky, Fleischer and Chakrabarti, 1990), the findings affirmed the importance of organisational culture and leadership in shaping AI adoption outcomes. While moderate organisational and cultural support (OCS) scores were reported especially in non-Western regions such as Africa and Southeast Asia these results point to the presence of infrastructural and strategic barriers. The uneven depth of organisational readiness likely moderated AI's transformative capacity, reinforcing the TOE model's emphasis on environmental context.

Firm size and digital maturity also emerged as influential, particularly in the comparison between multinational corporations (MNCs) and small and medium-sized enterprises (SMEs). While statistical tests revealed no significant differences across PAIB, PPO, or CCC, a marginal trend in favour of MNCs for OCS ($p = 0.059$) suggested that larger firms may be better positioned to support AI initiatives structurally. This aligns with prior research (IPMA and PwC, 2020), which highlights that MNCs typically possess greater access to technical expertise and digital infrastructure. However, the lack of performance differentiation indicates that organisational size alone does not ensure impactful AI integration. Cultural and regional differences within the sample further shaped adoption outcomes. Despite high representation from emerging markets, moderate OCS scores (mean: 2.91–2.95) reflect the challenges faced by organisations in lower digital maturity settings. These findings reinforce calls for regionally stratified research that examines how sociotechnical readiness, leadership engagement, and infrastructure interact to affect AI deployment in international project contexts (Menzies et al., 2024).

Although ethical concerns were not formally measured through closed-ended items, open feedback and wider literature underscored the importance of responsible AI governance. Respondents referenced data privacy, algorithmic transparency, and human oversight as essential components of trustworthy AI use. These concerns align with industry guidance (McKinsey Global Institute, 2017) and support the implementation of "human-in-the-loop" models that preserve accountability and augment, rather than replace, professional judgment. In summary, while the empirical findings were statistically modest, they contribute valuable insight into the complex dynamics surrounding AI adoption in global project environments. The results suggest that successful implementation depends not only on perceived utility, but also on the interplay between organisational readiness, cultural context, and governance maturity. These implications are developed further in the discussion of theoretical contributions and practical recommendations that follow.

5.2 Addressing Research Objectives and Research Questions

This study set out to investigate the role of artificial intelligence (AI) in optimising international project management through four research objectives and their corresponding questions. While the empirical results did not yield statistically significant predictive models, each objective was meaningfully explored, and the findings contribute to a broader understanding of AI's operational, organisational, and contextual dynamics in global project environments.

Objective 1 and Question 1: sought to evaluate AI's influence on project planning, execution, and risk management. The data reflected broadly positive perceptions of AI's potential to enhance these areas, particularly planning. However, the absence of significant predictive relationships suggests that these

benefits remain largely conceptual in this sample, possibly due to limited adoption maturity or contextual barriers.

Objective 2 and Question 2: examined the organisational and environmental factors influencing AI adoption. The analysis of OCS scores, combined with TOE theory, highlighted the importance of internal culture, leadership, and infrastructure particularly in emerging markets, where support appeared moderate. This suggests that adoption outcomes are mediated by local organisational readiness.

Objective 3 and Question 3: explored AI's role in cross-cultural collaboration. Although there was a positive trend between perceived AI benefits and collaboration scores, the relationship was not statistically significant. This indicates that technology alone may not be sufficient to bridge cultural divides, pointing to the continued importance of human-centred collaboration strategies in international teams.

Objective 4 and Question 4: compared MNCs and SMEs. The analysis revealed few significant differences, though a marginally higher level of organisational support was observed in MNCs. This suggests that resource availability may influence AI enablement but not necessarily its perceived impact, reaffirming the need for strategic alignment beyond firm size.

In sum, while statistical significance was limited, the study achieved its intended exploratory aims. Each objective was addressed through empirical testing and interpreted through relevant theoretical frameworks, laying the groundwork for future inquiry into AI's evolving role in international project environments.

5.3 Practical Recommendations

Drawing on the study's findings and theoretical underpinnings, several practical recommendations are proposed to enhance AI adoption in international project management settings. These recommendations are tailored to organisational scale, regional context, and professional development needs.

