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MASTER'S FINAL PROJECT
DISSERTATION

STRATEGIC ALIGNMENT OF ITSM INITIATIVES: INTEGRATING ORGANIZATIONAL FACTORS, MATURITY MODELS, AND INCIDENT MANAGEMENT FOR ENHANCED SERVICE EXCELLENCE AND ORGANIZATIONAL SUCCESS

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Resumo

No contexto digital contemporâneo, a IT Service Management (ITSM) é fundamental para o sucesso das organizações. Este Projeto Final de Mestrado investiga o alinhamento estratégico das iniciativas de ITSM com fatores organizacionais críticos, como modelos de maturidade e práticas de gestão de incidentes. Mediante revisão da literatura e análise empírica, a pesquisa explora a interação desses fatores e seu impacto na maturidade dos serviços de IT e na satisfação dos clientes.

Os resultados destacam a necessidade de alinhar os serviços de IT com os objetivos organizacionais. A atribuição de orçamentos estratégicos é crucial para fomentar a inovação e elevar a qualidade dos serviços, enquanto os recursos humanos desempenham um papel vital na otimização dos serviços de IT e na garantia da conformidade regulatória. Para a implementação eficaz das práticas de ITSM, é indispensável uma cultura organizacional robusta. O estudo demonstra que processos maduros de ITSM, caracterizados por uma governança bem definida e coerência estratégica, melhoram a eficiência operacional e a satisfação dos clientes.

Este estudo adota uma metodologia qualitativa, utilizando entrevistas para obter perceções detalhadas. A análise revelou que as iniciativas estratégicas de ITSM e os processos de melhoria contínua alinham os serviços de IT com os objetivos empresariais, incrementando a vantagem competitiva. Processos eficazes de gestão de incidentes, caracterizados por comunicação proativa e resolução célere, promovem elevados níveis de satisfação de clientes.

Este estudo contribui para a literatura existente ao oferecer *insights* práticos sobre a integração do ITSM com as estratégias organizacionais, sublinhando a necessidade de melhoria contínua e alinhamento estratégico. Reconhece também limitações, como o enfoque em dados qualitativos e contextos organizacionais específicos, e sugere direções para futuras pesquisas.

Palavras-chave: Alinhamento Estratégico, ITSM, Modelos de Maturidade de ITSM, Gestão de Incidentes, Melhoramento Contínuo.

Abstract

In the contemporary digital context, IT Service Management (ITSM) is crucial for organizational success. This Master's Project investigates the strategic alignment of ITSM initiatives with critical organizational factors, such as maturity models and incident management practices. The research explores the interaction of these factors and their impact on IT service maturity and customer satisfaction.

The results highlight the need to align IT services with organizational objectives. Strategic budget allocation is essential to foster innovation and enhance service quality. Human resources are vital to optimizing IT services and ensuring regulatory compliance. Mature ITSM processes, with well-defined governance and strategic coherence, improve operational efficiency and customer satisfaction.

This study uses interviews to obtain detailed insights. The analysis revealed that strategic ITSM initiatives and continuous improvement processes align IT services with business objectives, increasing competitive advantage. Effective incident management processes, with proactive communication and swift resolution, promote high levels of customer satisfaction.

This study contributes to the literature by providing practical insights on integrating ITSM with organizational strategies, emphasizing the need for continuous improvement and strategic alignment. It also recognizes limitations, such as the focus on qualitative data and specific organizational contexts, suggesting directions for future research.

Keywords: Strategic Alignment, ITSM, ITSM Maturity Models, Incident Management, Continuous Improvement.

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List of Acronyms

AO	Application Outsourcing
BPO	Business Process Outsourcing
CMMI	Capability Maturity Model Integration
COBIT	Control Objectives for Information and Related Technologies
ISACA	Information Systems Audit and Control Association
IT	Information Technology
ITIL	Information Technology Infrastructure Library
ITSM	Information Technology Service Management
KPIs	Key Performance Indicators
NPS	Net Promoter Score
SDLC	Software Development Lifecycle
SSME	Services Science, Management and Engineering
SMS	Service Management System

Chapter I – Introduction

1.1. Study Context

Services Science, Management, and Engineering (SSME) is an interdisciplinary field that integrates computer science, decision theory, and legal science to address complex issues surrounding service systems (Dinh et al., 2021). IT Service Management (ITSM) is aligned with SSME, which oversees the Information Technology (IT) operations life cycle and focuses on operational efficiency, strategic alignment, and human resources contributions (Winkler & Wulf, 2019; Serrano et al., 2021).

As IT service development continues to evolve, key organizational factors that determine efficiency and innovation include budget allocation, strategic alignment, and human resource optimization (Sipahutar et al., 2020; Wei et al., 2023; Sinha et al., 2019). To ensure alignment with broader business goals, organizational strategy shapes IT services, whereas budgets play an integral role in promoting innovation and efficiency (Reichstein, 2019; Tekin & Konina, 2019). As part of the continuous improvement process, IT service maturity must be assessed using frameworks such as ISO/IEC 20000, CMMI, ITIL, and COBIT (Gollhardt et al., 2020; ISO/IEC 20000-1:2018, 2021; Oyshi et al., 2023). In ITSM, incident management is a crucial component that evolves strategically with organizational IT maturity and plays a crucial role in ensuring customer satisfaction (Alonso et al., 2020; Steffen et al., 2019).

A comprehensive examination of IT service development is undertaken in this study, which includes organizational strategy, budget considerations, human resources, and IT service maturity as well as a focus on the importance of incident management to customer satisfaction. A synergistic relationship between SSME and ITSM positions incident management as an essential strategic component for organizational resilience as well as improved customer service.

1.2. Research Questions and Objectives

Considering the evolving nature of ITSM, the following research questions have been formulated:

1. What organizational factors influence the support and continuous development of an IT service?
2. How does the maturity of an IT service influence incident management and customer satisfaction?

The purpose of this research is to explore ITSM in depth. As part of the first set of objectives, this study will investigate the role that budgets play in innovating and expanding IT services, analyse the impact of organizational strategy, and evaluate the contribution that human resources can make to service evolution. The second set of objectives focuses on identifying key factors that affect IT service maturity, analysing maturity models, assessing responsiveness to incidents at different maturity levels, and evaluating the efficiency of incident resolution and its impact on customer satisfaction. This study aims to gain a deeper understanding of the complex dynamics that are present within ITSM.

1.3. Structure

The motivation for this study stems from the critical need to bridge the gap between IT Service Management practices and organizational objectives. This study seeks to uncover insights that can be used to drive service excellence and enhance the overall success of an organization by exploring how organizational factors, maturity models, and incident management can be strategically aligned. The purpose of this study is to contribute to the body of knowledge by providing a framework for integrating these elements effectively, thereby stimulating future ITSM implementations and promoting best practices in the field.

To address the research questions effectively, it is essential to begin with a thorough "Literature Review." This chapter provides a comprehensive understanding of the key concepts relevant to the subject matter. Following this, the study's "Methodology" is explained, including the data collection and analysis methods used, as well as a summary of the results obtained. A qualitative approach is used in the development of this study. A data collection process is employed through interviews, observations, and document analysis, followed by a thematic analysis to identify and interpret relevant patterns and insights. The next chapter, entitled "Results Presentation," presents the study findings in an organized and detailed manner. This is followed by a chapter titled "Results Analysis and Discussion," which provides a examination of these results, integrating them with the existing literature and drawing conclusions. In the final chapter, "Conclusions, Limitations, and Future Research," the study's overall findings are summarized, discussing their implications and highlighting any limitations encountered. Moreover, this chapter suggests possible avenues for future research, highlighting how subsequent research may build on the work presented in this chapter.

Chapter II – Literature Review

2.1. IT Service Management

The field of Service Science is interdisciplinary and studies complex service systems that involve people, technologies, and shared information, with the primary objective of creating value for the organization. Computer science, operations research, industrial engineering, and other disciplines are drawn together to tackle challenges such as organizational restructuring and service innovation (Dinh et al., 2021). Due to the rapid expansion of service industries, the field of Service Science, Management, and Engineering (SSME) combines insights from computer science, decision theory, and legal science. The response to crises and the restoration of service plays a crucial role in the management of unforeseen disruptions in today's world of dynamic shifts. Although markets and industries are experiencing turbulence, there remains a significant gap in the adaptation of organizational systems at all levels of the service industry (Marcos et al., 2020). By utilizing a conceptual framework based on service science, service organizations can accelerate their ability to adapt business services comprehensively at the network level, and service level, thereby enhancing the resilience of the organization. In terms of service science, there are four basic elements, namely business strategy, business processes, human resources optimization, and fundamental technologies in information technology (*What Is "Service Science"? : FUJITSU RESEARCH INSTITUTE*, 2006).

Information Technology Service Management (ITSM) is a branch of Service Science that focuses on managing the Information Technology (IT) operations that are associated with service delivery and support. From the implementation and management of a system to the provision of high-quality services, ITSM encompasses the entire life cycle of a system (Winkler & Wulf, 2019). ITSM comprises a range of activities and processes that support a service throughout its life cycle. This category includes service and change management, problem, incident, asset, and knowledge management (MacLean & Titah, 2023).

Additionally, IT services within an ITSM context involve the application of business and technical knowledge to assist organizations in developing, managing, optimizing, and accessing business and information (Serrano et al., 2021). A wide range of IT services are offered by the market, including business process services, application services, and infrastructure services, which are further classified based on the skills required to deliver the services (design, build, and run) (Definition of IT Services - Gartner Information Technology Glossary, n.d.).

ITSM comprises several frameworks for aligning IT services with business requirements, as presented in Figure 1. As ITSM is a dynamic field and there is no universally static approach, this thesis adopts the ITSM framework developed at the University of California, Berkeley (2024). Berkeley's framework is characterized by its comprehensive methodology that includes service strategy, design, transition, operation, and continual service improvement. In line with industry best practices, this approach offers a scalable, adaptable model suitable for diverse organizational contexts, thereby ensuring effective delivery of IT services and alignment with business objectives.

Figure 1 - Integrated ITSM Framework

Source: Berkeley Information Technology

It is possible to outsource these services. They can be subdivided into three categories: business process outsourcing (BPO), application outsourcing (AO), and infrastructure outsourcing. Integrated ITSM and other IT services are essential to enhancing ITSM implementation, optimizing organizational processes, and leveraging technical capabilities (Definition of IT Services - Gartner Information Technology Glossary, n.d.).

2.2. Organizational Factors in IT Service Development

IT service development is a dynamic field that is constantly evolving, where operational efficiency is a key element to success. An integral part of the organization's performance is the effective allocation of financial resources, as outlined in budgets (Sipahutar et al., 2020). In addition to representing financial plans, these budgets reflect an organization's commitment to investing in state of art technologies, fostering research, and directing IT services development. It is essential to build an IT budget that emphasizes cost-effective management, streamlines service delivery, and ensures IT services are developed successfully (Wei et al., 2023).

Several factors influence the development of IT services within organizational frameworks, including the organization's culture, communication methods, and collaboration structures (Wei et al., 2023). A company's culture plays an essential role in conceptualizing, developing, and integrating IT services into the broader context of ITSM. Thus, these pillars contribute to creating a conducive environment for ITSM implementation (Reichstein, 2019).

A strong organizational strategy is essential to the success of IT service initiatives since it defines the organization's overarching business goals and specific requirements. Developing IT services in alignment with corporate strategic goals is critical for ensuring that technological efforts are purposefully designed to support and enhance broader corporate goals (Reichstein, 2019). The alignment of strategic objectives is crucial to

achieving sustained success in the IT field, where IT services are integral contributors to the overall success of the organization (Van Zanten & Van Tulder, 2021).

In the development of IT services, human resources play a central role, and they are integral to ensuring that services are efficient and effective through talent optimization and compliance (Sinha et al., 2019). The budgeting for human resources initiatives, in conjunction with a focus on recognizing and engaging employees, creates a nexus that is conducive to an increase in self-confidence, and hence, to an increase in the level of IT services. As technology advances, the human touch becomes increasingly important for service excellence. (Van Den Heuvel et al., 2020).

2.2.1. Impact of organizational strategy on IT Services

Organizational strategy plays a crucial role in determining IT services. By aligning with ITSM best practices and providing a strategic roadmap for implementing ITSM initiatives, it ensures a seamless integration of IT services with broader corporate goals. The key to achieving this is by designing an adaptable framework that can navigate the fluid contours of organizational strategy. If IT services are aligned effectively with the organization's broader purposes, they can transcend isolated entities and become integral components that enhance the overall performance of the organization (Miyamoto, 2019).

The organizational strategy serves as the foundation for the IT vision, providing a strategic roadmap for utilizing information technology to create tangible value for the organization. This strategic alignment is crucial for ensuring that IT services are not isolated components but integral parts of the organization's broader goals (Sipahutar et al., 2020). Apart from its foundational role, a well-designed IT strategy offers numerous benefits, including enhancing competitiveness, improving focus on business objectives, and fostering a symbiotic relationship between business and IT (Reichstein, 2019). This alignment, in turn, becomes a channel for achieving business objectives, making IT strategy a dynamic force in organizational excellence (Miyamoto, 2019).

Furthermore, the strategic aspect of ITSM transcends mere operational considerations, aiming to deliver value to the business by aligning IT services with business needs (Sipahutar et al., 2020). ITSM focuses on improving IT service delivery, reducing costs, and enhancing customer satisfaction. The effectiveness of ITSM extends beyond theory, as it boosts efficiency, elevates service quality, reduces operating costs, and minimizes disruptions (Van Den Heuvel et al., 2020). Mastering key ITSM processes, such as Incident Management, Problem Management, Change Management, and Service Level Management, is essential for meeting customer needs, improving service delivery, and managing costs more effectively (What Is ITSM? - IT Service Management - ServiceNow, n.d.).

2.2.2. Budget’s role in IT innovation

ITSM relies on financial management to drive innovation by balancing financial prudence with strategic creativity. By going beyond traditional financial planning, the budget can become a strategic catalyst for innovation in IT services (Tekin & Konina, 2019). To establish and maintain ITSM practices, it is essential to make wise financial allocations from conception to execution. Strategic budgeting ensures efficient IT service

delivery while strengthening the organization's ability to adapt to an ever-changing technological environment (Wei et al., 2023).

Budgets play a critical role in promoting innovation through the development of IT services. Budgets are increasingly moving beyond being simple financial planning tools and becoming strategic management tools that help organizations predict and manage future expenses (Tekin & Konina, 2019). IT budget allocation must be strategic to promote innovation and give an organization an advantage over its competitors. To achieve this, resources should be directed toward initiatives that achieve the organization's objectives and facilitate the organization's adaptability to a changing business environment (Wei et al., 2023).

Organizations need a dedicated innovation budget to remain competitive (Tekin & Konina, 2019). This specialized budget fosters new ideas and promotes continuous innovation while minimizing risks and maximizing returns (Tekin & Konina, 2018). Different types of innovation budgets highlight the need for strategic allocation of resources across a range of activities, and to evaluate stakeholder input to customize the budget to meet their evolving needs (Wei et al., 2023).

The strategic allocation of resources not only promotes innovation but also provides a resilient framework for organizations to navigate the increasingly complex digital environment (Wei et al., 2023).

2.2.3. Human resource contribution to IT Service evolution

Using ITSM principles, the human resource function plays a vital role in the evolution of IT services, which involves optimizing talent, adhering to compliance requirements, and creating effective workforce strategies (Sinha et al., 2019). There is a close connection between IT services and human resources, where skills development, compliance with regulations, and strategic workforce planning are factors that contribute to the success of ITSM implementations (Suhermin, 2022).

IT employees can contribute to ITSM evolution by expanding the scope of service management beyond IT. An employee-centric service management solution can be achieved by encompassing areas such as human resources. A centralized service delivery system will facilitate consistency, and automation across the entire organization because of this expansion (Sinha et al., 2019).

A modernized ITSM approach based on an automated approach can make a tangible contribution to organizational success. As a result of this modernization effort, IT operations costs are reduced, failures are managed more effectively, and collaboration among teams is heightened (Widianto & Subriadi, 2022). A key contribution is the adoption of emerging technologies, such as artificial intelligence, automation, and analytics. In addition to improving efficiency, proactive issue resolution, and enhanced user experience, this proactive approach enhances ITSM capabilities (MacLean & Titah, 2023).

The development of ITSM requires the empowerment of IT employees. They can contribute to improved user satisfaction and overall productivity by providing IT support

that offers flexibility in channel choice and meets user expectations. Empowering employees enhances the overall effectiveness of IT service delivery (Suhermin, 2022).

An IT employee's contributions encompass a variety of activities such as adopting emerging technologies, expanding service management, modernizing practices, and empowering colleagues through effective IT support (Widianto & Subriadi, 2022). As a result of these efforts, ITSM within an organization evolves and is enhanced.

The success of IT services relies on several factors such as organizational culture, strategy, budget, and human resources. These factors contribute to the IT Service Maturity of an organization. The alignment and collaboration of these elements result in IT services that are in line with business objectives and can adapt to changes in the operational environment (Hamranová et al., 2020). Achieving IT Service Maturity requires precise processes, robust governance, and strategic alignment. In this way, IT services become responsive and integral parts of the broader organizational structure (Gollhardt et al., 2020).

2.3. ITSM Maturity

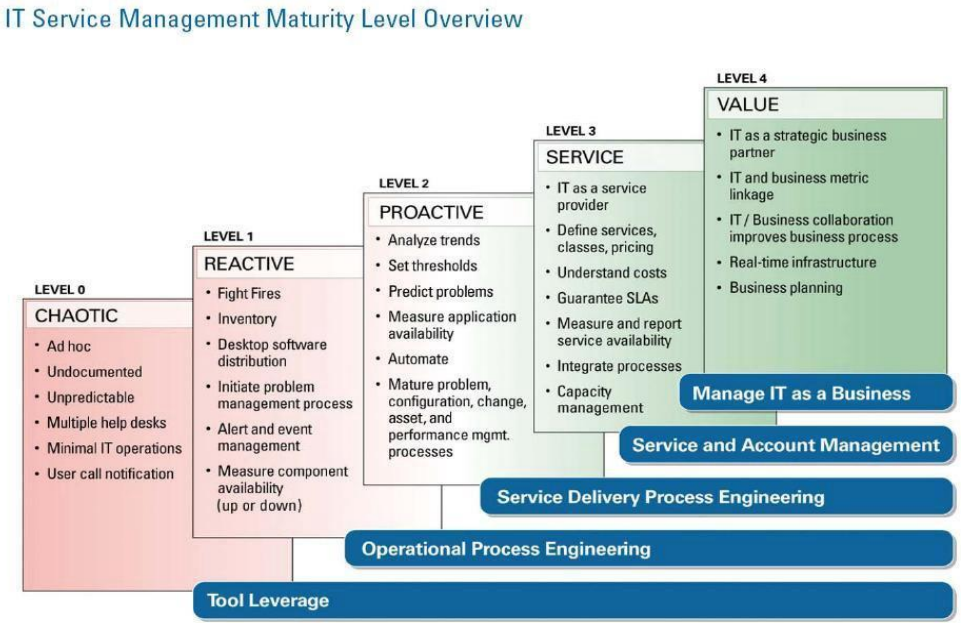
ITSM is at its peak maturity when an organization can deliver services aligned with its business objectives and adapt to a changing operational environment. The maturity of ITSM processes contributes to the organization's overall effectiveness, reliability, and adaptability throughout the lifecycle of IT services (Amorim et al., 2021).

The concept of IT service maturity is a crucial aspect that guides organizations through the complex landscape of IT service management development. An organization's maturity is often assessed using maturity models that evaluate the progression of people, processes, and technology (Gollhardt et al., 2020). Maturity levels range from chaotic states at the lowest end to strategic partnerships at the highest end as illustrated in Figure 2. The transformation from reactive to proactive is key to aligning services with business goals, which ultimately leads to tight alignment between services and business objectives (Hamranová et al., 2020).

An organization's IT service maturity should not be simply evaluated, but rather be considered as a strategic imperative. By identifying areas for improvement, it can be used to maximize the return on investment in services (Amorim et al., 2021). An organization can utilize this comprehensive understanding to identify strengths, areas of opportunity, and justifications for transformative change. Combining this insight allows organizations to develop a roadmap for IT improvement, focusing on internal processes, adopting best practices, and automating processes to achieve maturity (Steffen et al., 2019).

As a metric, IT service maturity is not merely a measure of performance, but also a determining factor for organizational development. For businesses to gain a competitive edge, ensure customer satisfaction, and grow sales, assessing and improving maturity levels is essential. A framework for navigating the intricate evolution of IT service management is provided by the integrated use of models, which further enriches the perspective of organizations.

Figure 2 - ITSM Maturity Model by Gartner



Source: Gartner Research (2005)

2.3.1. Key factors in IT Service Maturity

A well-defined process, a complete governance framework, and a paradigm of strategic alignment are critical to achieving IT service maturity. Implementing ITSM practices successfully is dependent on these factors (Hamranová et al., 2020). Defining processes clearly ensures operational efficiency, implementing robust governance structures ensures compliance with regulations, and aligning IT services with organizational objectives fosters a growth-oriented environment (Sarwar et al., 2023).