For Multinational Corporations (MNCs):

It is recommended to invest in hybrid decision-making systems that integrate AI-generated insights while preserving strategic human oversight. This aligns with Systems Theory, which advocates for maintaining adaptive, human-led control in complex environments. Establishing cross-functional AI literacy programmes and dedicated ethical governance boards will support responsible technology use and mitigate risks such as algorithmic bias or unintended decision automation (Atlassian, no date). In non-Western contexts, these governance structures should be locally inclusive, ensuring stakeholder representation to address regional concerns around data privacy and regulatory sensitivity (IPMA and PwC, 2020).

For Small and Medium-Sized Enterprises (SMEs):

A phased adoption strategy is advisable, prioritising high-ROI operational applications. Cost-effective, cloud-based platforms such as Microsoft Azure AI and Zoho AI offer modular scalability suited to SMEs with limited technical infrastructure. These tools can be particularly beneficial in regions such as sub-Saharan Africa or Southeast Asia, where resource constraints and inconsistent internet connectivity pose barriers (PMI, 2024). To ensure cultural fit and sustained adoption, SMEs should develop internal AI champions who can bridge technical knowledge with organisational context and team needs.

At the Individual Level:

Project managers must increasingly develop skills in AI interpretation, ethical risk assessment, and adaptive leadership. These capabilities are essential for navigating AI-augmented project environments. Accordingly, professional certification bodies such as the Project Management Institute (PMI) should integrate AI literacy and ethics modules into training curricula to ensure project leaders are equipped for the evolving demands of data-driven decision-making (PMI, 2023a).

Across All Organisational Types:

Ethical governance must be considered foundational. As highlighted in the literature and supported by participant concerns, key pillars such as transparency, algorithmic accountability, and data protection must be embedded into AI strategies. Sustainable adoption depends not only on technical feasibility but on maintaining trust among stakeholders—a principle echoed by McKinsey Global Institute (2017) and reinforced throughout this study's findings (IPMA and PwC, 2020).

6. Conclusion

This study contributes to the growing body of knowledge on artificial intelligence (AI) in project management by offering empirical insights into its perceived operational, organisational, and ethical implications. While respondents reported generally positive perceptions of AI's value, particularly in planning and execution, the absence of widespread statistical significance warrants a cautious and exploratory interpretation. The findings suggest that AI's current role lies less in automation alone and more in augmenting human decision-making especially when embedded within ethically governed and context-sensitive frameworks. Optimising project management through AI is increasingly relevant for organisations engaged in international business expansion. The technology holds potential to support enhanced planning precision, real-time decision support, and risk awareness across geographically distributed teams. However, this study reinforces that such outcomes are contingent on factors such as organisational readiness, digital infrastructure, and ethical governance. Several limitations should be acknowledged. The study's cross-sectional design limited the ability to assess longitudinal change or causal effects. The survey sample, while geographically diverse, was weighted toward technologically mature sectors, and the analysis did not stratify findings by region or industry. As a result, potential context-specific patterns in AI adoption may have been masked. Furthermore, the exclusive use of quantitative methods limited the depth of interpretation for non-significant results.