IT service maturity is an assessment of the ability of an organization to provide quality IT services. Many factors serve as foundational pillars in this assessment, each contributing to the assessment and enhancement of an organization's IT service capabilities (Sarwar et al., 2023). The following are some of the most important factors:

1. Operations: IT maturity is based on operations. An extensive understanding of system and application landscapes, adept troubleshooting skills, and a high level of monitoring expertise are necessary to succeed in this role (Berrahal et al., 2020).

2. Software Development Lifecycle (SDLC): SDLC maturity refers to the maturity of processes and methodologies employed throughout this lifecycle. To ensure a consistent operation of the software development ecosystem, it is necessary to assess the effectiveness of design, development, testing, and maintenance practices (Khan et al., 2022).

3. Strategy: It is common for mature IT organizations to demonstrate a strategic orientation aligned with the organization's predominant business objectives. As a result of this strategic alignment, new projects are delivered more rapidly, industry trends are kept current, and the organization is positioned as a dynamic player in a protean technological landscape (Gollhardt et al., 2020).

4. Organization and Governance: An important factor that determines the maturity of an IT service is the use of the organizational structure and governance mechanism. Organizational frameworks and governance structures that are well-defined contribute to the competent management of IT services and resources, ensuring their success and aligning with organizational objectives (Singh & Alhulail, 2023).

A maturity assessment of an IT organization is based on the combination of these identified factors. It is vital to analyse these elements in depth to gain insight into areas for improvement. By doing so, IT services can be aligned with business needs, service delivery can be optimized, and an organization's overall success can be significantly enhanced. In addition to providing a comprehensive understanding of the organization's IT maturity landscape, this multifaceted evaluation is intended to facilitate strategic decisions and foster a continuous improvement culture in the organization (Hamranová et al., 2020).

2.3.2. Models for Evaluating IT Service Maturity

It is possible to assess the maturity of IT services in the context of ITSM by using several evaluation models, such as ISO/IEC 20000, CMMI, ITIL, and COBIT. These models provide structured frameworks for assessing and improving the maturity of IT services (Hamranová et al., 2020). Standardized criteria are used to evaluate processes, capabilities, and alignment with industry best practices in these models. A quality management system is an essential tool for guiding organizational efforts towards continuous improvement and excellence in IT service delivery (Steffen et al., 2019).

People, processes, and technology can all be seen from a comprehensive perspective using these models. The assessment encompasses a variety of activities ranging from managing low-level chaos to developing strategic partnerships on a high level (Steffen et al., 2019). The evaluation landscape consists of several well-known frameworks and approaches. Some of these include International Organization for Standardization / International Electrotechnical Commission 2000 (ISO / IEC 2000), Capability Maturity Model Integration (CMMI), Information Technology Infrastructure Library (ITIL), Control Objectives for Information and Related Technologies (COBIT), ITSM Maturity Model, and ITIL Maturity Model. Summaries of these frameworks are presented in Appendix I.

By providing a structured framework for evaluating and improving IT practices and capabilities, these models assist organizations in evaluating and improving their capabilities. In addition to offering insight into current levels of IT maturity, they outline a path for ongoing improvements (Pereira & Serrano, 2020). With the use of these frameworks, organizations can navigate the complex terrain of IT service maturity, ensuring that their operations are aligned with current business needs (Hamranová et al., 2020).

2.3.3. Incident management and customer satisfaction

Customer satisfaction is largely determined by incident management effectiveness in ITSM. Following ITSM principles, resolving incidents quickly goes beyond fixing technical problems (Alonso et al., 2020). A successful project also involves communication and engagement with the client (Padlee et al., 2019). The success of an incident management framework is directly related to the timeliness and proficiency with which it is resolved, which directly impacts the customer satisfaction metrics. The success of ITSM is therefore significantly influenced using its processes (Pereira et al., 2021).

As a product or service provider, incident management plays a crucial role in ensuring the satisfaction of customers. The incident reporting process involves a variety of complex elements, including logging, prioritization, troubleshooting, resolution, and continuous improvement. A structured incident management process is essential when customers experience problems or interruptions in the services they rely on (Alonso et al., 2020).

A customer may report an incident through a variety of channels, including a telephone call, an email, a chat interface, or a self-service portal. For support teams to effectively address and resolve customer challenges, incidents must be described clearly and accurately by customers. Customer satisfaction will be higher if incidents are resolved faster and more effectively (Alonso et al., 2020).

An organization's incident management process can be assessed and enhanced to maximize customer satisfaction. As part of this process, incident trends are analysed, customer feedback is gathered, and the success of incident response is evaluated. To enhance customer satisfaction levels, it is imperative to identify areas that need improvement (Padlee et al., 2019).

Dashboards for incident management incorporate key performance indicators (KPIs) such as Net Promoter Score (NPS) and customer feedback ratings to measure and monitor customer satisfaction. In addition to measuring satisfaction levels, these metrics provide actionable insights that can be utilized to refine incident management procedures (Prabowo & Rosalinda, 2022).

It is a necessity to control incidents to orchestrate customer satisfaction strategies and enhance the overall customer experience. In this context, which includes incident reporting, resolution, highlights its essential role in fostering customer satisfaction and improving customer relationships (Pereira et al., 2021).

Thus, as organizations master higher levels of IT maturity, it becomes increasingly a priority to focus on improving the incident resolution process to maintain high levels of customer satisfaction. According to the ITIL Maturity model, incident resolution approaches vary according to the maturity level. In its early stages, incident resolution is reactive and focused on restoring services as soon as possible (Steffen et al., 2019). An organization's incident management becomes more structured as it moves from a reactive to a more proactive state, with an emphasis on preventing problems and detecting them early to minimize their impact. When an organization reaches higher levels of maturity, incident resolution becomes a strategic function that contributes to the overall organizational strategy, aligns incident response with broader business objectives, fosters

continuous improvement, and aligns incident response with broader business objectives (Steffen et al., 2019).

To achieve high customer satisfaction levels, organizations must continuously improve their incident response capabilities. An optimization of incident resolution processes that reflects the ethos of continual improvement and customer-centricity is required to accomplish this (Ismaili-Alaoui et al., 2022).

IT organizations are evaluated based on the speed and efficiency with which their customers have their issues resolved. Their overall satisfaction is directly affected by this evaluation. To ensure high levels of customer satisfaction, organizations should strive to improve the efficiency of their incident resolution processes. An incident resolution process involves more than just resolving technical issues (Shetty et al., 2022). It is a crucial component of building long-term relationships and trust with customers. Customer judgment and satisfaction are influenced by the operational efficiency displayed during incident resolution. The effectiveness of incident resolution mechanisms must be prioritized as organizations mature in their IT services delivery. The implementation of best practices, the use of metrics to measure and improve incident response capabilities, and the continuous effort to improve the incident resolution efforts are all necessary to achieve this (Fitsilis et al., 2021).

The continual pursuit of operational excellence in incident resolution demonstrates an organization's commitment to meeting and exceeding customer expectations (Fitrani & Ginardi, 2019). Strategic integration of metrics and industry best practices reinforces this commitment. A culture of continuous improvement is crucial to ensuring that incident resolution efficiency remains a critical component of providing superior customer service (Kesa, 2023).

The table in Appendix II summarizes the contents of the three chapters, namely, "IT Service Management", "Organizational Factors in IT Service Development", and "ITSM Maturity" described and developed above, along with the questions used in the interview script.

Chapter III – Methodology

The present study employs an exploratory approach oriented toward qualitative data. The purpose of this endeavour is to develop a conceptual framework which will contribute incrementally to the development of understanding in this specific study area (Saunders et al., 2019).

3.1. Qualitative Analysis

This study uses a single-method qualitative approach to emphasize the importance of studying words in multiple contexts to gain a deeper understanding of the topic (Barnham, 2015). In addition to drawing insights from words and images, this method is particularly valuable when it comes to collecting data through interviews (Saunders et al., 2019). A qualitative research methodology such as that used in this study is a valuable tool for exploring and comprehensively understanding a particular phenomenon (Daymon & Holloway, 2010). Research of this type is exploratory, and its adaptability and flexibility make it ideal for generating new insights and discovering events. A deductive approach will be used to establish conclusions based on the data collected through interviews and existing literature (Saunders et al., 2019).

3.2. Data Collection

For this study, the data collection process encompassed three interconnected stages:

1. Exploratory Analysis of existing literature on how organizational factors influence the maturity of an IT Service;
2. Interviews with IT professionals;
3. Analysis of the gathered data from the interviews and comparison with the Literature Review.

Interviews were conducted with individuals engaged in ITSM, responsible for providing effective governance and analysis of IT services within their respective organizations. The participants were selected using a non-probabilistic selection method based on their organizational affiliation and specific roles related to ITSM. To ensure the participants possessed a profound understanding of ITSM, and to collect credible and relevant data aligned with the research objectives and inquiries, this approach was adopted (Saunders et al., 2019).

During the semi-structured interviews, key questions guided the interview, while allowing for adaptation according to the context and information provided by the participants. During the interview process, participants were encouraged to share information freely, with confidentiality as a presupposition to facilitate open communication (Coffelt, 2017). Data were collected from participants on a single occasion during a specified and predetermined period as part of a cross-sectional study. After reviewing the existing literature, an Interview Guide available in Appendix III was developed to conduct the interviews. A comparison was made between the findings of the interviews and the previously established theoretical concepts (Saunders et al., 2019).

3.3. Data Treatment and Analysis

The collected data was processed in such a manner that conclusions can be drawn, as well as better address the research questions. During the interview process, audio recordings were taken and transcribed into text documents using Microsoft Word. For ease of access, each interview was separated and identified. Following each interview, the most important points were highlighted to identify the major themes and topics. The transcribed interviews will be categorized with similar meanings through a coding process in this section. As a result of this process, patterns or relationships will be identified, and the data will be better understood. The process of coding involves organizing the data into meaningful units that are classified as codes and subcodes (Saunders et al., 2019).

An extensive analysis of the collected data will be conducted using MaxQDA software, which is known to be highly effective in the analysis of qualitative research. This software facilitates the efficient storage, classification, and organization of information, thereby improving data management (Lewins & Silver, 2009). To attain a comprehensive understanding of the research findings, the data will be categorized into relevant themes and topics. In the final phase of the study, the analysed data will be interpreted to draw meaningful conclusions that contribute to the overall objectives of the study (Schilling, 2006).

Chapter IV – Results presentation

The data collection process for this study was conducted between March and April 2024, with a focus on ITSM processes and their maturity. Seven IT professionals from different departments/teams of a multinational company with relevant ITSM experience were selected for the study. The selection criteria were based on their experience, current position, and knowledge of ITSM processes and maturity models to ensure that they met the desired research criteria.

The interviewees work for a global technology company specializing in providing tailored financial solutions to businesses across various sectors, including healthcare, energy, infrastructure, and manufacturing. With services such as leasing, project financing, and asset-based lending, this division enables companies to invest in advanced technologies and infrastructure critical to their operations.

Operating internationally, the division leverages both industry-specific and financial expertise to develop flexible financing solutions that enhance business growth and efficiency. Understanding this organizational context is crucial, as it directly shapes the interviewees' work in structuring financial solutions that balance technological advancements with the complex needs of their clients.

Participants were contacted via phone call or email and provided with an overview of the research scope, objectives, and methodology, and asked for their participation. Once they agreed to participate, their availability and knowledge were assessed, and arrangements were made accordingly. If needed, alternative contacts were addressed. To make the interview process smoother, the interview script was made available in advance, giving interviewees the opportunity to reflect on their answers before the interview. Remote interviews were conducted using Microsoft Teams, with each interview lasting between 30 to 45 minutes on average. The participant's consent was taken before the interview and the interviews were recorded in audio format using the capabilities of Microsoft Teams. For a detailed description of the interview characteristics and the profile of the interviewee, please refer to tables I and II below:

Table I

Interview characteristics

Interviewee	Interview Type	Duration
INT1	Online - Microsoft Teams	32 min
INT2	Online - Microsoft Teams	44 min
INT3	Online - Microsoft Teams	1h 4 min
INT4	Online - Microsoft Teams	48 min
INT5	Online - Microsoft Teams	56 min
INT6	Online - Microsoft Teams	37 min
INT7	Online - Microsoft Teams	41 min

Elaborated by the author

Table II

Interviewee information

Int.	Gender	Academic background	Department	Position	Time
INT1	Male	Masters in business information systems	Department A	IT Department Head	5 years
INT2	Male	Bachelors in business management for IT	Department B	IT Solutions Expert	3 years
INT3	Female	Masters in mathematics	Department C	IT Chapter Lead	2 years
INT4	Male	Bachelors in Applied Environmental Geology	Department C	IT Platform and Application Manager	3 years
INT5	Male	Bachelors in computer engineering	Department D	IT Service Owner	1 year
INT6	Female	Bachelors in Business Administration	Department E	IT Product Owner	2 years
INT7	Male	Bachelors in Management	Department F	IT Application Manager	3 years

Elaborated by the author

In Appendix IV, a table is presented summarizing the interviewees statements and the literature review organized by theme according to the interview script. In Appendix V, a summary of the codes used during the analysis process is presented, along with their respective explanations, the frequency of mention by participants during the interviews, and a quotation from the interviewees to support the statements made. In Appendix VI, there is a visualization matrix of the codes in each interview.

Chapter V – Results Analysis and Discussion

The analysis and discussion of the results will be divided into four parts. The first part will concentrate on IT Service Management, addressing the fundamental concepts and general practices in IT service management, thereby establishing a theoretical foundation for the ensuing discussion. The subsequent section, Organizational Factors in IT Service Development, will examine the factors influencing the development and implementation of IT services, emphasizing the significance of organizational structure and culture. Following this, the IT Service Management Maturity section will investigate the levels of maturity within IT service management, analyzing how the evolution of processes may impact the efficiency and effectiveness of IT operations. Lastly, the Incident Management section will explore the processes and practices related to incident management, highlighting the importance of a rapid and effective response to ensure the continuity of IT services.

5.1.IT Service Management

As previously mentioned in the literature, Berkeley's approach was used to provide structure and alignment for the ITSM analysis. In the context of ITSM, the alignment of IT strategies with overarching business strategies is paramount. This critical aspect was emphasized by interviewees INT2, INT5, and INT6, corroborating the literature that highlights strategic alignment as essential for effective IT service delivery (Berkeley Information Technology, 2024). However, interviewees INT2, INT5, and INT7 also noted the necessity of adapting theoretical ITSM frameworks to fit practical, real-world scenarios, particularly in dynamic and regulated environments, a need often implied but not thoroughly explored in existing literature.

Service design and transition, identified by interviewees INT2, INT3, INT4, INT5, and INT7, are key components in ITSM. This is consistent with the literature (Dinh et al., 2021). Notably, INT3 emphasized the proactive and continuous interaction with customers, even in the absence of active demands or incidents, to drive unexpected improvements and higher customer satisfaction, which is an area not explicitly covered in the literature. As INT3 explained:

> *"For me, the delivery is good if the customer is happy. So the main topic is really having good contact and often contact with the customer. Even if the customer doesn't have an active demand or there's no incidents, you should still have regular alignment with the customer to see maybe even you want to offer something that the customer hasn't thought of" (INT3).*

The transition from design to operations, ensuring a smooth implementation of new services or modifications, was underscored by INT4 and INT7. This process, which facilitates seamless service delivery, is well-supported by the literature (Berkeley Information Technology, 2024).

Change management and incident management were universally acknowledged by the interviewees (INT1, INT2, INT3, INT4, INT5, INT6, INT7) as vital processes. These processes are crucial for maintaining and enhancing service delivery by managing

changes and resolving incidents swiftly, aligning with Winkler & Wulf (2019), who assert their fundamental role in IT service maintenance and enhancement.

Continuous improvement, referred to by interviewees INT3, INT4, INT5, and INT7, is essential for measuring performance and implementing innovations to enhance service delivery. The literature concurs, noting that continual service improvement is necessary for optimizing IT services (MacLean & Titah, 2023). Additionally, INT6 highlighted the importance of maintaining a detailed and regularly updated roadmap for stakeholders to manage expectations and align priorities within the business unit, an aspect not specifically mentioned in the literature review.

The efficient management of service requests, as highlighted by interviewees INT1, INT3, and INT5, is crucial for maintaining a high level of service quality and meeting user expectations. This aspect is supported by the literature, which underscores the importance of effective service request management in ensuring user satisfaction and operational efficiency (MacLean & Titah, 2023).

Knowledge management, mentioned by interviewees INT2, INT5, and INT7, supports other ITSM processes by ensuring information is accessible and utilized effectively. This is indirectly supported by the literature, which emphasizes the role of human resource optimization in ITSM (Fujitsu Research Institute, 2006).

Asset management, including the management of IT assets and resources, was highlighted by interviewees INT1, INT3, and INT5 as a crucial part of ITSM. This aligns with the broader ITSM practices discussed in the literature (MacLean & Titah, 2023).

Managing the service portfolio, including the assessment and improvement of services, was emphasized by interviewees INT3 and INT6. This process ensures that IT services continue to meet business needs and is indirectly supported by the literature through discussions on strategic alignment and continual improvement (Dinh et al., 2021).

5.2. Organizational Factors in IT Service Development

Successful ITSM implementation requires alignment of IT services with organizational strategy. It is through this alignment that IT initiatives contribute to achieving broader business goals, enhancing organizational performance, and enhancing competitiveness. INT1 emphasizes the importance of compliance and adherence to IT service management processes in enhancing organizational functions. Reichstein (2019) emphasizes the need for strategic alignment in ITSM to ensure that technological efforts are in support of corporate objectives.

INT2 discusses how technology has evolved from a cost centre to a business enabler, emphasizing the points made by Miyamoto (2019) and Sipahutar et al. (2020), which suggest that IT services must become an integral part of an organization's strategy. INT3 emphasizes that higher-level business goals should guide IT strategies for improving business value and performance. In addition, Van Zanten & Van Tulder (2021) argue that a robust organizational strategy is essential for the successful development of IT services.

INT6 and INT7 stress the importance of aligning IT services with strategic goals to enhance competitiveness and operational efficiency. Sipahutar et al. (2020) support this view, highlighting that strategic ITSM initiatives can enhance an organization's competitive edge by improving service delivery and reducing costs.

Even though the literature has not provided a deep understanding of practical perspectives on cultural impacts and self-management, interviewees also stressed the significance of cultural differences in adherence to processes and compliance. It has been noted by INT1 that different countries and their respective cultures have differing attitudes toward following rules and processes. INT2 provided insights into the benefits and challenges of a self-management culture, where employees set their own goals and deadlines, fostering independence and creativity but also posing coordination difficulties. INT2's emphasis on self-management and freedom could contrast with literature advocating for structured cultural frameworks, highlighting a potential tension between encouraging individual autonomy and maintaining structured alignment within an organization.

Budget allocation was considered as a crucial factor in ensuring the success of IT service development within an organization by all the interviewees. According to INT1, adherence to a planned budget is necessary for achieving productivity gains between 3-5%, as it improves service delivery. This aligns with Wei et al. (2023), who emphasize the importance of strategic budgeting in ensuring efficient IT service delivery and organizational adaptability to technological changes. However, INT1's strict adherence to planned budgets might differ from literature suggesting flexible budgeting for technological adaptability.

Proper budget allocation enables better resource management, aligning with market trends and avoiding resource wastage, as highlighted by INT2. Tekin & Konina (2019) support this view, advocating for budget allocation as a strategic tool to drive innovation and competitiveness within IT services. For instance, INT2 stated:

> *"When we receive proper budget allocation, we can better manage our resources, stay updated with market trends, align with our competitors, and structure our intelligent systems accordingly. This proper investment in technology allows us to stay current with industry tendencies, reduce costs, avoid resource wastage, and improve overall efficiency." (INT2)*

INT3 and INT5 assert that organizations are incapable of evolving or developing new solutions without an adequate budget, resulting in a reduction in cost and a reduction in service quality. To ensure sustained success and organizational performance, Van Zanten & Van Tulder (2021) emphasize the necessity of aligning IT services with corporate strategic goals. Furthermore, INT4 and INT6 discuss the importance of maintaining infrastructure and investing in new technologies, both of which are crucial to the operation of the company and to innovation. In addition, both Sinha et al. (2019) and Widianto & Subriadi (2022) note the importance of investing in human resources and technology to optimize IT services and ensure compliance.

INT7 also stressed the need for budget allocations to be flexible and responsive to the specific requirements of different regions and projects. This perspective on the

dynamic nature of budget allocation, considering local contexts and project-specific requirements, adds a practical dimension not extensively covered in the literature.

Human resources play a significant role in optimizing IT services and ensuring compliance with IT service management. Compliance requires that human resources adhere to established processes, as emphasized by INT1. As Winkler and Wulf (2019) point out, ITSM includes managing IT operations to support service delivery, emphasizing the importance of process compliance. Providing continuous training and recruiting the right talent are crucial to optimizing IT services. INT4 mentions the need for appropriate recruitment processes and training programs to equip employees with the necessary skills, which is supported by Sinha et al. (2019), who argue that human resources play a crucial role in IT service development through talent optimization and compliance. INT 4 mentioned:

> *"It's not just about having the right people, but ensuring they are well-trained and understand the business needs. Recruitment processes need to be thorough, and training programs should be continuous to keep up with technological advancements and operational requirements. This approach ensures that employees are equipped with the necessary skills to deliver quality IT services" (INT4)*

The organizational culture has a significant impact on the development of IT services. Both INT5 and INT7 emphasize the need for a collaborative approach to service management, emphasizing the importance of culture and communication in staffing and ensuring compliance. According to Wei et al. (2023) and Reichstein (2019), organizational culture and communication significantly influence the development of IT services. As mentioned by INT7, integrity and proper training are crucial factors in maintaining compliance, which is in line with Van Den Heuvel et al. (2020) recommendations.