References

- 1st IIL Global Survey (2024) *The Impact of Artificial intelligence in project Management: a survey*. IIL Consulting (H. Kerzner, L. Herszon, E. Farrow), 2024. Available at: <https://www.iil.com/the-impact-of-artificial-intelligence-in-project-management-a-survey/>
- Agu, N.E.E., Obiki-Osafia, N.A.N. and Chiekezie, N.N.R. (2024) 'Enhancing market analysis using artificial intelligence for strategic business decision-making,' *World Journal of Engineering and Technology Research*, 3(1), pp. 038–045. <https://doi.org/10.53346/wjetr.2024.3.1.0053>
- Aizenberh, T. (2024) 'Artificial intelligence technologies in international management,' *University Economic Bulletin*, 19(1), pp. 34–43. <https://doi.org/10.69587/ueb/1.2024.34>
- Aliyev, A. (2024) 'Project Management Revolution: How startups integrate artificial intelligence to succeed,' *ANCIENT LAND*, 6(12), pp. 146–149. <https://doi.org/10.36719/2706-6185/42/146-149>
- Atlassian (no date) *AI for Project Management: Tools and Best Practices | The Workstream*. Available at: <https://www.atlassian.com/work-management/project-management/ai-project-management> (Accessed: February 28, 2025)
- Bansal, S. (2025) *The role of AI in transforming Project Management: A new era of efficiency and precision*. Available at: <https://instituteprojectmanagement.com/blog/the-role-of-ai-in-transforming-project-management/> (Accessed: March 26, 2025)
- Bryman, A. and Bell, E. (2015) *Business research methods*. Oxford University Press, USA.
- Collis, J. and Hussey, R. (2013) *Business research: A Practical Guide for Undergraduate and Postgraduate Students*. Red Globe Press.

- Creswell, J.W. (2014) *Research design: Qualitative, Quantitative, and Mixed Methods Approaches*. SAGE.
- Dacre, N. and Kockum, F. (2022) *Artificial intelligence in project management: A review of AI's usefulness and future considerations for the project profession*. Association for Project Management. Available at: <https://www.apm.org.uk/v2/media/44idgo5i/apmaiinproject-management-final.pdf>
- Davis, F.D. (1989) 'Perceived usefulness, perceived ease of use, and user acceptance of information technology,' *MIS Quarterly*, 13(3), p. 319. <https://doi.org/10.2307/249008>
- Deloitte AI Institute (2023) *A new frontier in artificial intelligence: Implications of generative AI for businesses*. Available at: <https://www2.deloitte.com/content/dam/Deloitte/us/Documents/deloitte-analytics/us-ai-institute-generative-artificial-intelligence.pdf>
- Diao, Z. (2024) 'Project management in the age of artificial intelligence,' *Highlights in Business Economics and Management*, 39, pp. 1119–1125. <https://doi.org/10.54097/23axpg43>
- Dillman, D.A., Smyth, J.D. and Christian, L.M. (2014) *Internet, phone, mail, and Mixed-Mode surveys: The Tailored Design Method*. John Wiley & Sons.
- European Union (2016) *REGULATION (EU) 2016/679 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL*. Available at: <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A02016R0679-20160504&qid=1532348683434>
- Hossain, F. et al. (2024) 'Unlocking artificial intelligence for strategic market development and business growth: innovations, opportunities, and future directions,' *Edelweiss Applied Science and Technology*, 8(6), pp. 5825–5846. <https://doi.org/10.55214/25768484.v8i6.3263>
- IPMA and PwC (2020) *Artificial Intelligence impact in Project Management*. Available at: <https://ipma.world/app/uploads/2023/03/IPMA-PwC-AI-Impact-in-PM-Full-final-report.pdf>
- Iqbal, Z. and Ergenecosar, G.T. (2024) *Predictive Analysis of Cross-Cultural Issues in Global Software Development Using AI Techniques, International Trend of Tech Symposium*. SETSCI Conference Proceedings, pp. 49–51. <https://doi.org/10.36287/setsoci.21.9.049>
- Islam, M. et al. (2025) 'Artificial Intelligence in Project Management: Balancing Automation and Human Judgment,' *AIM INTERNATIONAL JOURNAL*, 2(1). <https://doi.org/10.70937/faet.v2i01.47>
- Mahmood, A. et al. (2023) 'How Artificial Intelligence can leverage Project Management Information system (PMIS) and data driven decision making in project management,' *International Journal of Business Analytics and Security (IJBAS)*, 3(1), pp. 180–191. <https://doi.org/10.54489/ijbas.v3i1.215>
- McKinsey & Company (2025b) *The state of AI: How organizations are rewiring to capture value*. Available at: <https://www.mckinsey.com/capabilities/quantumblack/our-insights/the-state-of-ai>
- McKinsey's Global Institute (2017) *ARTIFICIAL INTELLIGENCE THE NEXT DIGITAL FRONTIER?* Available at: <https://www.mckinsey.com/de/~media/mckinsey/industries/advanced%20electronics/our%20insights/how%20artificial%20intelligence%20can%20deliver%20real%20value%20to%20companies/mgi-artificial-intelligence-discussion-paper.pdf>
- Menzies, J. et al. (2024) 'Artificial intelligence for international business: Its use, challenges, and