Furthermore, interviewees provided real-life examples illustrating the practical challenges and benefits of organizational culture that were not extensively supported by the literature. According to INT3, a program manager's non-collaborative approach negatively affected service delivery, highlighting the importance of cultural alignment in practice. INT4 points out that a positive work environment that promotes self-development and feedback can have a significant impact on employee retention and IT service development. Human resources and organizational culture interact in real-world scenarios, with INT7 stressing the importance of balancing innovation with risk management, particularly in regulated industries. Additionally, a noteworthy distinction exists between a compliance focus and an innovative mindset within organizations. While INT1 emphasizes strict adherence to process compliance, the literature often suggests that balancing compliance with fostering innovation is crucial for sustainable growth and adaptability in dynamic environments.

5.3.IT Service Management Maturity

It is noted by INT1 that ITSM assessments identify opportunities for improvement without overengineering services, thereby ensuring a balance in alignment with the organization's return on investment. Dinh et al. (2021) and Marcos et al. (2020) support

this point of view by emphasizing the importance of optimizing resource allocation and investment in advanced technologies. INT2 emphasizes the importance of strategic alignment in ITSM implementation as a means of understanding and refining both departmental and company-wide operations (Miyamoto, 2019; Sipahutar et al., 2020). According to INT, and the authors Dinh et al. (2021) and Marcos et al. (2020):

> *"It's important to identify areas for improvement, but once we reach a satisfactory level, aiming for the highest score isn't always necessary. For instance, an 8 might be sufficient instead of striving for a 9 or 10, as higher levels often require more significant investments. We need to balance enhancements with the return on investment to ensure optimal resource allocation." (INT1)*

According to INT2, resource overload is a common theme in studies by Van Zanten and Van Tulder (2021) and Wei et al. (2023), highlighting the need for effective communication and resource management. INT3 discusses the importance of identifying blind spots aligning with the literature on continuous improvement and gap identification within ITSM processes (Steffen et al. 2019; Hamranová et al. 2020). The emphasis placed by INT4 on incident management and process improvement is in line with that of Alonso et al. (2020) and Padlee et al. (2019), who emphasize how effective incident management impacts customer satisfaction.

The emphasis on strategic decision-making and continuous improvement in IT services in INT5 and INT6 is consistent with Tekin and Konina (2019) and Wei et al. (2023). The authors argue that establishing a strategic budget allocation and adopting best practices are crucial for fostering innovation and achieving ITSM maturity. Gollhardt et al. (2020) and Sarwar et al. (2023) also emphasize the importance of strategic alignment and resource prioritization. This case study illustrates the practical side of ITSM maturity assessments, demonstrating the importance of hands-on experience and cross-organizational evaluations (Fitrani & Ginardi 2019; Ismaili-Alaoui et al. 2022).

The maturity of IT service processes has a significant impact on the effectiveness and reliability of an organization. INT1 contends that well-defined incident management processes, coupled with disaster recovery and business continuity management, are crucial for effective crisis management, in accordance with Marcos et al. (2020). According to INT2, evaluating the maturity level of IT processes allows for benchmarking and continuous improvement, echoing Gollhardt et al. (2020).

INT3's example from Mendix illustrates the direct relationship between operational efficiency and customer satisfaction with IT service maturity. By using clear documentation and consistent procedures, mature IT service processes facilitate effective and reliable service delivery in accordance with the literature on operational efficiency and the achievement of organizational goals (Amorim et al. 2021). According to INT4, mature ITSM processes improve customer satisfaction, which is supported by Alonso et al. (2020), who connect the effectiveness of incident management to customer perceptions and satisfaction levels. INT5 and INT6 discuss adaptation and flexibility in mature IT service processes, which are crucial for improved risk management and enhanced service quality (Hamranová et al. 2020; Sarwar et al. 2023).

INT3 and INT4 discuss how maturity models aid in setting priorities and tracking progress. To achieve continuous improvement and organizational excellence, this is essential (Hamranová et al., 2020). INT4 specifically mentions benchmarking in accordance with the literature's emphasis on using maturity models for ongoing assessment and improvement (Pereira & Serrano 2020).

In terms of ITSM maturity and its impact on organizational excellence, the interviewees' responses are mainly consistent with the literature. To improve organizational effectiveness, reliability, and adaptability throughout the lifecycle of IT services, ITSM maturity is crucial (Amorim et al. 2021; Gollhardt et al. 2020; Steffen et al. 2019). INT1 emphasizes the importance of tailoring assessments to add organizational value and to reflect the need for strategic alignment and flexibility. However, INT1's balanced approach to avoid over-engineering might contrast with literature advocating for comprehensive investments, highlighting a tension between balanced resource allocation and aggressive investment strategies. Additionally, INT2's mention of resource overload introduces a perspective that might differ from literature focusing solely on efficient resource management without addressing overload issues, underscoring the challenges of balancing resource utilization effectively.

It is imperative that IT services are aligned with organizational strategy. It has been noted that Miyamoto (2019), Sipahutar et al. (2020) and Reichstein (2019) emphasize the importance of aligning IT services with a broader corporate objective. It has been noted in INT5 and INT6 that maturity models and continuous improvement processes enable organizations to design development roadmaps aligned with strategic objectives in order to ensure that IT services contribute effectively to the success of the organization. Achieving successful IT service development requires an effective budget allocation that promotes innovation and optimizes resources (Tekin & Konina, 2019; Wei et al., 2022).

Models such as ISO/IEC 20000 CMMI ITIL and COBIT facilitate the assessment and improvement of IT service maturity contributing to organizational excellence (Hamranová et al. 2020; Steffen et al. 2019; Pereira & Serrano 2020). In INT2 and INT5, it is discussed how these models help in assessing maturity levels, setting benchmarks, and guiding continuous improvement efforts aligned with the importance of structured approaches in driving organizational excellence. As INT5 explained:

> *"These maturity models serve as a comprehensive roadmap for organizational improvement, offering a structured framework to assess and enhance IT service levels. They facilitate benchmarking and enable organizations to select approaches that are realistically achievable within their unique context, budget, and culture. This methodical approach is essential for continuous improvement, ensuring that services remain attractive, effective, and efficient." (INT5)*

INT2's perspective of IT as a value driver might differ from literature emphasizing cost efficiency, illustrating a nuanced view where IT can generate value beyond mere cost savings. Immediate needs versus long-term goals in budget allocation also present a contrast, with INT2 highlighting the need to balance these elements rather than prioritizing one over the other, as some literature might suggest.

INT7 emphasizes the importance of mature processes to prevent the waste of resources and to ensure high-quality service delivery that directly impacts customer satisfaction. According to the literature, structured incident management processes are essential for enhancing customer satisfaction levels and customer experiences (Fitsilis et al. 2021; Ismaili-Alaoui et al. 2022).

5.4.Incident Management and Customer Satisfaction

Successful ITSM implementation requires alignment of IT services with organizational strategy. It is through this alignment that IT initiatives contribute to achieving broader business goals, enhancing organizational performance, and enhancing competitiveness. INT1 emphasizes the importance of compliance and adherence to IT service management processes in enhancing organizational functions. Reichstein (2019) emphasizes the need for strategic alignment in ITSM to ensure that technological efforts are in support of corporate objectives.

INT2 discusses how technology has evolved from a cost center to a business enabler, emphasizing the points made by Miyamoto (2019) and Sipahutar et al. (2020), which suggest that IT services must become an integral part of an organization's strategy. INT3 emphasizes that higher-level business goals should guide IT strategies for improving business value and performance. In addition, Van Zanten & Van Tulder (2021) argue that a robust organizational strategy is essential for the successful development of IT services.

INT6 and INT7 underscore aligning IT services with strategic goals to enhance competitiveness and efficiency. Sipahutar et al. (2020) support this by noting strategic ITSM initiatives can enhance competitive edge, improve service delivery, and reduce costs. Despite this, the literature often lacks a deep understanding of cultural impacts and self-management in practice, an area interviewees highlighted as significant. For example, INT1 observed varying cultural attitudes towards process adherence across countries. INT2 noted the benefits and challenges of a self-management culture, which fosters independence and creativity but poses coordination difficulties. This contrasts with literature favouring structured cultural frameworks, revealing tension between individual autonomy and structured alignment. To explain this matter, ENT6 said:

> *"These assessments enable organizations to gain valuable insights into their ITSM capabilities and determine what it takes to advance to the next level. It's essential to prioritize improvement efforts and allocate resources effectively, as jumping from a reactive to a proactive level requires significant investment. Aligning IT services with strategic goals through these assessments enhances competitiveness and operational efficiency." (INT6)*

Budget allocation was considered as a crucial factor in ensuring the success of IT service development within an organization by all the interviewees. According to INT1, adherence to a planned budget is necessary for achieving productivity gains between 3-5%, as it improves service delivery. This aligns with Wei et al. (2023), who emphasize the importance of strategic budgeting in ensuring efficient IT service delivery and organizational adaptability to technological changes. However, INT1's strict adherence

to planned budgets might differ from literature suggesting flexible budgeting for technological adaptability.

Proper budget allocation enables better resource management, aligning with market trends and avoiding resource wastage, as highlighted by INT2. Tekin & Konina (2019) support this view, advocating for budget allocation as a strategic tool to drive innovation and competitiveness within IT services. Yet, INT2's focus on avoiding wastage might contrast with literature advocating aggressive investments for innovation.

INT3 and INT5 assert that organizations are incapable of evolving or developing new solutions without an adequate budget, resulting in a reduction in cost and a reduction in service quality. To ensure sustained success and organizational performance, Van Zanten & Van Tulder (2021) emphasize the necessity of aligning IT services with corporate strategic goals. Furthermore, INT4 and INT6 discuss the importance of maintaining infrastructure and investing in new technologies, both of which are crucial to the operation of the company and to innovation. In addition, both Sinha et al. (2019) and Widianto & Subriadi (2022) note the importance of investing in human resources and technology to optimize IT services and ensure compliance.

INT7 also stressed the need for budget allocations to be flexible and responsive to the specific requirements of different regions and projects. This perspective on the dynamic nature of budget allocation, considering local contexts and project-specific requirements, adds a practical dimension not extensively covered in the literature. ENT7 mentioned that:

> *"The flexibility of budget allocations is crucial for meeting the specific requirements of different regions and projects. For instance, launching a service in a new region like Mexico necessitates language support tailored to local needs. This adaptability ensures we can satisfy customers by addressing their unique challenges and preferences, which is essential for maintaining high customer satisfaction." (INT7)*

Human resources play a significant role in optimizing IT services and ensuring compliance with IT service management. Compliance requires that human resources adhere to established processes, as emphasized by INT1. As Winkler and Wulf (2019) point out, ITSM includes managing IT operations to support service delivery, emphasizing the importance of process compliance. Providing continuous training and recruiting the right talent are crucial to optimizing IT services. INT4 mentions the need for appropriate recruitment processes and training programs to equip employees with the necessary skills, which is supported by Sinha et al. (2019), who argue that human resources play a crucial role in IT service development through talent optimization and compliance.

The organizational culture has a significant impact on the development of IT services. Both INT5 and INT7 emphasize the need for a collaborative approach to service management, emphasizing the importance of culture and communication in staffing and ensuring compliance. According to Wei et al. (2023) and Reichstein (2019), organizational culture and communication significantly influence the development of IT services. As mentioned by INT7, integrity and proper training are crucial factors in

maintaining compliance, which is in line with Van Den Heuvel et al. (2020) recommendations.

Interviewees also highlighted practical challenges and benefits of organizational culture, often not extensively supported by literature. INT3 noted a non-collaborative manager's negative impact on service delivery, stressing cultural alignment's importance. INT4 highlighted a positive work environment's impact on employee retention and IT service development. INT7 underscored balancing innovation with risk management, especially in regulated industries. While INT1 emphasizes strict compliance process, literature suggests balancing compliance with fostering innovation is crucial for sustainable growth and adaptability.

Chapter VI – Conclusions, limitations, and future investigation

To address the research questions outlined, namely “What organizational factors influence the support and continuous development of an IT service?” and “How does the maturity of an IT service influence incident management and customer satisfaction?” a qualitative investigation was conducted through seven exploratory interviews with professionals in the field of IT Service Management.

The study delineates several critical organizational factors that profoundly affect the support and continuous development of IT services. Strategic alignment is paramount, ensuring that IT services are in concert with broader corporate objectives. This alignment facilitates the creation of value through IT services and enhances organizational performance by ensuring that IT initiatives support the overarching business strategy. Effective budget allocation is essential for fostering innovation, optimizing resource utilization, and enabling organizations to adapt to dynamic technological environments. One interviewee observed, "Proper budget allocation enables better resource management, aligning with market trends and avoiding resource wastage" (INT2). This underscores the significance of strategic budget management in driving IT service innovation and operational efficiency. The optimization of human resources is also critical, continuous training, and robust recruitment processes are vital in equipping employees with the requisite skills and competencies. As INT4 highlighted, "It's not just about having the right people but ensuring they are well-trained and understand the business needs." Moreover, a collaborative and supportive organizational culture is vital for effective IT service management. Cultural differences can influence adherence to processes and compliance, necessitating a unified approach that accommodates various cultural perspectives.

The maturity of IT services significantly impacts both incident management and customer satisfaction. Mature ITSM processes, characterized by well-defined governance structures and strategic coherence, enhance operational efficiency. This maturity ensures more effective and reliable service delivery, thereby reducing the frequency and severity of incidents. The evolution of IT service maturity is directly correlated with the efficacy of incident management. Mature processes facilitate proactive communication and swift resolution of incidents, which are crucial for maintaining high levels of customer satisfaction. As one interviewee emphasized, "Effective incident management is not just about resolving issues quickly but also about maintaining proactive communication with clients" (INT7). Mature IT services contribute to higher customer satisfaction by ensuring consistent and high-quality service delivery. Regular assessments and iterative updates to processes ensure that IT services remain aligned with organizational goals and adaptable to the evolving business landscape.

While this study provides valuable insights into the strategic alignment of ITSM initiatives, it is not without its limitations. The reliance predominantly on qualitative data derived from interviews, though rich in detail, may not be generalizable to all organizational contexts. Future research would benefit from the inclusion of quantitative analysis to validate these findings across a broader spectrum of organizations.

The findings are based on interviews conducted within specific organizational contexts, and the unique characteristics of different industries and organizational cultures may result in varying dynamics, potentially affecting the generalizability of the results.

The relatively small number of interviewees, though providing in-depth insights, limits the breadth of understanding. A larger sample size could offer a more comprehensive view of the issues discussed.

To build upon the findings of this research, several avenues for future investigation are recommended. Future studies should incorporate quantitative methodologies to validate the qualitative findings presented herein. Surveys and statistical analyses could provide broader validation and reveal additional patterns and insights.

Expanding the research to include a variety of industries would help identify industry-specific factors that influence ITSM practices and outcomes. Comparative studies across different sectors could reveal best practices and unique challenges. For example, future research could explore how ITSM practices differ between highly regulated industries, such as healthcare, and more flexible sectors, like technology startups.

As technology continues to evolve, future research should explore the impact of emerging technologies, such as artificial intelligence and automation, on ITSM maturity, incident management, and customer satisfaction. Further investigation into the role of organizational culture in ITSM implementation and maturity could provide deeper insights. Studies focusing on cultural differences across global organizations would be particularly beneficial in understanding diverse operational dynamics.

Conducting longitudinal studies would allow researchers to observe the long-term effects of strategic alignment and continuous improvement in ITSM. This approach could reveal how ITSM practices evolve over time and their sustained impact on organizational success.

In conclusion, the strategic alignment of ITSM initiatives with organizational factors is essential for achieving service excellence and organizational success. Continuous improvement, effective incident management, and the optimization of human resources are critical components of mature ITSM practices. By addressing the limitations and pursuing the recommended future research avenues, scholars and practitioners can further enhance the field of ITSM.

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Appendices

Appendix I – Models for Evaluating IT Service Maturity

Model	Characterization
International Organization for Standardization/International Electrotechnical Commission 2000 (ISO / IEC 2000)	Standard that provides guidelines for the management of IT services. It assists in the development, implementation, and improvement of service management systems (SMS) (ISO/IEC 20000-1:2018, 2021). Businesses that are reliant on quality IT services should adhere to this standard to ensure compliance with regulatory requirements. By following ISO/IEC 20000 standard, IT processes are aligned with the business's strategic goals (Ključnikov et al., 2019).
Capability Maturity Model Integration (CMMI)	Model that provides training and assessment to assist organizations in improving their processes (Oyshi et al., 2023). It offers adaptable guidance that is compatible with various methodologies based on the assessment of the maturity of the processes (Henríquez et al., 2022). Processes are categorized based on maturity levels, in which stakeholder and customer needs are prioritized while capability construction and measurement are highlighted for enhanced performance (Chahidi et al., 2023)
Information Technology Infrastructure Library (ITIL)	Framework that provides a structured approach to managing IT services. A key goal is to improve customer relationships, manage risks, and establish cost-effective practices (Haryanti & Pribadi, 2019). By adjusting the framework's general principles, IT services can be aligned with business objectives and improved efficiency (Yandri et al., 2019). It supports the standardization of IT processes, the reduction of operational costs, the enhancement of employee productivity, and the management of risks and disruptions (Blumberg et al., 2019).
Control Objectives for Information and Related Technologies (COBIT)	Standard, developed by the Information Systems Audit and Control Association (ISACA), that offers guidelines for implementing, monitoring, and enhancing IT governance and information management (Amorim et al., 2021). The document defines IT management processes from a business-centric perspective and provides details regarding inputs and outputs, key activities, objectives, performance metrics, and a basic maturity model (Samiei & Habibi, 2022). Designed to integrate seamlessly with other frameworks, such as ITIL, to ensure comprehensive governance (Amorim et al., 2021). Instead of organizing business processes or making IT-related

Model	Characterization
	decisions, it mainly focuses on managing and governing enterprise IT across the organization (Sarwar et al., 2021).
ITSM Maturity Model	Evaluates the maturity of ITSM processes within organizations, with a particular emphasis on their potential for continuous improvement (Hamranová et al., 2020). Comprehensive assessments are conducted of the people/culture, processes/structures, and objects/technology involved in ITSM. ITSM assessments are not standardized, however many are influenced by the CMMI model, which has five levels: Initial, Managed, Defined, Quantitatively Managed, and Optimizing (Trinidad et al., 2021).
ITIL Maturity Model	The ITIL Maturity Model evaluates service management organizations' capabilities, governance structure, and management system (Steffen et al., 2019). It measures different levels of operational improvement, from ad hoc to optimized, and can be tailored to specific needs. Organizations use it to enhance performance, identify strengths, and manage ongoing improvement efforts (Steffen et al., 2019). It complements various service management approaches and is suitable for organizations of all sizes and industries (Bogodistov et al., 2021).Maturity Levels of ITIL v3 (Steffen et al., 2019): • Level 1 (Initial): Limited activities with no resource allocation or budget. • Level 2 (Repetitive): Activities lack interest and coordination, with minimal resources. • Level 3 (Defined): Documented with allocated resources, goals, and formalization. • Level 4 (Managed): Fully recognized and aligned with organizational goals, managed proactively. • Level 5 (Optimized): Fully recognized with goals aligned with IT and business, focusing on continuous improvement.

Appendix II - IT Service Management

Theme	Literature Review Support	Authors	Question
IT Service Management (ITSM)	The term ITSM refers to a variety of activities and processes designed to support the delivery and support of IT services throughout their lifecycle.	Winkler & Wulf (2019), MacLean & Titah (2023), Serrano et al. (2021)	What are the main processes and activities involved in IT service management, and how do they contribute to service delivery?
Organizational Factors in IT Service Development	IT service development and integration in an organization are significantly affected by organizational culture and communication.	Wei et al. (2023), Reichstein (2019), Sinha et al. (2019)	Does culture and communication play a role in the development of IT services within an organization?
Organizational Factors in IT Service Development	The development of IT services in an organization is very dependent on the culture and communication of the organization.	Wei et al. (2023)	If yes, would you be able to provide examples of how cultural norms influence decision-making or project outcomes in the IT service development process?
Impact of organizational strategy on IT Services	Successful ITSM requires alignment between IT services and organizational strategy. Efforts on the technological front must contribute to the achievement of broader corporate objectives.	Miyamoto (2019), Sipahutar et al. (2020), Reichstein (2019)	Why is it important to align IT services with the organizational strategy for successful ITSM implementation?