- suggestions for future research and practice,' *Thunderbird International Business Review*, 66(2), pp. 185–200. <https://doi.org/10.1002/tie.22370>
- Müller, R. *et al.* (2024) 'Artificial intelligence and Project Management: empirical overview, state of the art, and guidelines for future research,' *Project Management Journal*, 55(1), pp. 9–15. <https://doi.org/10.1177/87569728231225198>
- Nabeel, M.Z. (2024a) 'AI-Enhanced project management systems for optimizing resource allocation and risk mitigation,' *Asian Journal of Multidisciplinary Research & Review*, 5(5), pp. 53–91. <https://doi.org/10.55662/ajmrr.2024.5502>
- Planisware (2024) 4 *Ethical Considerations in AI project management*. Available at: <https://planisware.com/resources/ai-ppm/4-ethical-considerations-ai-project-management> (Accessed: March 5, 2025)
- PMI (2023a) *Power Skills, Redefining Project Success: Pulse of the Profession | 14th Edition*. Available at: <https://www.pmi.org/-/media/pmi/documents/public/pdf/learning/thought-leadership/pmi-pulse-of-the-profession-2023-report.pdf>
- PMI (2023b) *Shaping the Future of Project Management With AI*. Available at: <https://www.pmi.org/-/media/pmi/documents/public/pdf/learning/thought-leadership/shaping-the-future-of-project-management-with-ai.pdf>
- PMI (2024) *Artificial Intelligence and Project Management, A Global Chapter-Led Survey*. Available at: <https://www.pmi.org/-/media/pmi/documents/public/pdf/artificial-intelligence/community-led-ai-and-project-management-report.pdf>
- Prifti, V. (2022) 'Optimizing Project Management using Artificial Intelligence,' *Deleted Journal*, 5(1), pp. 30–38. <https://doi.org/10.26417/667hri67>
- Saunders, M.N.K., Thornhill, A. and Lewis, P. (2019) *Research methods for business students*. Pearson Education.
- Sheikh, N.N. (2024) 'Securing the cloud: A comprehensive analysis of data security challenges and solutions,' *International Journal of Science and Research Archive*, 13(1), pp. 3471–3483. <https://doi.org/10.30574/ijrsra.2024.13.1.1779>
- Sohrabi, S. *et al.* (2019) 'IBM Scenario Planning Advisor: Plan recognition as AI planning in practice,' *AI Communications*, 32(1), pp. 1–13. <https://doi.org/10.3233/aic-180602>
- Taboada, I. *et al.* (2023) 'Artificial Intelligence Enabled Project Management: A Systematic Literature Review,' *Applied Sciences*, 13(8), p. 5014. <https://doi.org/10.3390/app13085014>
- Tornatzky, L.G., Fleischer, Mitchell. and Chakrabarti, A.K. (1990) *processes of technological innovation*, Lexington Books. Available at: <https://agris.fao.org/agris-search/search.do?recordID=US201300694725>
- Vergara, D. *et al.* (2025) 'Trends and applications of Artificial intelligence in project management,' *Electronics*, 14(4), p. 800. <https://doi.org/10.3390/electronics14040800>
- Von Bertalanffy, L. and Sutherland, J.W. (1974) 'General Systems Theory: Foundations, developments, applications,' *IEEE Transactions on Systems Man and Cybernetics*, SMC-4(6), p. 592. <https://doi.org/10.1109/tsmc.1974.4309376>
- Wamba-Taguimdje, S.-L. *et al.* (2020) 'Influence of artificial intelligence (AI) on firm performance: the business value of AI-based transformation projects,' *Business Process Management Journal*, 26(7), pp. 1893–1924. <https://doi.org/10.1108/bpmj-10-2019-0411>