Theme	Literature Review Support	Authors	Question
Budget's role in IT innovation	A well-planned budget allocation is essential to the success of IT service development since it facilitates innovation, optimizes resources, and enables the organization to adapt to changing requirements.	Tekin & Konina (2019), Wei et al. (2023)	Is budget allocation an important factor in ensuring the success of IT service development within an organization?
Budget's role in IT innovation	Budget allocation can have a significant impact on the development of IT services, resulting in cost savings, improved service quality, and enhanced performance in the organization.	Tekin & Konina (2019), Wei et al. (2023)	If yes, how can effective budget allocation assist in reducing costs, improving service quality, and increasing organizational performance?
Human resource contribution to IT Service evolution	Human resources are essential for optimizing IT services and ensuring compliance by providing skills, expertise, and support for ITSM implementation and operation.	(Widianto & Subriadi, 2022), Sinha et al. (2019), Suhermin (2022)	How does human resources contribute to optimizing IT services and ensuring compliance with ITSM?
IT Service Maturity	Depending on the maturity of ITSM processes, an organization's effectiveness, reliability, and adaptability may be affected. As a result, IT services are aligned with business objectives throughout the life cycle of the service.	Amorim et al. (2021), Gollhardt et al. (2020), Steffen et al. (2019)	What is the impact of the maturity of ITSM processes on an organization's overall effectiveness and reliability?
Key factors in ITSM Maturity	During ITSM maturity assessments, IT capabilities are assessed, areas for improvement are identified, and IT services are aligned with business requirements to improve organizational performance and align services with customer needs.	Hamranová et al. (2020), Sarwar et al., (2023)	How can ITSM maturity assessments benefit organizations in improving their operations and aligning their IT services?

Theme	Literature Review Support	Authors	Question
Models for Evaluating IT Service Maturity	The maturity model provides a framework for evaluating IT processes, capabilities, and alignment with best practices for assessing and improving the maturity of IT services. Consequently, this contributes to the excellence of the organization.	Hamranová et al. (2020), Steffen et al. (2019), Pereira & Serrano (2020)	How can maturity models contribute to organizational excellence within ITSM by helping to assess and improve IT service maturity?
Incident management and customer satisfaction	Customer satisfaction in ITSM depends on effective incident management. As part of this process, timely issue resolution is required as well as proactive client communication.	Alonso et al. (2020), Padlee et al. (2019), Shetty et al. (2022)	When it comes to ITSM, how does incident management impact customer satisfaction?

Appendix III – Interview script

I. Introduction

a. Personal presentation
b. Inform the interviewee of the purpose of the interview
c. Research framework
d. Clear consent from the interviewee for the interview and its recording and use
e. Confidentiality guarantee

II. Preliminary questions

a. Gender
b. What is your academic background?
c. What position do you currently hold?
d. How long have you worked in this position and for the company you currently work for?

III. IT Service Management

a. What are the main processes and activities involved in IT service management, and how do they contribute to service delivery?
b. Does culture and communication play a role in the development of IT services within an organization?
    i. If yes, could you provide examples of how cultural norms influence decision-making or project outcomes in the IT service development process?
    ii. If no, why?
c. Why is it important to align IT services with the organizational strategy for successful ITSM implementation?
d. Is budget allocation an important factor in ensuring the success of IT service development within an organization?
    i. If yes, how can effective budget allocation assist in reducing costs, improving service quality, and increasing organizational performance?
    ii. If no, why?
e. How does human resources contribute to optimizing IT services and ensuring compliance with ITSM?
f. What is the impact of the maturity of ITSM processes on an organization's overall effectiveness and reliability?
g. How can ITSM maturity assessments benefit organizations in improving their operations and aligning their IT services?
h. How can maturity models contribute to organizational excellence within ITSM by helping to assess and improve IT service maturity?
i. When it comes to ITSM, how does incident management impact customer satisfaction?

IV. Conclusion

a. Final thoughts on the interview
b. Appreciation for the time and willingness to participate in the interview
c. Authorization request for the use of the information
d. Authorization request for the use of the information

Appendix IV – Interview summary

Script	Interview Statement	Literature Review Support
Main Processes in IT Service Management	The interviewees outlined key processes such as requirements gathering, development, testing, incident management, change management, problem management, service design, service transition, service operation, stakeholder management, and release management. They emphasized the critical role of these processes in delivering high-quality IT services aligned with business goals and customer expectations.	IT service management involves processes such as service and change management, incident and problem management, asset and knowledge management (Winkler & Wulf, 2019; MacLean & Titah, 2023; Definition of IT Services - Gartner Information Technology Glossary). These processes contribute to efficient service delivery by ensuring the effective management of IT operations throughout their lifecycle.
Importance of Organizational Culture	Organizational culture and communication were highlighted as crucial for fostering innovation, open communication, feedback, and adaptability within IT service management. The interviewees stressed the need for a culture that promotes collaboration, experimentation, and learning to drive continuous improvement and stay responsive to evolving business needs and technological advancements.	Culture and communication play significant roles in IT service development. Cultural norms influence decision-making and project outcomes by shaping attitudes towards risk-taking, collaboration, and innovation within the organization (Wei et al., 2023; Reichstein, 2019).
IT services alignment with organizational strategy	Aligning IT services with organizational strategy ensures efficient resource utilization, strategic goal attainment, and meeting customer/business needs. The interviewees emphasized the significance of strategic alignment in reducing redundancy, optimizing processes, and enhancing organizational	Aligning IT services with organizational strategy is crucial for successful ITSM implementation because it ensures that IT efforts are directed towards achieving broader business goals, enhancing competitiveness, and improving overall organizational

Script	Interview Statement	Literature Review Support
	agility, ultimately leading to improved competitiveness and organizational success.	performance (Miyamoto, 2019; Sipahutar et al., 2020).
Budget Allocation	Effective budget allocation is crucial for ensuring resources are available for infrastructure, technology, and human resources necessary for delivering high-quality IT services. The interviewees emphasized the need for continuous review and alignment of budget allocation with strategic goals to optimize resource utilization, manage costs effectively, and support organizational growth and competitiveness in dynamic market environments.	Effective budget allocation is essential for the success of IT service development as it enables organizations to invest in the necessary resources, technologies, and talent required to deliver high-quality services while optimizing costs and enhancing organizational performance (Wei et al., 2023; Definition of IT Services - Gartner Information Technology Glossary).
Human Resources contribution to IT service optimization	Human resources play a vital role in optimizing IT services through skill acquisition, training, and technology adoption. The interviewees stressed the importance of attracting and retaining top talent, fostering a culture of learning and development, and aligning human resources with business objectives to drive innovation, efficiency, and excellence in IT service delivery.	Human resources play a vital role in optimizing IT services and ensuring compliance with ITSM by providing talent optimization, skills development, and strategic workforce planning, which are essential for efficient and effective service delivery (Sinha et al., 2019; Suhermin, 2022).
ITSM Process Maturity	IT service management process maturity positively impacts organizational effectiveness, reliability, service quality, risk management, and cost savings. Interviewees highlighted how mature processes enable standardization, collaboration, service delivery enhancement, risk mitigation, and	The maturity of ITSM processes directly impacts an organization's overall effectiveness and reliability by improving service quality, reducing costs, minimizing disruptions, and enhancing customer satisfaction (Amorim et al., 2021; Gollhardt et al., 2020).

Script	Interview Statement	Literature Review Support
	adaptability, leading to greater resilience and competitiveness in the market.	
ITSM Maturity Assessments	Maturity assessments provide valuable insights into ITSM capabilities, identify improvement opportunities, and foster continuous improvement within organizations. Interviewees emphasized benchmarking against industry standards, setting goals for maturity improvement, and leveraging assessment results to drive strategic decision-making and investment in IT service management initiatives.	ITSM maturity assessments benefit organizations by providing insights into their current IT service maturity levels, identifying areas for improvement, guiding strategic decision-making, and fostering a culture of continuous improvement in IT service delivery (Hamranová et al., 2020; Steffen et al., 2019).
ITSM Maturity Models	Maturity models contribute to organizational excellence by providing a structured framework for assessment, benchmarking, and improvement. Interviewees highlighted the role of maturity models in guiding improvement efforts, fostering continuous improvement, and enabling strategic decision-making to enhance IT service management effectiveness, efficiency, and alignment with organizational goals.	Maturity models contribute to organizational excellence within ITSM by providing structured frameworks for evaluating and improving IT practices and capabilities, aligning IT services with industry best practices, and guiding organizations towards achieving higher levels of IT service maturity (Hamranová et al., 2020; Pereira & Serrano, 2020).
Incident Management & Customer Satisfaction	Efficient incident management ensures timely solutions, transparency, and enhances customer satisfaction. Interviewees stressed the importance of incident resolution and effective communication in maintaining service quality standards and building trust with customers. They emphasized continuous	Incident management directly impacts customer satisfaction in ITSM by ensuring timely and proficient resolution of customer issues, fostering communication and engagement with clients, and aligning incident resolution processes with broader business objectives to enhance overall customer

Script	Interview Statement	Literature Review Support
	improvement of incident management processes to enhance customer experience, meet service level agreements, and uphold service quality standards, thereby driving customer satisfaction.	experience (Alonso et al., 2020; Padlee et al., 2019).

Appendix V – Codes and Subcodes Derived from Interviews

Code	Explanatory Note	Frequency	Interviewee quotes
Q1. ITSM Main Processes			
Service Strategy	Planning and designing IT services to align with business goals and create value.		
Financial management	Budgeting, accounting, and charging to manage IT services in a cost-effective manner.	2	In my opinion, there are four main areas I need to cover while running service management: service strategy and design, service operation, financial management, and compliance management. (INT2)
Service request fulfilment	Handling service requests from users, ensuring timely and efficient responses.	3	Service operations, in particular, align closely with our field of work, making it more tangible and practical. This encompasses typical aspects of service fulfillment. (INT 5)
Demand management	Understand, anticipate, and influence customer demand for services, ensuring that capacity is utilized effectively.	1	Service management encompasses the entire delivery process, from demand management to ongoing operations. (INT3)
Strategic planning	Long-term planning to align IT services with business goals, ensuring the IT strategy supports the overall business strategy.	4	According to current standards, the main processes within ITIL 4 include service strategy as a top-level process. Service strategy involves envisioning the service and ensuring it aligns with the overall organizational strategy. This process sets the context for how the service is intended to operate. (INT5)
Reports&Dashboard	Ongoing efforts to enhance IT service quality, performance, and efficiency.	4	
Problem management	Identifying, analyzing, and managing the root causes of incidents to prevent future occurrences.	4	If we encounter too many incidents, especially recurring ones, we need to consider problem management and ensure all aspects work together cohesively. (INT7)

Code	Explanatory Note	Frequency	Interviewee quotes
Incident management	Restoring normal service operations as quickly as possible to minimize impact on business operations.	5	They deliver value to the business by minimizing disruptions caused by incidents and problems, ensuring normal operations, and consistently delivering improvements. (INT4)
Service level agreement management	Ensuring that all IT service management processes, operational level agreements, and underpinning contracts are appropriate for the agreed-upon service level targets.	2	Incident management is crucial, especially for existing applications or services. When interruptions occur, it's important to restore them quickly to adhere to our SLA structure. (INT1)
Change management	Manages changes to the IT infrastructure or any aspect of IT services to ensure minimal disruption to services.	6	Once everything is set up, we move to service operation, the most interesting part. (…) They use the appropriate tools to request changes or report issues. This involves two major processes: change management and incident management. (INT7)
Service Improvement			
Continuous improvement	Striving to enhance service quality through ongoing evaluation.	3	(…) continual service improvement and it's something that actually here is very important and it's sometimes not taken as seriously (…) (INT7)
Requirement management	Capturing, analyzing, and managing the needs and requirements of stakeholders to ensure the delivery of services that meet their expectations.	1	Collecting business requirements within my business unit is crucial. If someone has a requirement that affects the application I'm responsible for, I need to translate these into IT requirements for development. (INT6)
Compliance management	Ensures that IT services comply with laws, regulations, and policies to minimize risk and ensure proper governance.	2	Compliance management is as critical for us as the service itself. If the service is not compliant, it cannot be delivered effectively, just like with any other technical requirement. (INT2)
Customer communication	Maintaining effective communication with customers to ensure their needs and expectations are understood and met, fostering positive relationships.	1	Listening to customers is essential, not just when there is an active demand or incident. Even without active issues, regular alignment with the customer is important. (INT3)

Code	Explanatory Note	Frequency	Interviewee quotes
Q2. Organizational Culture			
Yes		7	Actually, I definitely think it plays a very important role. (INT6)
Decision making	Processes and behaviors by which decisions are made within an organization, reflecting the hierarchy, inclusiveness, and speed of decision-making.	5	I started working when decision-making was centralized among a very small group of people. On one hand, this was terrible because you could feel their heavy-handed control over you. (INT2)
Collaboration	Ways in which employees work together across departments and teams, emphasizing cooperation, teamwork, and shared goals.	4	I think that culture and communication significantly influence how employees work together and as individuals. This impact is evident not only in their collaboration but also in their individual performance. (INT4)
Communication	Methods and effectiveness of information exchange within the organization, including formal and informal channels, transparency, and feedback mechanisms.	11	We saw ourselves as service providers and them as our customers. About five years ago, we stopped calling them customers and started calling them colleagues. This shift is part of our culture, promoting high-level conversations. When they treat you with respect, communication improves. (INT3)
Project outcome	Results and effectiveness of projects undertaken within the organization, influenced by planning, execution, and the organizational culture's impact on project success.	7	In both scenarios—lack of feedback and lagging innovation—can significantly harm outcomes and have a great impact. (INT4)
Innovation	Organization's ability to generate new ideas, processes, and products, and how the culture fosters or hinders creativity and experimentation.	7	In today's world, a culture needs to be innovative, promote open communication, and encourage feedback from everyone. (INT6)
Employee empowerment	Employees are given autonomy, responsibility, and trust to make	1	Having this growth mindset to actually empower people. (INT4)

Code	Explanatory Note	Frequency	Interviewee quotes
	decisions and take actions within their roles.		
Risk taking	Organization's attitude towards taking risks, including how risk is perceived, managed, and rewarded or penalized.	5	The driving force of innovation needs to be tempered by an understanding of how much risk we are willing to take. (INT7)
Cultural influence	The extent to which organizational culture shapes decision-making and project outcomes.	1	This cultural difference definitely plays a role in how rules are interpreted and how processes are followed on a daily basis. (INT1)
Q3. IT services alignment with organizational strategy			
Compliance	Adhering to rules, regulations, and standards for the organization.	1	Our strategy emphasizes the importance of maintaining compliance in our operations. This means that adhering to IT service management processes is crucial. (INT1)
Achieve business goals	Aligning IT services to support organizational objectives.	6	Essentially, our goal is to deliver value by meeting business objectives, which are always aligned with the organizational strategy. (INT4)
Enhance competitiveness	Using IT to improve the organization's market position.	4	I believe it is essential to align IT services with the overall strategy, as the strategy dictates the necessary initiatives and actions required to be competitive in the market. (INT6)
Improve organizational performance	Optimizing IT to boost efficiency and effectiveness.	5	If IT services are not aligned with the organizational strategy, we will likely waste resources and have inefficient processes (INT7)
Q4. Budget allocation			
Yes		7	Yes, absolutely (..) (INT3)
Resource investment	Allocating budget towards necessary resources.	4	It ensures that resources are available.. (INT6)

Code	Explanatory Note	Frequency	Interviewee quotes
Technology investment	Funding for new and existing technology to support and enhance IT services.	3	When we are able to invest in the right way in technology, we can make ourselves im line with the current tendencies. (INT 2)
Talent investment	Budgeting for hiring, training, and retaining skilled personnel.	3	If you don't have budget, you don't have people. (INT3)
Organizational performance	Investments aimed at improving overall efficiency and effectiveness of the organization.	8	We are expected to enable them (business needs) to achieve a certain performance, and that might mean starting with a small application or with a small scale operation in terms of support. (INT7)
Costs reduction	Allocating funds towards initiatives that reduce operational costs.	6	Therefore, we focus on service delivery and quality to achieve productivity. This approach allows us to save 3 to 5% daily on any given service. (INT1)
Service delivery	Budgeting to ensure high-quality and reliable IT service delivery.	4	What you need to have is a clear vision on how these two budgets (maintenance and change/innovation) play together so that you can correctly allocate The money that you have in the most efficient way to improve service quality. (INT4)
Q5. HR contribution to IT service optimization			
Training	Providing ongoing education and skill development for IT staff.	5	You need people with the right skills and knowledge. Additionally, it is important not to forget the necessity of training them. (INT6)
Talent	Recruiting and retaining skilled IT professionals.	4	(…) people make the culture of the of the organisation and picking the the correct person is essential. (INT5)
Compliance	Ensuring IT staff adhere to relevant laws and regulations.	4	Ensuring compliance means following the rules and processes. As long as we adhere to these processes, we remain compliant. Therefore, it is crucial for everyone to follow the established procedures. (INT1)
Skills	Developing necessary technical and soft skills within the IT team.	4	Of course, we are talking about the talent and skills of people. This should be kept in mind when staffing. Typically, paying

Code	Explanatory Note	Frequency	Interviewee quotes
			more can attract better talent, but it's not always a direct proportion. (INT5)
External support	Facilitating the use of external expertise and resources when needed.	1	Currently, we have external experts supporting us in onboarding our team with new technology. It's crucial for our IT staff to be open to new technologies. (INT6)
Q6. ITSM Process Maturity			
Service Quality	Measures the effectiveness and efficiency of IT services.	6	This approach is highly beneficial because it allows you to compare your current model with consolidated market benchmarks, helping you understand areas for improvement. (INT2)
Costs	Tracks and manages the expenses related to IT services.	2	If our processes are not adapted and mature enough to suit our specific situation, we will not perform tasks efficiently. This will result in delays and unnecessary expenses. (INT7)
Disruptions	Monitors and minimizes interruptions to IT services.	3	If you don't have a mature ITSM with everything documented and clear on how to proceed, it impacts the maturity of ITSM. (INT2)
Customer Satisfaction	Evaluates the satisfaction level of users with IT services.	1	The ultimate result of having mature ITSM processes is the overall improvement in customer satisfaction. (INT4)
Q7. ITSM Maturity Assessments			
Identify areas of Improvement	Recognizing opportunities to enhance IT service processes.	6	These assessments enable organizations to gain valuable insights into their ITSM capabilities, such as identifying their current level and understanding what it takes to reach the next level. (INT6)
Strategic decision making	Using maturity assessments to inform long-term planning and decisions.	5	You can prioritize by evaluating the benefits of different actions. For example, you can focus on adaptations that offer quick wins with minimal effort, rather than those requiring significant effort. (INT5)

Code	Explanatory Note	Frequency	Interviewee quotes
Continuous improvement	Promoting ongoing enhancements in IT service management.	4	Finding ways to reduce overload is crucial. For example, if you can manage regular work within 80% of your time, you can dedicate the remaining 20% to improving processes. (INT2)
Organization self awareness	Understanding the current state of ITSM processes and capabilities.	3	Without conducting assessments across the organization, you won't know your actual status. (ENT7)
Q8. ITSM Maturity Models			
Value-driven approach	Prioritizing measures that create organizational value	1	(…) it's important to reflect on whether they (measures) are needed in our context and if they will increase value for our organization. (INT1)
Employee Training and Accountability	Employees need training and feedback to perform their roles effectively.	1	If the people interacting with these processes are not doing their jobs properly, they need to be trained. (INT7)
Benchmarking and Improvement	Comparing ITSM practices to industry standards and continuously improving.	6	These maturity models act as diagnostic tools, enabling organizations to benchmark their current IT service management capabilities against established best practices and industry standards. (INT2)
Organizational Excellence	Achieving the highest standards of organizational performance.	2	By conducting assessments and obtaining benchmarks, alongside continuous improvement efforts, both contribute to achieving organizational excellence. (INT4)
Service Attractiveness	Maintaining services that are meaningful, effective, and efficient for users.	4	I would say this greatly helps in improving your service, keeping it attractive, effective, and efficient. (INT5)
Q9. Incident Management & Customer Satisfaction			
Knowledge base	Maintaining a comprehensive knowledge repository to support people.	2	Conducting lessons learned on incidents to prevent future occurrences has a positive impact on customer satisfaction because, ideally, such incidents will not happen again. (INT1)

Code	Explanatory Note	Frequency	Interviewee quotes
Process Optimization and Automation	Balancing automation and personalization for efficient incident resolution.	2	(…) the more automated and well structured and scripted the process is, the bigger is the customer satisfaction. (INT2)
Communication and transparency	Lack of effective communication within the service team.	5	(…) even if the incident is significant, good communication with all stakeholders is crucial. Whether it's a major issue or company-wide, effective communication can mitigate the impact. (INT3)
Incident Frequency	More incidents than change tickets occur.	1	From my experience, we encounter more incidents than change tickets. This doesn't mean we're not doing a good job with changes; it simply indicates that something has broken somewhere. (INT7)
Language Barriers	Challenges faced when a company expands to a new market with a different primary language.	1	(…) effective communication is crucial, and not having support available in the local language would severely impact customer satisfaction and service efficiency. (INT7)
Customer-Centric Mindset	Importance of placing customer needs at the center of service operations.	4	When you provide customers with a structured, navigable way to understand what happened in a given situation, it can often expedite the issue resolution process. (INT2)
Service Desk Effectiveness	Factors contributing to successful customer incident resolution.	7	Everyone appreciates being able to report an issue, receive prompt attention, and get a timely resolution. (INT5)

Appendix VI – Code Visualization Matrix for each Interview in MAXQDA